

### Section V— March 2009 Update

- Section D. 4: [Overdose Prevention](#)

#### I. INTRODUCTION

##### RECOMMENDATION:

**Clinicians should ensure that substance users are engaged in medical care regardless of whether or not they are actively using drugs.**

Active substance users with HIV infection often lack access to general and HIV-specific medical care and are less likely to benefit from improvements in the management of HIV disease than other patients. Substance users may have the additional burdens of comorbid psychiatric conditions, limited education, or difficulty navigating the healthcare system, or they may lack the financial resources to obtain care. Because it is not uncommon for healthcare providers to have negative feelings toward active substance users, these patients are also vulnerable to discrimination when seeking treatment.

Barriers to obtaining and providing effective treatment for active substance users can be minimized. For clinicians to ensure that substance users are engaged in medical care, regardless of whether or not they are actively using drugs, is a challenge and requires a foundation of trust that involves both a nonjudgmental, supportive approach and a spectrum of interventions to achieve both substance use and medical treatment goals. By accessing the resources of multiple services and programs, implementing brief interventions, educating patients about the risks of substance use, and using harm-reduction and motivational interviewing techniques, clinicians can effectively address the complex conditions and problems that active substance users experience (see Table 1).

**TABLE 1**  
**QUICK TIPS FOR WORKING WITH SUBSTANCE USERS**

- Design strategies to keep the patient in care, such as reminder systems and peer support
- Ask the patient about his/her treatment goals
- Express concern for the patient's health and wellness and a willingness to address the patient's health needs
- Establish systems to ensure coordination of care across multiple disciplines
- Assess the patient's readiness to change and tailor appropriate interventions
- Encourage behavior change through the use of brief interventions and motivational interviewing
- Introduce harm-reduction techniques for patients who are not yet able to abstain from substance use

## II. COORDINATION OF MULTIDISCIPLINARY CARE

### RECOMMENDATIONS:

**Clinicians should communicate with providers from multiple disciplines to ensure optimal patient care.**

**Clinicians should have access to available community resources needed for the comprehensive care and management of HIV-infected substance users.**

Comprehensive care for HIV-infected substance users can be achieved when services are co-located at one site, under a common programmatic aegis, or linked across several sites and administrative structures.<sup>1</sup>

### A. Co-Located Services

Comprehensive care for many HIV-infected patients often involves multiple disciplines. By engaging multiple disciplines, a broad range of complex conditions and problems that are beyond the capabilities of one clinician can be addressed. When patients receive care from providers in multiple disciplines or in diverse settings, effective communication between representatives of the healthcare system is critical for minimizing fragmentation of care or divergent treatment strategies.

Co-located services can optimize interdisciplinary care. Benefits of single-site treatment may include weekly case discussions, integrated medical records, and use of a common information system. Co-located programs can be provided within a primary care center by augmenting staff from other disciplines, including psychologists, social workers, and addiction counselors. However, this is sometimes not possible because of state licensing restrictions, which can take as long as 3 years.

The New York State co-location model provides HIV primary care to substance users within drug treatment programs. This model of care has been associated with improved adherence to medical treatment.<sup>2</sup> Co-located staffing patterns can facilitate communication among professionals and management of patient care, including elements as simple, but important, as making appointments. Although co-locating services may incur additional costs, new services may also be associated with revenue generation and may result in changes that are cost-effective from a broader perspective.<sup>3</sup> A list of co-located services that provide HIV primary care within drug treatment facilities in New York State is given in [Appendix IV](#).

### B. Interagency Coordination

#### RECOMMENDATIONS:

**Clinicians and service providers from other sites should establish systems to ensure coordination of care.**

**The primary care clinician should help ensure that team members' responsibilities for important elements of the patient's care are clearly assigned.**

A common approach to providing care for substance users with HIV infection is to utilize and coordinate different services among multiple agencies. Exchange of information among multiple disciplines, such as HIV, substance use, and mental health, should be well-coordinated for the treatment of HIV-infected substance users. The functions and responsibilities of each program should be clear to each member of the healthcare team. Responsibilities assigned to specific team members should include the following:

- Making referrals to social services
- Following up with the patient and other members of the healthcare team if the patient drops out of treatment
- Notifying other members of the healthcare team if a major change in status occurs

Adherence to regulations that protect the privacy of patient information may be complex in some cases. Laws regulating the disclosure of patient information pertaining to HIV care, substance use treatment, and general medical care are designed to protect the patient's confidentiality, although each has distinct stipulations. Health Insurance Portability and Accountability Act (HIPAA) regulations also affect the exchange of health-related information. For more information about HIPAA, see the [NYSDOH HIPAA Information Center](#).

**Key Point:**

Programs that frequently provide referrals to each other may benefit from developing written, working interagency agreements.

Program directors may find it useful to develop interagency agreements and qualified service agreements to simplify routine communications. Interagency agreements may include admission criteria, services offered, and the referral process. The [Legal Action Center](#) is an excellent source of guidance regarding these issues.

### **C. Case Management**

**RECOMMENDATIONS:**

**Clinicians should refer substance-using patients for case management to enhance coordination of care when care is provided by multiple disciplines and in multiple settings.**

**Clinicians should regularly involve case managers in case conferences to discuss medical, psychological, social, and substance use issues that may affect a patient's ability to adhere to care.**

To ensure that these issues are addressed and risk of fragmentation of care is minimized, the clinician should work with the case management team to coordinate medical care, referrals, and ongoing services in the community.

**Key Point:**

Appropriate management of substance use issues should include the use of social work, case management, or mental health services, in conjunction with substance use counselors, when available.

## D. Referral for Drug Treatment Services

### RECOMMENDATION:

**Clinicians should collaborate with social work staff and other mental health providers, when available, to determine which treatment programs or substance use services best meet the patient's needs.**

Drug treatment services may be available in hospitals or community-based organizations. Many community-based organizations offer a range of services, such as mental health, home health, and complementary services; relapse prevention; education and/or support groups; and programs such as harm reduction,<sup>4</sup> detoxification, rehabilitation, and day treatment. Clinicians should be familiar with both the mechanisms of referral and the resources available in the community.

## III. ENGAGING AND MAINTAINING THE PATIENT IN CARE

### A. Building a Therapeutic Relationship

#### RECOMMENDATIONS:

**Clinicians who are uncomfortable or inexperienced with treating substance-using patients should seek guidance from providers with more experience in this area.**

**Clinicians should tailor interactions with substance-using patients to facilitate a trusting relationship for engaging and retaining patients in care.**

A foundation of trust and consistency should be created and used to engage patients in treatment. A strong patient-provider relationship and expressions of empathy and nonjudgmental attitudes from the healthcare team can encourage patients to remain in treatment or return if they have dropped out. Building relationships with patients should be individualized because each patient has a different tolerance for relationships, and some could perceive too much provider involvement as intrusive. A therapeutic relationship can be strengthened by:

- Establishing open, respectful avenues of communication (Table 2 provides strategies for effective patient-provider communication<sup>5</sup>)
- Providing clear and direct ways for the patient to reach the clinician
- Asking permission to contact the patient as needed, asking whether there are family members and/or friends who the clinician has permission to contact if needed, and establishing best ways to stay in contact with each other
- Consistently emphasizing concern for the patient's health and willingness to address the patient's needs

Stigma and shame are powerful barriers to both effective communication and participation in treatment. Because many substance users have experienced stigma and discrimination, many distrust the healthcare system, which may contribute to their difficulty in receiving effective treatment.<sup>6,7</sup>

To avoid stigmatizing patients because of their drug use or any other behavior or attribute, clinicians and staff should use nonjudgmental language with “positive regard.” Positive regard has been defined as the ability to appreciate and respect another person’s worth and dignity.

It is not uncommon for clinicians to possess negative feelings toward substance users; clinicians need to acknowledge and manage negative feelings so that they are able to provide the same quality of care to substance users as to patients who do not use substances. Reflective practice allows for clinicians to manage feelings of negative regard for patients, disclose true feelings of frustration outside of the examination room, and receive support and advice from colleagues on how to proceed.

**TABLE 2**  
**PATIENT-PROVIDER COMMUNICATION AS A COLLABORATIVE PROCESS**

**Build trust**

- Ask the patient about his/her treatment goals
- Be explicit (both to the patient and to yourself) regarding how you intend to provide treatment for the patient
- Be consistent and respectful
- Meet the patient “where they’re at”

**Avoid shaming the patient in any way**

- Address ongoing drug use or resumption of use in a nonpunitive fashion
- Address substance use in clinical terms and avoid judgmental language that can exacerbate stigma, such as “substance abuse”

**Provide positive feedback**

- Improved clinical results when applicable
- Adoption of healthful behaviors
- Elimination or reduction of less healthful behaviors

**B. Encouraging Patient Participation**

**RECOMMENDATION:**

**Clinicians should actively engage HIV-infected substance users early in the treatment-planning process.**

Although not unique to substance users, early and active engagement by the patient in the treatment-planning process is crucial to optimal treatment and may help retain the patient in care for a longer period of time. Studies suggest that patients with comorbid substance use and HIV infection are more likely to leave treatment when they are given treatment goals that they are not ready to accept. The inclusion of patients early in the planning process may lead to more successful treatment outcomes. Treatment goals will vary to reflect patients’ needs and will typically include elements as diverse as keeping appointments, adherence to medications (e.g., ARV therapy, PCP prophylaxis, psychotropics), or getting regular Pap tests or vaccinations.

Treatment expectations should be discussed with the substance-using patient. If a patient does not fully understand his/her HIV diagnosis and management, he/she may not be able to achieve the desired outcome.

#### **IV. ASSESSING TREATMENT READINESS AND RELAPSE PREVENTION**

##### **A. Assessing Treatment Readiness**

###### **RECOMMENDATION:**

**Clinicians should address substance use with active substance users and assess their readiness for substance use treatment at the initial visit and routine monitoring visits.**

Many behavior-change interventions are directed at immediate action, such as abstinence, but some patients may not be ready for immediate change. These situations can be challenging for both the clinician and patient, especially if strategies other than abstinence are not discussed. Disappointment and frustration caused by conflicting goals may disrupt the therapeutic relationship.

The Transtheoretical Stages-of-Change model focuses on behavior change as a process, rather than an event, and proposes that individuals at different stages in this process may need interventions specific to their situation.<sup>8,9</sup> Interventions that are tailored to the patient's stage of readiness to change are critical for effective treatment. Five stages are identified in this model<sup>10,11</sup>:

- *Precontemplation*: stage at which the patient does not intend to change behavior in the foreseeable future. A patient at this stage may be unaware or only vaguely aware of his/her problem.
- *Contemplation*: stage at which the patient is aware of the problem and is seriously considering changing behavior but does not make a commitment to take action. Patients at this stage often feel ambivalent about the sense of loss they may feel despite the perceived gain of overcoming their problem.
- *Planning and preparation*: stage at which the patient intends to take action within the next 30 days and has taken some steps toward treatment. This stage combines intention and behavioral criteria, such as making small modifications to behavior that signal a decision to change.
- *Action*: stage at which the patient changes behavior and commits a considerable amount of time and energy to overcoming the problem. This stage lasts from the time of the initial action to 6 months.
- *Maintenance*: stage at which the patient continues to prevent relapse from 6 months to an indefinite period beyond the initial action.

These stages are conceptualized as a cycle or spiral because the process is fluid; individuals often move back and forth between stages and do not necessarily move directly from one stage to the next. The model accepts the repetitive nature of an individual's alcohol and/or substance use and understands that relapse may occur.

## B. Relapse Prevention

### RECOMMENDATION:

**Clinicians should ask patients who have been abstinent from illicit drug use for less than 1 year about the date of last use at routine monitoring visits.**

By definition, recovery from substance use behavior can be interrupted by periods of relapse. Relapse is defined by the American Society of Addiction Medicine as the “recurrence of psychoactive substance-dependent behavior in an individual who has previously achieved and maintained abstinence for a significant period of time beyond withdrawal.”<sup>2</sup>

#### **Key Point:**

Stable abstinence depends on relapse prevention and not just detoxification.

Patients with a known history of substance/alcohol dependence are at high risk for relapse, especially when they are in an early recovery period (<1 year) or when stressed by a new diagnosis of HIV or its complications. Some common reasons for relapse and strategies to prevent relapse are shown in Table 3.

**TABLE 3**  
**REASONS FOR AND STRATEGIES TO PREVENT RELAPSE**

#### **Common Reasons for Relapse:**

- Patient not well prepared for the significant and prolonged effort needed to maintain sobriety
- Patient not clear about the specific overall treatment goals
- Patient not properly equipped with strategies (refusal skills, recognition of cues, coping skills) to anticipate and react to high-risk situations

#### **Strategies to Prevent Relapse:**

- Careful use of medications to avoid inadvertently treating the patient with medications that could lead to relapse
- Appropriate treatment of pain because untreated pain may be a trigger for relapse
- Careful observation for periods of increased stress

By asking patients about the date of last use of substances at every monitoring visit, clinicians can diagnose relapse earlier as well as reinforce successful efforts. If relapse occurs, the clinician should not view it as a failure but as an opportunity to learn from what happened and to change tactics to more effectively prevent future relapse.

#### **Key Point:**

A patient’s unwillingness to discuss his/her recovery program with the primary care clinician may be one of the first signs of relapse.

If a patient does relapse, the clinician should:

- Be nonjudgmental and voice continued optimism
- Ask what the specific circumstances were that led the patient to use again
- Encourage a return to treatment
- Discuss difficulties and stresses
- Reassess the need to initiate pharmacotherapy or adjust doses
- Refer to or include other providers, such as social workers, in the patient's care
- Schedule more frequent visits
- Prescribe clean syringes and needles, furnish them through the Expanded Syringe Access Demonstration Program, or refer patients to a syringe exchange program

## V. SPECTRUM OF INTERVENTIONS

### **RECOMMENDATION:**

**Clinicians should offer and support a repertoire of substance use treatment goals, such as abstinence, a reduction in use, or safer use, and should advocate safer sex practices among HIV-infected substance users.**

### **A. Brief Interventions and Education**

#### **RECOMMENDATIONS:**

**Clinicians should educate substance-using patients about the detrimental effects of illicit drug use, alcohol use, and misuse of prescription drugs to help stimulate behavior change.**

**Clinicians should present information in language that is easily understood by the patient, avoiding medical jargon and ensuring that written materials are tailored to the intended audience.**

Brief interventions refer to providers' offering education, advice, and counseling, which may vary from brief advice to a short motivational interview. Brief interventions may foster patients' motivation to seek referral to a specialist or a treatment program. Such interventions may also help some substance users reduce use, which would potentially reduce risky behaviors and associated adverse medical and social consequences.

Concern about their own health status may be an encouraging stimulus for some substance users to change their substance use behavior. Implementing measures such as brief interventions that support the patient in addressing a specific health behavior has been shown to be effective in primary care populations. Meta-analyses have found that brief interventions are effective in reducing cigarette smoking<sup>12</sup> and excessive alcohol use.<sup>13</sup> Some studies have shown that brief interventions targeting illicit drug use may also be effective for reducing use.<sup>14</sup> Brief interventions may also help more impaired patients engage in additional treatment.

Clinicians should include the following intervention topics when discussing substance use with patients:

- Risks commonly associated with substances used, either present or past
- Means to reduce physical, mental, and social problems attributable to substance use
- Benefits of change
- Referrals to other services if needed

## **B. Motivational Interviewing**

Motivational interviewing encourages open, productive discussions about behavior and uses the patient’s own strengths and beliefs as a tool to motivate behavior change.<sup>15</sup> Motivational interviewing is a therapeutic treatment style that may be used to explore issues of ambivalence and conflict regarding substance use and treatment. Through use of motivational interviewing, the clinician attempts to stimulate change by identifying discrepancies in the patient’s current behavior and the patient’s goals of healthier behaviors. When the patient begins to understand how the consequences of current behavior conflict with personal values, the clinician reflects the discordance back to the patient, until the patient realizes that change is necessary and makes the decision to commit to change. This approach encourages patients to describe their behaviors and develop their own solutions.

Motivational interviewing is not a set of tools to be used with all patients, but one of many options for interacting with them. For patients who have difficulty tolerating direct communication or who may not be able to identify their own needs, use of motivational interviewing may not be suitable. Direct persuasion and aggressive confrontation are not part of motivational interviewing. With this approach, clinicians do not give advice or directives.

### **1. Principles of Motivational Interviewing**

Clinicians should understand the underlying principles of motivational interviewing before using it. The four key components of motivational interviewing are shown in Table 4.

<b>TABLE 4 KEY COMPONENTS OF MOTIVATIONAL INTERVIEWING</b>	
<b>Component</b>	<b>Involves</b>
<b>Expressing empathy</b>	Understanding and being aware of and sensitive to the feelings, thoughts, and experiences of another. Accomplished through reflective listening.
<b>Supporting self-efficacy</b>	Supporting the patient with the sense that an individual can identify and meet one’s needs and goals.
<b>Avoiding argumentation and rolling with resistance</b>	Listening to the patient’s resistance to change. Working collaboratively with the patient to develop his/her input regarding the treatment plan.
<b>Discovering discrepancies</b>	Helping patients identify discrepancies between their current behavior and desired future behavior.

*Expressing empathy:* To gain a better understanding of the patient’s perspective, the clinician actively listens without being judgmental. Through this reflective listening, the clinician may find that the patient is not ready or willing to stop engaging in a particular behavior or to adopt a new behavior. In this case, the initial focus is on building therapeutic rapport and supporting the patient, instead of verbally suggesting change.

*Supporting self-efficacy:* Self-efficacy refers to a person’s belief in his/her ability to successfully carry out a specific task. The clinician should support the patient’s belief in his/her ability to change by giving the patient examples of positive change and emphasizing the importance of taking responsibility. When the patient feels strong support from the clinician, it enhances his/her sense of self-efficacy.

*Avoiding argumentation and rolling with resistance:* Motivational interviewing differs from other approaches to behavior change in that it does not label patients (e.g., “non-compliant” or “difficult”). When faced with a patient’s resistance, it is important for the clinician to allow the resistance to be expressed. Through this process, the clinician reflects the patient’s questions and concerns back to the patient, so that the patient may further examine the possible alternatives to this resistance. The patient then becomes the source of the positive actions that could be taken, does not feel defeated in sharing his/her concerns, and is able to take the risk to express feelings.

*Discovering discrepancies:* Once patient-provider rapport has been established, the goal is to discover and amplify discrepancies between present and past behavior and future goals. This is achieved through examination of the consequences of continuing an unhealthy behavior and often involves discussing the advantages of adopting a new behavior. The patient will then be able to present the argument for change and begin to realize the need for change.

## **2. Motivational Interviewing Approach**

The acronym OARS outlines the basic approach to interactions in motivational interviewing:

*Open-ended questions* invite patients to provide more information than yes or no and will encourage them to explore their own motivators for change. This strategy lets the patient know that the clinician is interested in his/her situation, while allowing the clinician to obtain needed information and insight into the patient’s issues.

*Affirmations* provide opportunities for clinicians to recognize the patients’ strengths.

*Reflective listening* helps the clinician identify areas of ambivalence. Reflective listening is often challenging because the clinician may need to form assumptions about the meaning of the patients’ statements in order to articulate them back to the patient. It is particularly important to reflect back any statements that indicate that the patient is motivated to change. *Simple* reflections acknowledge the patient’s statements about disagreements, feelings, or perceptions. *Double-sided* reflections acknowledge both what the patient has said and the ambivalence. *Amplified* reflections reveal the patient’s ambivalence in a slightly exaggerated form.

*Summaries* will emphasize the main points of the discussion and should capture both sides of the patient’s ambivalence. The summary can also be used to shift focus or direction when the patient is expressing impassible resistance. After the clinician summarizes, he/she should invite the patient to make any corrections.

More resources on motivational interviewing are available at [Motivational Interviewing](#).

### **C. Promoting Safer Sex Practices**

#### **RECOMMENDATION:**

**Clinicians should discuss behavioral risk-reduction measures for prevention of sexually transmitted infections, including correct and consistent condom use, on a routine and ongoing basis.**

Individuals under the influence of some substances are more likely to engage in sexual risk-taking behavior than individuals not under the influence of substances.<sup>16-19</sup> It is important to address risk associated directly with substance use, such as needle-sharing and sexual risk-taking, which may result from impaired judgment due to substance use, as well as risks associated with the exchange of sex for drugs.

Clinicians should discuss safer sex practices with HIV-infected substance users. Sex that takes place in the context of substance use, or in exchange for money or drugs, is associated with increased risk of HIV exposure and transmission, although safer sex practices should be adopted in all contexts. Specific discussions with patients about using barrier protection, about how to speak with partners about safer sex, and about the circumstances under which they engage in high-risk sexual behavior may enhance the effectiveness of patients’ efforts to protect themselves and their partners from further transmission.

Clinicians who treat sexually active patients should counsel them on how to reduce the negative consequences of unprotected sex, such as unplanned pregnancy, HIV transmission, and sexually transmitted infections, and should provide them with condoms. This promotes the message “be safe,” which is different from “just say no.”

### **D. Harm-Reduction Approach**

Harm reduction focuses on reducing the negative health, social, and economic consequences associated with risk behaviors that are related to substance use.<sup>20</sup> Methods to reduce risk behaviors that cannot be entirely eliminated have become common in medical and public health practice. Evidence has shown that providing access to clean syringes and education does not promote drug use.<sup>21</sup> The approach of harm reduction is intended to engage the patient in health care through the clinician’s nonjudgmental stance toward the patient’s current substance use, enabling the clinician and patient to work together toward reducing risk behavior while promoting health. When working with active substance users, clinicians can engage the patient in any level of care, including medical care for HIV infection, harm-reduction services, treatment for substance use, or all three (see [Appendix V](#)).

Abstinence-oriented approaches and harm-reduction approaches need not be mutually exclusive. Harm reduction acknowledges that the long-term, chronic-relapsing nature of substance use makes total abstinence difficult for many substance users and works to keep patients involved in care, regardless of the level of their current substance use. Many clinicians who work in traditional abstinence-oriented programs have adopted harm-reduction principles, recognizing relapse as a part of the process for some substance users. Abstinence-oriented programs should also continue to work with an individual toward reducing harm, even when substance use is continuing.

**Key Point:**

Some patients using multiple substances may diminish or stop using one drug at a time rather than abstaining from all drugs at once. It is important that patients be positively recognized for such steps.

*Harm-Reduction Techniques for HIV-Infected Injection Drug Users*

Harm reduction may be an effective strategy for reducing risk in injection drug users (IDUs) who are not ready for treatment or who are at risk for relapse. By educating IDUs about where to access new needles and syringes, safe disposal and storage of needles/syringes, safe techniques for injection, and how to prevent overdose, clinicians can reduce harm to the patient and to others even though the patient is still using.

If a patient is not ready to stop using drugs, or cannot stop, the effects of substance use should be discussed to ensure that the patient understands the harm caused by substance use. This discussion may lead the patient to consider stopping or reducing drug use. Risk-reduction options to discuss include:

- Discontinuation of illicit drug use
- Discontinuation of injection of illicit drugs
- The use of new needles and syringes for every injection if unable to stop injecting
- Cleaning the needle and syringe with bleach and water if unable to obtain new needles and syringes
- Avoiding sharing any equipment, including needles, syringes, filtration cotton and cooker, with others

**1. Access to Clean Needles**

**RECOMMENDATIONS:**

**Clinicians should issue prescriptions for new needles and syringes to patients who inject drugs.**

**Clinicians should discuss with patients other options for accessing new needles and syringes, including use of the Expanded Syringe Access Demonstration Program and Syringe Exchange Programs, New York State's two syringe access initiatives.**

**Clinicians should discuss avoidance of needle/syringe-sharing activity with all injection drug users, regardless of viral load, to prevent HIV and hepatitis B and C virus transmission.**

In New York State, pharmacies, healthcare facilities, and healthcare practitioners who are registered in the Expanded Syringe Access Demonstration Program (ESAP) can sell or furnish, without a prescription, hypodermic needles and syringes to individuals 18 years of age and older. No more than 10 hypodermic needles or syringes can be sold or furnished to an individual at one time.

IDUs should be informed of this law and should receive instruction on how to locate participants. Safe storage and proper disposal of sharps should also be discussed. Clinicians can obtain more information on these issues from the [New York State Department of Health](http://www.health.state.ny.us) (NYSDOH), or by contacting the NYSDOH by email: [ESAP@health.state.ny.us](mailto:ESAP@health.state.ny.us).<sup>22</sup>

**2. Safe Storage and Disposal of Sharps**

**RECOMMENDATION:**

**Clinicians should ensure that injection drug users receive instructions concerning safe techniques for storage and disposal of sharps.**

Used needles and syringes should be properly stored until they can be safely discarded. IDUs should be instructed to follow the guidelines in Table 5 for safely storing used needles and syringes. To prevent harm caused by improper disposal of used needles, IDUs should take used sharps to any hospital, nursing home, syringe exchange program, or syringe-disposal site located throughout New York State. Healthcare providers, the local public works department, sanitation department, or trash collectors should also know how to advise individuals on how and where to dispose of sharps properly.

<b>TABLE 5 SAFE STORAGE OF USED SHARPS</b>	
<b>Do</b>	<b>Don't</b>
<ul style="list-style-type: none"> <li>• Put used sharps (needles, syringes, lancets) in a sharps container or a puncture-resistant, plastic bottle (e.g., bleach or laundry detergent bottle). Close the screw-on top tightly. Tape top. Label bottle: “Contains Sharps.”</li> <li>• Immediately dispose of sharps into container after use. Keep container closed between uses.</li> <li>• Keep sharps containers away from children and pets.</li> <li>• Bring sharps container when traveling and dispose of it at home upon return.</li> </ul>	<ul style="list-style-type: none"> <li>• Clip, bend, or recap sharps.</li> <li>• Put sharps in soda cans, milk cartons, or in any containers that are not puncture resistant. Coffee cans are not recommended because plastic lids come off too easily and may leak.</li> <li>• Flush sharps down the toilet or drop them into a storm sewer.</li> <li>• Put sharps containers with the recycling.</li> </ul>

### 3. Safer Injection Techniques

**RECOMMENDATION:**

**Safe injection techniques should be discussed with injection drug users who are not ready or willing to stop injecting drugs.**

If the patient does not want to stop injecting drugs, the clinician should discuss safer injection techniques, such as sterile technique, rotating sites, and avoiding high-risk sites, such as the feet, groin, and neck, to reduce any harm that might result from bad injection habits.<sup>23</sup> Patients should be advised to clean the injection site with alcohol or soap and water as well as to wash their hands before injecting. Patients should be advised to avoid sharing any injection equipment including drug preparation equipment such as cookers (metal bottle caps), water for dissolving drugs and rinsing syringes, cotton for filtering the solution, and tourniquets.

### 4. Overdose Prevention

*Updated March 2009*

**RECOMMENDATION:**

**Clinicians should counsel substance-using patients about the risk of overdose and how it may be prevented.**

Heroin and other opioid use is associated with a significant increase in mortality, approximately half of which is due to overdose. The risk of death may be as high as 2% per year. Opioid overdose is characterized by respiratory depression primarily due to reduction in brainstem sensitivity to carbon dioxide, which may lead to death. Death usually occurs 1 to 3 hours after injection, rather than suddenly, and is often witnessed by someone who does not recognize the danger or does not act on it.<sup>24</sup> In many cases of overdose, opioids are mixed with alcohol or benzodiazepines. Overdose is most common among those who have been using for 5 to 10 years, rather than in the new user. Table 6 lists other risk factors associated with overdose; Table 7 identifies harm-reduction topics related to overdose that clinicians should discuss with substance users who use opioids.

<b>TABLE 6 BEHAVIORAL RISK FACTORS FOR HEROIN AND OTHER OPIOID OVERDOSE</b>
<ul style="list-style-type: none"><li>• Resumption of use after a period of abstinence from opioid use, such as recent release from detoxification, drug treatment, or correctional facility</li><li>• Use of opioids without others present raises the risk of fatality</li><li>• Mixing opioids with other drugs, particularly alcohol or benzodiazepines</li><li>• Injection</li><li>• Concurrent serious medical conditions, particularly AIDS and hepatic dysfunction</li></ul>

There is compelling evidence that opioid users and others who may witness an overdose may benefit from training in resuscitation and the provision of naloxone (Narcan), which can be administered to companions should they overdose.<sup>25</sup> Naloxone is a prescription medicine that reverses an overdose by blocking heroin (or other opioids) in the brain for 30 to 90 minutes. In

New York State, a law that took effect in April 2006 allows for the use of naloxone as first aid if administered in good faith by a nonmedical person intending to reverse an opioid overdose. After being trained by State-approved overdose prevention programs and receiving a naloxone kit or prescription from a professional licensed to prescribe, responders are permitted to carry and administer naloxone without risk of prosecution.

For prehospital rescue of patients with suspected opioid overdose, the intramuscular (IM) route of naloxone is preferred. Although intranasal (IN) naloxone appears to approximate the effects of the IM formulation, at the time of writing, it is not FDA-approved, and no well-designed randomized clinical trial satisfactorily compares the effectiveness of routes of administration using the exact doses and formulations currently available. For some individuals and in particular settings, IN naloxone offers a needleless alternative to IM naloxone.<sup>26-29</sup>

Agencies providing naloxone training services include syringe exchange programs, drug treatment programs, HIV service providers, and other community-based organizations. Clinicians can refer patients to these services and/or register to prescribe naloxone to patients who have been trained in its use. Clinicians prescribing naloxone to responders in New York State must be registered with the NYSDOH. More information is available at [NYSDOH Opioid Overdose Prevention](#).

**Key Point:**

Metadone and buprenorphine maintenance have been demonstrated to be effective preventive measures for overdose. Both reduce the use of illicit opioids and maintain a level of tolerance to the effects of opioids, including respiratory depression.

**TABLE 7**  
**ELEMENTS OF RISK-REDUCTION COUNSELING TO PREVENT OVERDOSE**

- The risks of using alone
- The risk of using after a period of abstinence
- The danger of mixing other depressants with opioids
- Recognition of the signs of a possible opioid overdose in another user
- Learning mouth-to-mouth breathing or CPR
- Calling 911 to report someone who is unconscious or not breathing. Be prepared for possible police involvement. When the ambulance comes, report exactly what the person took.
- Use of and being prescribed naloxone, an antidote for opioids. Naloxone can precipitate withdrawal symptoms.

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## **FURTHER READING**

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