AXCEL TREATMENT & RECOVERY CENTER PATIENT HANDBOOK

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Dosing Hours Monday- Friday 5:00 am-10:00 am Saturday 6:00am-8:00am

> 4527 Stonewall Street Greenville, Texas 75401 Phone: 903-494-3400 Fax: 903-461-7763

Dosing Hours Monday- Friday 5:30 am-10:00 am Saturday 6:00am-7:00am

Fees (Effective 9/1/2023)

Methadone \$90.00 p/week \$14.00 p/day Buprenorphine/Suboxone \$350.00 p/month \$15.00 p/day

Guest Dosing \$25.00 p/day Transfer Fee \$25.00 Methadone New Admit \$75.00 Buprenorphine/Suboxone New Admit \$150.00 Missed Appointment Fee \$25.00

WELCOME TO AXCEL TREATMENT AND RECOVERY CENTER

This handbook is intended to provide you with the information you need to make your involvement in the treatment program productive.

This handbook explains the treatment program, what you should expect of us, and what is expected of you. These expectations are important, because they help us to maintain a working community and to keep all patients on a path toward remission from their substance use disorder and a better quality of life.

Axcel Treatment and Recovery Center philosophy is helping each patient understand the full recovery process of addiction, and begin the healing, renewing the mind, body and spirit and respond to those who came to us for help with compassion and professional competence by creating and maintaining an environment conducive to personal human growth. This environment must be safe, nurturing and free from abuse. While patients must always be encouraged to face the realities and consequences of the illness of addiction, it must be done with the utmost respect for the rights of the individual. In all cases treatment will occur at the least restrictive level of care that is appropriate for the current level of severity of illness.

Axcel Treatment and Recovery Center believes that opioid use disorder is a treatable illness of the body, mind, and spirit. We believe that the combination of medication, counseling and counseling are necessary to help you achieve remission from your substance use disorder. Medication for Opioid Use Disorder (methadone, buprenorphine, suboxone, subutex), individual coaching and counseling, cognitive group counseling, and other supportive recovery interventions are effective modalities of treatment. Full remission from substance use disorder is possible, it is a process/journey, and we believe together you can achieve remission and peace of mind.

Value Statements

Recovery has many paths

We Value Mind, Body, and Spirit

Patients must be treated with compassion and respect

We Value Patients Rights

Quality plus improvement leads to excellence

We Value Excellence, Effectiveness, and TEAMWORK

If a treatment is appropriate and produces desired results, it is effective; what we cannot accomplish alone we can accomplish together.

WHAT IS OPIOID TREATMENT PROGRAM?

In the United States, the use medication for opioid use disorder (MOUD) in opioid treatment programs (OTPs) is governed by the <u>Certification of Opioid Treatment Programs</u>, <u>42 Code of Federal Regulations (CFR) 8</u>. The regulation created a system to certify and accredit OTPs, allowing them to administer and dispense FDA-approved medications. In addition, opioid use disorder (OUD) patients receiving these medications also receive counseling and other behavioral therapies to provide patients with a whole-person approach.

WHAT IS METHADONE?

Methadone belongs to the opioid family of drugs; it is a long-acting synthetic narcotic analgesic. In the early 1960s, two New York physicians, Vincent Dole and Marie Nyswander, discovered that when methadone is taken every day, it is an effective medical treatment for opioid addiction. Since the 1960s, methadone has been used to help people who are dependent on other drugs from the same opioid family such as heroin, morphine and codeine. It is an opioid agonist, which is like narcotic medications, including morphine.

How does methadone work?

Methadone is an opiate agonist, which has a series of actions similar to those of morphine and other narcotic medications. When taken on a daily basis (every 24 to 36 hours), it eliminates physical withdrawal symptoms. Additionally, when you are an effective dose level, you no longer have cravings for opioids, and if you do use, methadone blocks the euphoric effect of opioid abuse.

How effective is methadone maintenance?

Opiate dependency is a chronic, relapsing, incurable but eminently treatable illness. The objectives of methadone maintenance treatment follow from this orientation: to improve function, lessen symptoms and

discomfort, and lower the rate of mortality associated with addiction. When measured against each of these indicators, methadone maintenance is extremely effective. Compared to other major drug treatment modalities (e.g., drug free outpatient treatment, therapeutic communities and general chemical dependency treatment) methadone is the most studied treatment modality and has yielded the best results.

Is methadone safe?

When taken as prescribed, methadone is very safe and will not cause any damage to the body or brain.

How much methadone will I need?

There is no single methadone dose level. The amount of methadone you require to achieve the therapeutic benefits depend upon many factors, such as your body's metabolism rate, weight, and the type and amount of opioid you were dependent upon. The proper maintenance dose is one at which narcotic cravings is averted, without creating euphoria, sedation or analgesia for 24 to 36 hours.

How long do I need to be in treatment?

The patient determines the length of time in treatment. However, when looking at withdrawing from methadone, your treatment counselor will look for clinical indicators that are necessary for successful, long-term recovery. Research finds that most patients are in treatment between 2-3 years; however, success in treatment can be seen within months. This success comes not only from the daily administration of methadone but also from a commitment to counseling. Others remain in treatment for longer periods. All patients are evaluated for treatment progress every 90 days, with medical physical examinations every year.

Answers To Your Questions About Methadone

Methadone is one of the most widely researched medications in the US, and also one of the more misunderstood medications for use in recovering from substance dependency. This information is not intended to be all inclusive, but is intended to assist your decision to enter treatment. Extensive questions and answers may be found at the National Institute on Drug Abuse (NIDA) web site.

You Cannot Safely Withdraw from Methadone. True or False FALSE.

Because methadone is very long acting, withdrawal from methadone does last much longer than withdrawal from short-acting opioids. Research found that withdrawal symptoms actually were less severe in patients maintained on methadone than in those taking equivalent doses of short-acting opioids like heroin. Gradual withdrawal from methadone, when properly done under medical supervision, can be virtually free of discomfort. On the other hand, patients who try to withdraw from methadone by themselves, on their own time and dose schedule, usually experience undue discomfort and fail.

Methadone Patients Are At Higher Risk for Traffic Accidents and Should Not Operate Heavy Equipment. True or False

FALSE.

The public has justified concerns about persons using alcohol or any drugs that might impair mental functioning while driving motor vehicles. Federal motor vehicle regulations prohibit operation of motor vehicles under the influence of psycho-active substances. The key to this question is "under the influence". A person adequately stabilized on methadone is not impaired or "under the influence".

Patients going through opioid withdrawal due to insufficient methadone doses, or experiencing methadone overmedication effects, such as sleepiness or fatigue, might not perform as well. This includes methadone patients who are abusing other substances, such as alcohol or benzodiazepine medications. Any central nervous system depressant medications or substances will impair your skills and ability to safely operate a motor vehicle or operate equipment.

To Assist in Withdrawal, I Should Keep My Methadone Dose Low. True or False FALSE.

The therapeutic benefits of methadone are to eliminate cravings and withdrawal symptoms, and provide a blockade effect if opioids are used. Patients who do not reach their therapeutic methadone levels do not enjoy the benefits of methadone and the feeling of being "normal" again. Treatment experience demonstrated that patients who keep methadone levels low are not successful in a drug-free recovery, and have very high relapse rates within 30 days of detoxification.

There is no specific dose that is best for everyone. Your methadone dose level is dependent upon many factors, which the Medical Director considers when adjusting your daily dose.

Methadone is trading one addiction for another. True or False **FALSE.**

The term "addiction" refers to the loss of control over drug use or other behaviors such as eating or gambling, with resulting social, health and family difficulties. Methadone-maintained patients are in control of their daily medication and noted improvement is seen in their daily social and family lives. Drug Czar, General McCafferey used the comparison of methadone-maintained patients being similar to diabetics or others who require daily medication to remain healthy.

Methadone Harms Your Bones, Rots Teeth, and Causes Internal Organ Damage. True of False FALSE.

Over forty years of research demonstrates the positive effects of methadone on patients health. Patients have significantly reduced risks of infections associated with IV drug abuse, sexual behaviors, and other risky health behaviors. Many methadone-maintained patients begin experiencing increased physical and mental health within days of starting a treatment program. Most medical conditions observed in methadone-maintained patients are either related to their preexisting health conditions, new conditions secondary to their past drug abuse, or normal aging processes and health.

A patient's health actually improves in methadone maintenance treatment.

If I Am A Methadone Maintained Patient, Would I Require Pain Medications Following An Injury Or Surgery. True or False

TRUE.

Methadone maintained patients have a higher tolerance for the effects of opioids, which are used to control pain. Since methadone is an analgesic, many believe a methadone-maintained patient does not experience pain. On the contrary, patients stabilized on methadone feel pain just like anybody else. When it comes to treating pain, you will have the same needs as other people for adequate pain medication. For headaches or muscle strain, over-the-counter painkillers (analgesic) should do the job. If pain is more severe and/or long lasting, opioid painkillers with actions similar to morphine may be prescribed.

Methadone is an opiate agonist. Some pain medications are opioid antagonists that block the effects of methadone and precipitate withdrawal symptoms. Propoxyphene medications are not recommended because large doses may be needed to provide adequate pain relief in a methadone-maintained patient.

If I am pregnant I need to get off methadone. True of False

FALSE

A pregnant woman who abuses opioid drugs risks serious damage to herself and her unborn child. While methadone itself does not eliminate all potential problems of pregnancy, a comprehensive methadone maintenance treatment (MMT) program can greatly reduce the possibility of sickness or even death in the mother or child.

Opioid drug use can cause serious complications during pregnancy, including miscarriage or premature delivery. Medical experts have recommended methadone maintenance for opioid-dependent pregnant women. Research has clearly shown that methadone maintenance is safe for pregnant women and offers a much greater chance for a healthy baby.

Methadone maintenance:

- Helps the mother escape from a drug-seeking lifestyle.
- Reduces the risks of contracting HIV, hepatitis and other infections.
- Prevents erratic blood levels of drugs that put the unborn baby through dangerous withdrawal.
- Improves nutrition, leading to a healthier weight and condition of the newborn.
- Reduces medical complications both before and during childbirth, allowing for a healthier newborn.

Methadone can cause permanent damage to the fetus. True or False

FALSE

When you use other opiates during preganant the fetus experiences rapid intoxication and rapid withdrawal. The cycles of intoxication and withdrawal come quicker for the fetus and are more severe. Withdrawal is very severe for your unborn baby. This causes the baby heart rate too slow and increase in a pattern that is unhealthy and potentially damaging. In addition, if you use too much you could overdose, as could your baby. At birth, the infant may have a slightly lower than average birth weight than a drug-free newborn. This is only temporary and can usually be avoided if the pregnant woman receives proper care before childbirth, and does not smoke or drink alcohol. Methadone crosses from the mother to the baby in the womb, and the baby can experience some withdrawal symptoms during the first few days after birth. Withdrawal usually develops slowly and is routinely treated by the baby's doctor. There is no long-lasting harm to the child from methadone.

The methadone should be continued as the mother is in the hospital. A mother can breast-feed her new baby while taking methadone. Although methadone does show up in breast milk, research has shown that it is too small an amount to affect or harm the child. However, a mother should not breast-feed if she has an infection such as HIV or hepatitis.

WHAT IS SUBOXONE?

Suboxone is an opioid prescription drug used to treat opioid dependence. It can be used as an induction agent to stabilize someone in withdrawal during the medical detoxification process as well as for maintenance treatment to promote recovery from opioid use disorder. It consists of a combination of two drugs: **buprenorphine** (a partial opioid agonist) and **naloxone** (an opioid antagonist) and is administered as a dissolvable film placed either under the tongue or in the cheek. The U.S. Food and Drug Administration (FDA) approved a generic buprenorphine and naloxone sublingual (applied under the tongue) in 2018.

HOW DOES SUBOXONE WORK?

Buprenorphine is what's known as a partial opioid agonist—an opioid medication that produces relatively weak opioid effects. This means that buprenorphine reduces withdrawal symptoms and cravings without producing the full effect of other opioids (such as heroin, fentanyl, oxycodone, hydrocodone, etc.), which can make it easier for you to stop using your opioid drug of choice.¹

With high binding affinity, it may also block other opioids from binding to and activating your opioid receptors, which can deter misuse of other opioids.^{1,3}

As a partial agonist, buprenorphine also has an upper limit to its opioid effects, even with escalating doses. The risk of misuse and overdose is lower than with other opioids because there is a limit as to how much your opioid receptors can be activated. This helps reduce the potential for respiratory depression (dangerously slowed breathing), which is a risk and symptom of opioid overdose.^{1,3}

Naloxone is an opioid receptor antagonist medication that is combined with buprenorphine in Suboxone and similar generic combination formulations. Though naloxone is used on its own to reverse the deadly effects of opioid overdose, it is instead included in this combo to help discourage intentional misuse of buprenorphine, should it be dissolved and injected or inhaled nasally—doing so would result in the rapid onset of withdrawal in opioid dependent individuals.^{1,3,4}

While it is an effective medication for opioid addiction, Suboxone is often utilized as part of a comprehensive treatment approach that incorporates not only medications, but behavioral interventions, mutual-help groups and, when needed, treatment for any co-occurring mental health conditions (like depression or anxiety).

What is Buprenorphine?

Buprenorphine is the first medication to treat opioid use disorder (OUD) that can be prescribed or dispensed in physician offices, significantly increasing access to treatment. As with all medications used in treatment, buprenorphine should be prescribed as part of a comprehensive treatment plan that includes counseling and other services to provide patients with a whole-person approach. Buprenorphine offers several benefits to those with OUD and to others for whom treatment in an Opioid Treatment Clinic is not appropriate or is less convenient.

How Buprenorphine Works

Buprenorphine is an opioid partial agonist. It produces effects such as euphoria or respiratory depression at low to moderate doses. With buprenorphine, however, these effects are weaker than full opioid agonists such as methadone and heroin. When taken as prescribed, buprenorphine is safe and effective. Buprenorphine has unique pharmacological properties that help:

➤ Diminish the effects of physical dependency to opioids, such as withdrawal symptoms and cravings

This program is licensed by the Texas Health and Human Services Commission and CARF Accredited

- Increase safety in cases of overdose
- > Lower the potential for misuse

Buprenorphine for Opioid Use Disorder

To begin treatment, an OUD patient must abstain from using opioids for at least 12 to 24 hours and be in the early stages of opioid withdrawal. Patents with opioids in their bloodstream or who are not in the early stages of withdrawal, may experience acute withdrawal.

After a patient has discontinued or greatly reduced their opioid use, no longer has cravings, and is experiencing few, if any, side effects, if needed, the dose of buprenorphine may be adjusted. Due to the long-acting agent of buprenorphine, once patients are stabilized, it may be possible to switch from every day to alternate-day dosing.

The length of time a patient receives buprenorphine is tailored to meet the needs of each patient, and in some cases, treatment can be indefinite. To prevent possible relapse, individuals can engage in on-going treatment—with or without medication.

SAMSHA GUIDES

SAMHSA has developed a <u>Buprenorphine Quick Start Guide (PDF | 1.4 MB)</u> and <u>pocket guide (PDF | 200 KB)</u> for all practitioners seeking to prescribe buprenorphine.

Follow Directions: How To Use Methadone Safely (2009)

This <u>brochure</u> describes the use of methadone in Medications for Opioid Use Disorder (MOUD) of heroin and other opioids (also in Spanish).

Tip 63: Medications for Opioid Use Disorder (2021)

This <u>Treatment Improvement Protocol</u> reviews the use of the three FDA-approved medications used to treat OUD.

YOUR RIGHTS AS A PATIENT

- 1) You have the right to accept or refuse treatment after receiving this explanation.
- 2) If you agree to treatment or medication, you have the right to change your mind at any time (unless specifically restricted by law).
- 3) You have the right to a humane environment that provides reasonable protection from harm and appropriate privacy for your personal needs.
- 4) All persons have a right to services and shall not be discriminated against based on gender, social preference, cultural orientation, psychological characteristics, sexual orientation, physical situation, and spiritual beliefs.
- 5) You have the right to be free from abuse, neglect, and exploitation.
- 6) You have the right to be treated with dignity and respect.
- 7) You have the right to appropriate treatment in the least restrictive setting available that meets your needs.
- 8) You have the right to be told about the program's rules and regulations before you are admitted.
- 9) You have the right to be told before admission:

- the condition to be treated;
- the proposed treatment;
- the risks, benefits, and side effects of all proposed treatment and medication;
- the probable health and mental health consequences of refusing treatment;
- other treatments that are available and which ones, if any, might be appropriate for you; and
- the expected length of stay.
- 10) You have the right to a treatment plan designed to meet your needs, and you have the right to take part in developing that plan.
- 11) You have the right to meet with staff to review and update the treatment plan on a regular basis.
- 12) You have the right to change counselors if you feel that another counselor may be more responsive to your needs.
- 13) You have the right to freedom from financial exploitation.
- 14) You have the right to refuse to take part in research without affecting your regular care.
- 15) You have the right not to receive unnecessary or excessive medication.
- 16) You have a right not to be held or segregated unless you are a danger to yourself.
- 17) You have the right to protection from behavioral disruptions. Threatening or aggressive behavior is not allowed.
- 18) You have the right to have information about you kept private and to be told about the times when the information can be released without your permission.
- 19) You have the right to be told in advance of all estimated charges and any limitations on the length of services of which the facility is aware.
- 20) You have the right to change your mind about treatment and withdraw permissions.
- 21) You have the right to receive an explanation of your treatment or your rights if you have questions while you are in treatment.
- 22) You have the right to make a complaint and receive a fair response from the facility within a reasonable amount of time.
- 23) You have the right to complain directly to the Health and Human Service Commission at any reasonable time.
- 24) You have the right to get a copy of these rights before you are admitted, including the address and phone number of the Health and Human Service Commission.
- 25) You have the right to have your rights explained to you in simple terms, in a way you can understand, within 24 hours of being admitted.
- 26) You have the right of investigation and resolution of alleged infringements of the above rights.

TO MAKE A COMPLAINT

- 1. Obtain a grievance form from any staff member or in the lobby waiting area.
- 2. Write out what the issues is and what you would like to see happen. A staff member can help you fill out this form if needed.
- 3. Place the grievance in the grievance box. The Program Sponsor or designee will obtain the grievance and review it, he/she will contact you for more information. After a complete review is done, you will be notified in writing (within 7 days) what the outcome was and any action taken.

- 4. If you are unhappy with the outcome you can request, that the grievance be reviewed by the clinic owner. The clinic owner will follow the same procedure and notify you of the outcome and any action taken within 7 days.
- 5. If you remain unhappy, or at anytime during this process, you may contact the below listed agencies for an independent review. If you need help contacting any of these agencies a staff member will assist you.

This facility or any of its employees does not restrict, discourage, intimidate, harass or seek retribution against any patient or employee who tries to exercise their rights or file a complaint. The same is true for any persons suspected or known cases of patient abuse, neglect, or exploitation.

Substance Abuse Facility Investigations (MC 2823) Texas Health and Human Service Commission

PO Box 149347 Austin, TX 78714-9347 Fax: (512) 821-4470

Complaint hotline: (800) 832-9623, press "1" for English, then press "3" to file a complaint

Substance Abuse and Mental Health Administration (CSAT)

1 Choke Cherry Rd. Rockville, MA 20857 Phone: (240) 276-2700

Texas Medical Board

Investigation Department MC-263 PO Box 2018 Austin, Texas 78762-2018 Complaint Hotline: 800-201-9353

Texas Department of Family and Protective Service

(800) 252-5400

Texas Health and Human Service Commission (SMA)

Narcotic Treatment Program Licensure (512) 719-0237

PATIENT RIGHTS CONCERNING CONFIDENTIALITY

There are stringent federal and state laws that protect your right to confidentially as a patient; however there are a few exceptions to this rule. Information can be released:

- 1. If suspected child abuse, neglect, exploitation is suspected.
- 2. If authorized by an appropriate order of a court of competent jurisdiction granted application showing good cause.

- 3. In accordance with your prior written consent.
- 4. To medical personal to the extent necessary to meet a bona fide medical emergency.
- 5. To qualified personal for the purpose of conducting scientific research, management audits, financial audits or program evaluation; but such personal may not identify, directly or indirectly, any individual patient in any report of such research, audit, or evaluation, or otherwise disclose patient identities in any manner.

The confidentiality of alcohol and drug abuse patient records maintained by this program is protected by Federal law and regulations. Generally, the program may not say to a person outside the program that a patient attends the program, or disclose any information identifying a patient as an alcohol or drug abuser *Unless:*

- A. The patient consents in writing;
- B. The disclosure is allowed by a Court Order; or
- C. The disclosure is made to medical personnel in a medical emergency or to qualified personnel for research, audit or program evaluation.

This confidentiality includes your personal identifying information (privacy practices). Please read your treatment consents, patient rights, and privacy practices documents closely and ask questions if you do not understand something. We take your privacy very seriously as we understand that others in the community may use your treatment against you.

Violation of the Federal law and regulations related to privacy and confidentiality by a program is a crime. Suspected violations may be reported to appropriate authorities in accordance with Federal regulations.

Federal law and regulations do not protect any information about a crime committed by a patient either at the program or against any person who works for the program or about any threat to commit such a crime. This means that if you threaten to commit a crime or commit a crime, we have the right to report this to the police. If we believe you are a danger to another person, we have a duty to warn the local law enforcement. This includes domestic violence and terrorist acts.

Federal laws and regulations do not protect any information about suspected child abuse or neglect from being reported under State law to appropriate State or local authority. This means that if you tell us or we suspect that a child, elder, or disabled person under your care is being abuse, neglected or exploited- we will report this to the appropriate authorities.

Our counselors will always try to talk with you about any concerns we may have around safety (yours and others), unless they feel this places themselves or others in danger. If you are having a crisis or felling unsafe in any way, please talk with us so that we can assist you before the situation comes to a place that cannot be resolved. Remember we are your advocates, here to help you have a better life, and we can't do that if you don't talk to us when you are struggling.

PATIENT ABUSE, NEGLECT, AND EXPLOITATION

We expressly prohibit abuse, neglect and exploitation of any patient, and, furthermore, takes all reasonable precautions to protect all patients from abuse, neglect, and exploitation while patients at any of our programs.

Definitions:

<u>Abuse:</u> Any act or failure to act which is done knowingly, recklessly or intentionally, including incitement to act, which caused or may have caused injury to a patient. Injury may include, but is not limited to: physical injury, mental disorientation, or emotional harm, whether it is caused by physical action or verbal statement. Without regard to actual proof of injury, patient abuse is any sexual activity between a staff member, volunteer or Partners member of The Axcel and a patient, corporal punishment, nutritional or sleep deprivation, systematic provocation to fear, or the use of verbal or other forms of communication to curse, shame, or degrade the value or self-worth of a patient or threaten a patient with physical or emotional harm. Restraint that does not conform to these standards is abuse.

<u>Neglect:</u> Actions resulting from inattention, disregard, carelessness, ignoring or omission of reasonable consideration that caused or might have caused physical or emotional injury to a patient. Examples of neglect include, but are not limited to: failure to provide nutrition, clothing or health care; failure to provide a safe environment; or failure to provide an environment free of patient abuse.

<u>Exploitation:</u> An act or process to use, either directly or indirectly, the labor or resources of a patient for monetary or personal benefit, personal benefit, profit or gain of another individual or organization.

<u>Sexual Exploitation:</u> A pattern, practice, or scheme of conduct by a person that may include sexual contact, that can reasonably be construed as being for the purpose of sexual arousal or gratification or sexual abuse of any person. It is not a defense to sexual exploitation of a patient or former patient if it occurs:

- with or without the consent of the patient or former patient;
- on-site or outside of therapy or treatment;
- on or off the premises used for therapy or treatment;
- any time within a two-year period following termination of treatment.

Child Abuse: Non-accidental infliction, or threat of infliction, of physical, emotional, or mental harm to a child.

<u>Child Neglect:</u> Non-accidental failure or threatened failure to provide a child with the physical and emotional requirements for life, growth, and development.

We follow written procedures regarding patient abuse, neglect and exploitation to ensure maximum consumer protection and to comply with all applicable laws and regulations regarding patient abuse, neglect and exploitation.

Any person who receives an allegation or has reason to suspect that a patient has been, is, or will be abused, neglected, or exploited shall immediately inform the Program Sponsor or designee. This includes situations in which a staff member receives a patient complaint alleging acts or omissions which may constitute abuse, neglect or exploitation or has some other reason to believe that such an incident may have occurred.

The Program Sponsor or designee must take immediate action to prevent or stop the abuse, neglect or exploitation and provide appropriate care and treatment. The Program Sponsor or designee must make a verbal report to the **SMA Investigations Department** immediately but not longer than 24 hours. In accordance with the Texas Human Resources Code, Chapter 48.082, the report shall identify patient who are elderly or disabled. In accordance with the Texas Family Code, Chapter 261.001, the report shall specify when the incident involves an individual who is a minor or who is disabled. If Axcel has cause to believe that a child who is not a patient has been abused or neglected, Axcel shall make an oral report to the Department of Protective and Regulatory Services or local law enforcement within 48 hours as described in Texas Family Code, Chapter 261.001. In accordance with Civil Practice and Remedies Code, Section 81.006, if the allegations involve sexual exploitation, the Program Sponsor or designee or deisgnee must report the information to the prosecuting attorney in the county in which the alleged conduct occurred and, if applicable, to the professional's state licensing board. A report of sexual exploitation may be limited to information needed to identify the reporter and the alleged victim (unless the victim wants to remain anonymous) and to express the suspicion that sexual exploitation has occurred.

The Program Sponsor or designee must submit a written report to the SMA Investigations Department within two working days after receiving notification of the incident. This report must include:

- the name of the patient and the persons the allegations are against;
- > the elements required in the incident report or a copy of the incident report;
- other individuals, organizations and law enforcement notified.

The Program Sponsor or designee is also responsible for notifying the patient's legal consenter. If the patient is the legal consenter, family members and significant others may be notified only with the patient's written consent.

Any staff members who have allegedly committed patient abuse, neglect, or exploitation shall be removed from direct care with patients until all investigations have been completed. If allegations are confirmed, the staff member shall be terminated, and any appropriate legal action shall be taken against that person.

YOUR RESPONSIBILITIES AS A PATIENT

The effectiveness, efficiency and safety of addiction treatment are enhanced when you, the patient, act as a partner with the treatment team in the health care process. Consequently, you have some responsibilities in your relationship with your care providers. We also encourage you to allow the significant others in your life to participate in this partnership by allowing us, with your consent, to contact them and engage them in the treatment process.

Providing Information - We ask that you provide, to the best of your knowledge, accurate and complete information about your present condition and circumstances, past illnesses, current medications, previous hospitalizations and treatment experiences, medications you have been taking, true and accurate information about your drug and alcohol use, and all matters relating to your substance use and behavioral and physical health. Report any and all changes in your condition to staff. You will help provide the best possible care to you by providing us with as much information as you can.

Asking Questions- We want and expect you to ask questions when you do not understand your care and treatment or what is expected of you. We want to make sure you understand and are in agreement with your treatment plan.

Participate Fully- It's important that you take your medication as prescribed, attend all coaching/counseling sessions, meet with the medical staff as scheduled and refrain (don't use) illicit drugs, unprescribed medication or consume alcohol. Achieving remission from your substance use disorder requires all of this.

Following Rules & Regulations – Your safety and wellbeing is our priority. The program has a set of rules and regulations that are based on Federal laws, State Regulations and Best Practices. These are all in place to ensure that you have safe and effective treatment of your opioid use disorder.

Accepting Consequences – When there are clinical or administrative issues, we always talk with you about them first and seek and agreeable resolution. However, there are some issues where we have a very specific course of action we must take.

Showing Respect & Consideration - We ask that you are respectful of the clinic staff and other patients (and their property), even if you are emotionally upset. Your safety and the safety of others is very important to us.

Meeting Financial Commitments – You are the guarantor for your treatment costs, should promptly meet the financial obligations you made with Axcel Treatment and Recovery Center. Our staff are here to provide quality medical and psychological care to you, they do not want to have to also be a "bill collector"- this creates an unnecessary tension between you and you helping professional. If you are having financial difficulties talk with your counselor before you reach the point where you cannot meet your obligations. We do have resources to help people having financial difficulties.

PROGRAM RULES AND EXPECTATIONS

- 1. We use a patient portal for all forms, communication and most important scheduling of appointments. You must have an email address and phone number (cellphone preferred). This is mandatory. You counselor can help you set up your portal at the day of admission.
- 2. You must attend all appointments, unless excused. (Excused absences are death in the immediate family, court appointments, car trouble in route to treatment). These must be approved in advance. There are fees for missed appointments.
- 3. For persons with take outs, **random call backs and urine drugs screens are mandatory.** Failing a callback or urine drug screen will result in a level change. Please review the callback procedures in your patient handbook.
- 4. No drugs, alcohol or weapons on the property. The open carry laws do not apply at this clinic; it is a federal offense to have a weapon on the property of a methadone clinic. The police will be called and you will be immediately discharged from the program.
- 5. Maintain confidentiality.
- 6. Attend clinic between hours of Monday- Friday 5:30am and 10:00am and Saturday 6am-8am. No late dosing will be done unless prior arrangements have been made. **There is a fee for late dosing.**
- 7. Documentation is required for all excused absences.
- 8. Be on time for all scheduled appointments.
- 9. If you are absent for 3 consecutive days, the doctor will decide what to start your dose as. Your dose

- maybe decreased by 50% or 30mg, whichever is higher. If you miss 4 or more days, the doctor may start you over in the induction phase.
- 10. Dose change decisions are made by the doctor. Exaggeration of withdrawal symptoms is not tolerated and could be dangerous to your health.
- 11. You must meet with your counselor as scheduled. Treatment plans are required as part of your treatment and it is your right and responsibility to participate in their formation.
- 12. You will be required to provide a monthly urine screen. These are done randomly.
- 13. You will be required to have an annual TB test.
- 14. Non-compliant UA will result in level changes and increase frequency of attendance.
- 15. You must provide copies of your prescription when prescribed a medication. PRN medications must have a renewed prescription every three months.
- 16. Talk with your nurse or counselor if considering tapering, every dose change must be reviewed and approved by the doctor.
- 17. All methadone fees shall be paid weekly to avoid administrative detox. You may pay the daily rate if you cannot pay the weekly rate, however if you miss one daily payment, the next day you must bring payment for both days otherwise you will be placed on administrative detox. You must stay current with your financial responsibilities. Consistent late payment will affect your ability to receive a level change.
- 18. All suboxone fees shall be paid monthly to avoid administrative detox. Prescription refills will not be called into the pharmacy until fees are paid. If you are placed an administrative detox, you'll have to come to the clinic daily to be dosed and will have to pay the daily rate. You must stay current with your financial responsibilities.
- 19. We encourage participation in outside support groups such as AA/NA or online sober oriented support groups.
- 20. Adhere to the "smoking" policy. You may not smoke in the building or within 100 feet of any entrance.
- 21. Negative behavior that creates safety issues for staff, other patients and visitors will not be tolerated.
- 22. Conservative casual dress is required. Please come to the clinic dressed for a medical appointment. No sunglasses are allowed in appointments. No sagging pants, miniskirts, short shorts, halter-tops, midriff tops, spaghetti strap tops, spandex clothing, or clothing advertising alcohol or illegal drugs are allowed. You must be in clothing that covers your body appropriately, no pajamas or bed wear, and no slippers. Writing and pictures on clothing may not encourage, glorify or demonstrate profanity, alcohol and drug use, smoking, or sexual behavior. Keep your clothes rated G.
- 23. No children or family will be allowed in the dispensing area. They can be in the waiting room with supervision. Do not leave children unattended in vehicles in the parking lot-its dangerous.
- 24. No soliciting (selling or buying) and loitering outside the clinic.
- 25. Intoxicated or over medicated persons are not medicated. This is at the nurse's discretion. She may ask for a breathalyzer. This is for your safety.
- 26. Medical records must be requested in writing. There is a \$25 fee.
- 27. You will be screened for risks related to HIV, hepatitis, STD's and referrals will be given for testing.
- 28. Holidays and other closings are posted in advance; you are responsible to ensuring you have adequate medication during the closed period.

The following rule violations may result in discharge from the program:

1. Continued use of illicit substances while in treatment. UA's will be administered monthly. A patient refusing a request to submit will be considered the same as a positive result. This will be evaluated by

- the doctor.
- 2. Acting out with physical or verbal violence. The threat of violence is as serious as the act.
- 3. Possession of alcohol, drugs or paraphernalia on the property.
- 4. Diversion of medication (selling, gifting or buying you or others medication). This is not only unsafe but also illegal.
- 5. Absences 14 days or longer, without approved excuse.
- 6. Lack of progress in the program.

CALL BACK POLICY AND PROCEDURE

All patients of Axcel are subject to random call back to the clinic in order for their take-home medications to be verified. These random call backs are to verify patient stability, and in an effort to decrease the risks of medication diversion. If there is more than one member of a family/household utilizing methadone/buprenorphine, all members will be required to return to the clinic at the same time.

- *It is the responsibility of THE PATIENT to ensure that a current and viable phone number is on file with clinic.
- *Voicemails may be left on machines, or voicemail accounts, *only* if they acknowledge that they belong to the patient.
- *Patients who miss a phone call must contact Axcel immediately.
- *Patients will be informed to return to the clinic the next day, with all empty medication bottles, and any remaining doses.
- *Patients are NOT TO DOSE until they are in the clinic being monitored by nursing staff.
- *All medications are to be returned to the clinic in a locked box.
- *It is the responsibility of THE PATIENT to notify the nursing staff if leaving town. This will prevent a call back to the patient during the time stated to be out of town.
- *Failure to attend the clinic at the scheduled time will constitute a failed call-back.
- *Missing doses, or doses which have been tampered with, in any way, will constitute a failed call back.
- *Failure to follow procedures in any way will constitute a failed call back.
- *Consequences of a failed call back will include, but are not limited to increased attendance.

The following happens when you get to the clinic:

On return to the clinic, the patient will have a staff supervised drug screen.

On return to the clinic, the nursing staff will perform confirmation of the take out medications. A control dose will be utilized. Medications will be confirmed by visual inspection of bottle for puncture marks, an intact seal, by volume, color, and smell.

The following attendance changes which will occur with a failed call back. In the event of extenuating circumstances, exception or modification, may be granted by the Medical Director.

In the event of a failed call back, attendance will immediately increase to daily for thirty days. If during the thirty days of daily attendance, the patient has a drug screen positive for illicit substances, the daily attendance will continue thru the period of probation.

At the end of the thirty days, if all eight points of criteria are met, patients may advance to one level below their previous attendance requirement. This attendance requirement will remain in place for a minimum of thirty days. In order to return to the previous attendance requirement, patients must pass a call back during this period of increased attendance, the patient has a drug screen which is positive for illicit substances, the increased attendance will continue thru the probationary period. A second "positive" drug screen will result in the patient staying at this attendance requirement until all eight points of criteria are met, inclusive of the consecutive drug screens required for promotion.

Patients with a failed call-back in their history will not be allowed to decrease attendance beyond one time weekly without having demonstrated their stability by having passed a separate call back between three to twelve months from the initially failed call back.

In the event that a patient fails two call backs within any twelve-month period, attendance requirements will return to those of a new patient.

INFORMED CONSENT FOR OPIATE DEPENDENT INDIVIDUALS SEEKING TREATMENT- ADULT MEN AND WOMEN

Your diagnosis is opioid/opiate use disorder. Having a diagnosis of opioid/opiate use disorder means that you have or are currently experiencing problems related to your use of prescription pain killers or heroin. When you have a diagnosis of opioid/opiate use disorder, it means that you are in a high-risk category or that your substance use is more severe than what you may think or feel. You have the following three options:

1. Recommended treatment for you includes a daily dose of medication (methadone or buprenorphine) that will prevent you from experiencing withdrawal symptoms or cravings. In addition, it is recommended that you participate in chemical dependency counseling and any other care you might need.

Benefits:

- You will receive a steady and stable dose of medication and will be able to return to normal functioning
 by stopping physical withdrawal symptoms and eliminating cravings. The medication would help you
 refocus on work, family and other responsibilities.
- Medications are taken orally which reduces risks of contracting infectious diseases through an injection.

Medication is legal and is monitored by a physician.

Risks:

- Opiate replacement therapy is not short-term. You may be taking this medication for a year or more depending on the individual.
- If you suddenly stop taking the medication you will experience withdrawal symptoms.
- You should not consume alcohol or mix your medication with illicit drugs. You should also consult with the prescribing physician regarding the increase risk of medication interaction and potential overdose.
- You should not consume any other opiates while on opiate replacement therapy, due to the increased likelihood for overdose and death by overdose.
- 2. You could choose medically managed detoxification which means you will be slowly taken off or tapered off of opioids/opiates over a period of days in a treatment setting:

Benefits:

• You will not have to take medication daily.

Risks:

- The risk of relapsing or returning to using opioids/opiates illegally is much higher.
- Increased problems with physical and mental health issues.
- Trying to detox by yourself may result in extreme physical discomfort.
- 3. You could also choose to not accept treatment and keep using opioids/opiates.

Risks:

• The problems you are experiencing will get worse.

MULTIPLE CLINIC REGISTRATIONS

Being enrolled at more than one methadone clinic is a federal crime. We check Texas central registry to make sure you are not receiving medication from another clinic. We will also check the PRESCRIPTION MONITORING PROGRAM for any opiate, benzodiazepine, sedative medications. If you are enrolled in the Denison clinic, we will send a letter to the nearby OK clinics list below to verify that you are not enrolled in any other out of state clinics. Once admitted to our clinic, we will register your enrollment in the Texas Central OTP Registry. This is a federal and state requirement. The Texas Central Registry is only available to persons authorized to access it and access is limited. It is not available or accessible to the public and is safeguarded by a security vendor.

Denison

Program Name	Street	City	State	Zip Code	<u>Phone</u>
Southern Oklahoma Treatment Services, Ardmore	905 Holiday Dr.	Ardmore	OK	73401	(580) 226-5003
Southern Oklahoma Treatment Services	5912 US Hwy 70	Mead	OK	73449	(580) 745-9083

Arkansas Treatment	408 Hazel Street	Texarkana	AR	71854	(870) 774-0421	
Services, PA						

BENZODIAZEPINE/SEDITION/HYPNOTICS WARNING

Sedatives encompass a wide variety of drugs with different mechanisms of action that can induce depression of the central nervous system (CNS), this is know as CNS depression. Opiates also fall into the category of a sedative (analgesic), thus making it a CNS depressant as well. Methadone and Buprenorphine are both long acting opiates. Suboxone is a medication that includes buprenorphine and naloxone. The combination of opiates with another CNS depressant is deadly and many people overdose every year with this combination.

Some people think that you can not have an overdoes with Suboxone because of the naloxone, this is misinformation, many people in fact suffer fatal (and non-fatal) overdoses as a result of taking other CNS depressants with suboxone.

Barbiturates and Benzodiazepines

Barbiturates are nonselective CNS depressants that used to be the mainstay of treatment to sedate patients or to induce and maintain sleep. In modern medicine they have been largely replaced by the benzodiazepines, primarily because they can induce tolerance, physical dependence and serious withdrawal symptoms. Nevertheless, certain barbiturates are still employed as anticonvulsants (phenobarbital) and to induce anesthesia (thiopental). The representatives of this group are:

Amobarbital (Amytal)

Aprobarbital (Alurate)

Butabarbital (Butisol)

Mephobarbital (Mebaral)

Methohexital (Brevital)

Pentobarbital (Nembutal)

Phenobarbitol (Luminal)

Primidone (Mysoline)

Secobarbital (Seconal)

Thiopental (Penothal)

Benzodiazepines are the most widely used group of sedative drugs. Due to their safety and improved effectiveness, they have largely replaced barbiturates as drugs of choice in the treatment of anxiety. They also have hypnotic, anticonvulsant and muscle-relaxing activities, but do not exhibit analgesic action or antipsychotic activity. The representatives of this group are:

Alcohol (ethyl alcohol or ethanol)

Alprazolam (Xanax)

Chloral hydrate (Somnote)

Chlordiazepoxide (Librium)

Clorazepate (Tranxene)

Clonazepam (Klonopin)

Diazepam (Valium)

Estazolam (Prosom) Flunitrazepam (Rohypnol) Flurazepam (Dalmane) Lorazepam (Ativan) Midazolam (Versed) Nitrazepam (Mogadon) Oxazepam (Serax) Temazepam (Restoril) Triazolam (Halcion)

Other Sedatives

Nonbenzodiazepine "Z-drugs" sedative-hypnotics are drugs that differ in structure from benzodiazepines, but acts on a subset of the benzodiazepine receptor family known as BZ1. Their onset of action is rapid, and they are considered the preferred hypnotics as they do not significantly alter the various sleep stages due to their relative selectivity for the aforementioned receptor. The representatives of this group are:

Eszopiclone (Lunesta) Zaleplon (Sonata) Zolpidem (Ambien) Zopiclone (Zimovane)

Certain antihistamines with sedating properties (also known as first-generation antihistamines) are effective in treating mild forms of insomnia, although numerous undesirable side effects (such as their anticholinergic properties) make them less useful in comparison with benzodiazepines. Some sedative antihistamines can be found in numerous over-the-counter products. The representatives of this group are:

Chlorpheniramine (Histafen) Dexchlorpheniramine (Polaramine) Dimenhydrinate (Dramamine) Diphenhydramine (Benadryl) Promethazine (Phenergan) Trimeprazine (Vallergan Forte)

Herbal sedatives have been used all over the world to treat insomnia and anxiety for thousands of years. Although they are undoubtedly effective to certain extent, some aspects of their psychopharmacology have to be resolved; for example, there is poor in vivo evidence of pharmacodynamics in humans, problematic efficacy evaluation in clinical studies, as well as cumbersome production of standardized extracts and lack of bioequivalence between different extracts. The representatives of this group are:

Atractylodes macrocephala Dimocarpus longan Dorstenia arifolia Ipomoea tyrianthina Hypericum montbretii Piper methysticum Valeriana officinalis

Zizyphus jujuba Mill var. spinosa

Other sedatives include alcohol, opioid sedatives, anesthetics, carbinols, agonists of melatonin receptors and other medicines that also act as CNS depressants via different mechanisms. They usually have limited therapeutic use, and some of the representatives are:

Chloral hydrate (Aquachloral)
Dexmedetomidine (Precedex)
Ethchlorvynol (Placidyl)
Etomidate (Amidate)
Glutethimide (Doriden)
Methyprylon (Nodular)
Meprobamate (Miltown)
Methaqualone (Quaalude)
Paraldehyde (Paral)
Propofol (Diprivan)
Ramelteon (Rozerem)
Dexmedetomidine (Precedex)

Other substances with CNS depressant effect

Commercial THC Ketamine

TAKING METHADONE/BUPRENORPHINE WITH OTHER MEDICATIONS

Sedatives are not the only drugs that can be dangerous when combined with methadone and buprenorphine. Some prescription medications and some over the counter medications may have potential adverse reaction with your medication. You should always inform anyone prescribing medication to you, that you are taking methadone.

Please know that if you take more medication that you are prescribed, including your methadone or buprenorphine, you are putting your life at risk. If we suspect misuse of medications, including your methadone, we may require you to attend the clinic daily. This is for your protection as well as ours.

If you are using other drugs (prescribed, legal, or illicit), you may be detoxed off the methadone. Drugs that depress your central nervous system (alcohol, anxiety pills, sleeping pills, pain medications, etc.) are especially dangerous and if the doctor believes you to be using these he/she may alter your medication regime. Stimulants (cocaine, ADD medication, diet pills, etc.) also present an extreme danger to may result in changes to your medication regime. If the doctor believes you to be using medications in a way that endangers your life, you may be detoxed off the methadone.

If you are using buprenorphine, suboxone, subutex, naltrexone (prescribed or obtained illegally) you cannot be on methadone. If you have recently taken these medications, you must let the doctor know as you are at high risk for overdose.

Requests to increase or decrease your dosage will be evaluated by the doctor and may be denied or amended as requested.

Please notify staff of any new medications your are taking and do not use any illicit drugs while taking methadone.

PREGNANCY

All females of child bearing age are given a pregnancy test at admission.

In addition, if the female declares that she "might" be pregnant or there is a "chance" of pregnancy she is asked to submit urine for a pregnancy test during active treatment.

Females are not given random pregnancy tests unless there is a clinical suspicion of pregnancy or behavior that may lead to pregnancy. The nurse will discuss her concern with the patient, consult the physician and counselor with recommended course of action.

It is important to keep the mother comfortable. Many times pregnancy can cause the mother to need a higher dose especially later in the pregnancy. To keep the mother on an insufficient dose can possibly risk the fetus as well as increase drug seeking behavior and discomfort. This can lead to illicit drug use and expose the fetus to far more dangerous substances than methadone.

The reason methadone maintenance is the preferred treatment for pregnant patients is that detox, illicit drug use and its associated behaviors all have a higher risk factor than if the mother is maintained on a stable dose of methadone and is consistently monitored by counseling and medical staff.

NEONATAL ABSTINENCE SYNDROME

Neonatal abstinence syndrome (NAS) is a group of problems that occur in a newborn who was exposed to addictive opiate drugs while in the mother's womb.

<u>Causes</u>

Neonatal abstinence syndrome may occur when a pregnant woman takes drugs such as heroin, codeine, oxycodone (Oxycontin), methadone or buprenorphine. These and other substances pass through the placenta that connects the baby to its mother in the womb. The baby becomes dependent on the drug along with the mother. If the mother continues to use the drugs within the week or so before delivery, the baby will be dependent on the drug at birth. Because the baby is no longer getting the drug after birth, withdrawal symptoms may occur as the drug is slowly cleared from the baby's system. Withdrawal symptoms also may occur in babies exposed to alcohol, benzodiazepines, barbiturates, and certain antidepressants (SSRIs) while in the womb.

Babies of mothers who use other addictive drugs (nicotine, amphetamines, cocaine, marijuana,) may have long-term problems. While there is no clear evidence of a neonatal abstinence syndrome for other drugs, they may contribute to the severity of a baby's NAS symptoms.

Symptoms

The symptoms of neonatal abstinence syndrome depend on:

- The type of drug the mother used
- How the body breaks down and clears the drug (influenced by genetic factors)
- How much of the drug she was taking
- How long she used the drug
- Whether the baby was born full-term or early (premature)

Symptoms often begin within 1 to 3 days after birth, but may take up to a week to appear. Because of this, the baby will most often need to stay in the hospital for observation and monitoring for up to a week. Symptoms may include:

- Blotchy skin coloring (mottling)
- Diarrhea
- Excessive crying or high-pitched crying
- Excessive sucking
- Fever
- Hyperactive reflexes
- Increased muscle tone
- Irritability
- Poor feeding
- Rapid breathing
- Seizures
- Sleep problems
- Slow weight gain
- Stuffy nose, sneezing
- Sweating
- Trembling (tremors)
- Vomiting

Exams and Tests

Many other conditions can produce the same symptoms as neonatal abstinence syndrome. To help make a diagnosis, the health care provider will ask questions about the mother's drug use. The mother may be asked about which drugs she took during pregnancy, and when she last took them. The mother's urine may be screened for drugs as well.

Tests that may be done to help diagnose withdrawal in a newborn include:

- Neonatal abstinence syndrome scoring system, which assigns points based on each symptom and its severity. The infant's score can help determine treatment.
- Toxicology (drug) screen of urine and of first bowel movements (meconium).

Treatment

Treatment depends on:

- The drug involved
- The infant's overall health and abstinence scores
- Whether the baby was born full-term or premature

The health care team will watch the newborn carefully for up to a week after birth for signs of withdrawal, feeding problems, and weight gain. Babies who vomit or who are very dehydrated may need to get fluids through a vein (IV).

Infants with neonatal abstinence syndrome are often fussy and hard to calm. Tips to calm the infant down include measures often referred to as "TLC" (tender loving care):

- · Gently rocking the child
- Reducing noise and lights
- Swaddling the baby in a blanket

Some babies with severe symptoms need medicines such as methadone and morphine to treat withdrawal symptoms. These babies may need to stay in the hospital for weeks or months after birth. The goal of treatment is to prescribe the infant a drug similar to the one the mother used during pregnancy and slowly decrease the dose over time. This helps wean the baby off the drug and relieves some withdrawal symptoms.

If the symptoms are severe, especially if other drugs were used, a second medicine such as phenobarbital or clonidine may be added. Breastfeeding may also be helpful if the mother is in a methadone or buprenorphine treatment program without other drug use.

Babies with this condition often have severe diaper rash or other areas of skin breakdown. This requires treatment with special ointment or cream.

Babies may also have problems with feeding or slow growth. These problems may require:

- Higher-calorie feedings that provide greater nutrition
- Smaller portions given more often

Outlook (Prognosis)

Treatment helps relieve symptoms of withdrawal. Even after medical treatment for NAS is over and babies leave the hospital, they may need extra "TLC" for weeks or months. Babies do recover and usually have no permanent impairments from the drugs themselves.

Most long-terms problems tend to be related the "drug use lifestyle" consequences that come with illicit drug use such as poor diet and eating habits, infections, communicable disease, physical and sexual victimization, smoking cigarettes, drinking alcohol.

For the baby and mom to have the best pregnancy outcome it is important for the mom to seek treatment for her addiction. Methadone is the recommended treatment.

Possible Complications

Drug and alcohol use during pregnancy can lead to many health problems in the baby besides NAS. These may include:

Birth defects

- Low birth weight
- Premature birth
- Small head circumference
- Sudden infant death syndrome (SIDS)
- Problems with development and behavior

Neonatal abstinence syndrome treatment can last from 1 week to 6 months. Even after medical treatment for NAS is over and babies leave the hospital, they may need extra "TLC" for weeks or months.

When to Contact a Medical Professional

Make sure your health care provider knows about all the drugs you take during pregnancy. Call your provider if your baby has symptoms of neonatal abstinence syndrome.

Why you need to stay/take methadone or suboxone when you are pregnant

INFORMED CONSENT FOR PREGNANT OPIOID/OPIATE DEPENDENT INDIVIDUALS SEEKING TREATMENT

Your diagnosis is opioid/opiate use disorder. Having a diagnosis of opioid/opiate use disorder means that you have or are currently experiencing problems related to your use of prescription pain killers or heroin. When you are pregnant and have a diagnosis of opioid/opiate use disorder it means that you are in a high risk category or that your disease is more severe. You have the following three options:

Recommended treatment for you includes a daily dose of medication (methadone or buprenorphine) that will prevent you from experiencing withdrawal symptoms or cravings. In addition, chemical dependency counseling, prenatal care, and any other care you might need are recommended.

Benefits:

- Provides better outcomes for your baby such as higher birth weight and lower risk of complications.
- Provides a steady and stable dose of medication throughout the day so that your baby is not at risk for complications associated with withdrawals including death.
- Reduces the risk of using needles which reduces the risk of transferring diseases to your baby.
- Reduces the risk of problems during pregnancy and delivery.

Risks:

- It is likely that your baby will experience withdrawal symptoms after birth.
- These symptoms are called Neonatal Abstinence Syndrome or NAS. NAS can be treated in the hospital. The presence of NAS does not mean that your child will continue to have problems later.

You could choose medically managed detoxification which means you will be slowly taken off or tapered off of opioids/opiates over a period of days in a treatment setting: *Trying to detox by yourself is extremely dangerous for you and your baby.*

Benefits:

- Your baby may not experience withdrawal symptoms after birth.
- You will not have to take medication daily.

Risks:

- The risk of miscarriage or your baby (the fetus) dying is much higher.
- Your risk of relapsing or returning to using opioids/opiates illegally is much higher.

You could also choose to not accept treatment and keep using opioids/opiates.

Risks:

- The risk of miscarriage (the fetus dying) is much higher. Every time you experience withdrawal symptoms or cravings, your baby (the fetus) is at risk of dying.
- The problems you are experiencing will get worse.
- It is likely that your baby will experience withdrawal symptoms after birth.

DRUG SCREENS

Axcel patients are required to have at least 12 monthly urine drug screens during the first year of treatment and 8 random urine drug screens per year thereafter. In addition, if there is a suspicion of illicit drug use you may be selected for drug testing. Axcel tests for the following substances:

- Amphetamines
- Barbiturates
- Benzodiazepines
- Cocaine
- Opiates
- Methadone and Methadone Metabolites
- THC

The Clinic shall ensure that an initial drug test or analysis is performed for each new patient, including permanent transfer patients, before the initial or maintenance dose is administered, and at least monthly random tests or analyses are performed on each patient in comprehensive maintenance treatment for the initial year of treatment and eight random drug abuse tests yearly thereafter.

When a sample is collected from each patient for such test or analysis, it must be done in a manner that minimizes opportunity for falsification.

All urine samples are collected at random, unless illicit drug use is suspected.

All outcomes are reported to the patient and documented in the patient record and patient response to the test results.

If a patient refuses to provide a test sample, that shall be considered the same as a positive result for illicit drugs. Such refusals shall be documented in the patient record.

All patient will positive UA's will be required to meet with their primary therapist for counseling and planning. Repeated positive UA will result in a behavior contract and could result in discharge from the program.

Drug screens are random per SMA rules and regulations. When a patient cannot give an immediate drug screen he/ she must wait in the clinic until a specimen can be obtained. Under certain circumstances, the patient is

given the choice to return to the next day for an observed drug screen or take a "positive". This allows the patient to have an option if they cannot urinate. Observed drug screens are rarely requested unless a patient is suspected of tampering with the results.

Patient is given a clean bottle and top and asked to provide a urine specimen for testing. There is no warm water available in the rest room to alter specimen. After urinating the specimen is handed to a waiting staff member. It is checked for authenticity (warmth, color, amount) It is labeled with the patient's number immediately. It is stored behind a locked door until clinic closes. It is then packaged and sent to the lab for screening.

Urinalysis is not a sole basis for treatment decisions. Other basis for treatment decisions are based on drug use history, compliance, attitude, physician approved medications and counselor input.

In case of questionable drug screen results the patient may request a recheck by LC/MS. The cost of this confirmation is \$25.

ADMISSION DRUG SCREENS

Upon admission we collect a urine drug screen to better help us to understand what substances are in your blood and how to proceed with your initial dose. We will do a rapid screen on site and then send the remaining urine to the lab for confirmation. The doctor will use the results of your rapid screen to make initial dose decisions.

ONGOING DRUG SCREENS

We are required to collect urine drug screens on all patients every month. Drugs screen results are either compliant or non-compliant. A compliant drug screen has no positive result for the substance tested and has a positive result for methadone metabolites (unless on suboxone).

If a patient has a non-compliant drug screen, they are not eligible for take homes. You will stay on or return to PHASE 0. The doctor will determine the rate at which take homes are reinstated.

SUPERVISED/OBSERVED DRUG SCREENS

These are done when we suspect falsification or other tampering with urine. As required by federal law, we also do observed drug screens randomly on patients. The same gender staff member will enter the restroom and verify that the urine provided has not been tampered with.

FALSIFIED URINE DRUG SCREENS

Each urine drug screen is tested for specific gravity/creat. A creat result between 10-20 can be excused by the physician for medical reasons (diuretic use, excessive caffeine, diabetes). Any result under a 10, can NOT be excused by the physician and the process for non-compliant drug screens will apply.

THC RULES

We test for THC at admission or if the patient has a circumstance during the course of treatment that necessitates to test for THC.

MEDICATION PROCESSES

Dosing Procedures

No medication related action (dispensing or prescribing of methadone/buprenorphine) can be taken without a physician's order. Nurses can refuse to dose a patient one day's dose if the patient appears to be overmedicated or intoxicated. This is at the nurse's discretion and a justification must be documented. If the patient is a high-risk patient it will be reviewed with the physician.

Patients must call the clinic if they are going to be late. They may not be dosed if they do not give the clinic sufficient notice. Appropriate fees will be assessed. We charge a \$25 late dosing fee and it must be paid before you can receive your medication.

No dose will leave the clinic unless it is in a locked container. You cannot borrow another patient's storage box. The storage box must be locked at the nurse's station.

When a patient admits to the clinic, the doctor will determine the initial dose. It is typical for a new patient to start at 30mg. Patients who transfer from another clinic will be started at their verified dose. The doctor or nurse will monitor the patient for adverse effects before sending then home.

Stabilization Period

The doctor will increase the dosage no more than 5mg a day. At 50mg the patient will be monitored for acute withdrawal symptoms and the dose will be adjusted accordingly. All dose changes must be completed by the patient and submitted in simple practice. The nurse will send you the form when you request a dose change. Once the request is received the nurse will schedule an evaluation with you that includes vital signs and a discussion about your symptoms and other stressor happening in your life. Dose increases only happen for acute withdrawal as measure by a clinical opiate withdrawal scale. The physical will be contacted for review and approval. Dose changes will not be initiated on the same day of request unless approved by physician.

Patients on methadone who would like an increase that exceed 100mg per day will be required to have an EKG, the EKG will be reviewed by the Physician and the patient will have a face to face review and assessment.

After you have stabilized and are not experiencing withdrawal symptoms, you can discuss dose changes with your physician (or the nurse). The doctor will determine the most appropriate course of treatment that addresses you concerns and discomfort. We do not force you to take more medication than you want.

When you miss three consecutive days of dosing a physician review and order to resume medication is required. You will be required to take and pay for a drug screen. If you are positive for illicit substances, the physician will have to evaluate what dosage of medication to start you back on and your clinic attendance. You may be required to wait until no substances in system before resuming dosing.

When you return to the clinic following hospitalization you will need to bring a copy of your medication administration record and discharge paperwork from the hospital. The nurse will verify the admission, discharge, diagnosis and prescription information and report to the physician. The physician will evaluate the medical course of action in terms of dosing. You may be required to meet with the physician before resuming treatment in the clinic. It is the physician discretion as to the medically necessary course of action.

Split dose requests require physician approval and require and exception from the state methadone authority. You must submit a request to the nurse who will schedule an appointment with the physician. You

must have been participating in clinic service for at least three months. Once you are approved by the physician for split dose and Peak & Trough (P&T) is drawn for baseline measure and to determine the extent of the metabolism of the methadone. An exception is submitted to DSHS and when approval is received, the split dose order is written by the physician and implemented on the day designated by the physician.

You must take at least 50% of your dose in the morning, either observed or unobserved (dependent on attendance) and the physician will determine the second dose time, usually 12 hours later.

At the physician discretion the P&T can be repeated to determine therapeutic effectiveness, usually done at day 8. The therapeutic level on the PT is 100-1000ML. This is done if the you continue to demonstrate or report the ineffectiveness of the methadone.

You must be meet the following criteria to be considered for a split dose:

- Pregnant and testing negative for methadone, especially if entering the third trimester of pregnancy. Pregnant patients tend to metabolize methadone very quickly in their third trimester.
- Complaints that dose is not holding despite dose increases and that there are no other contributing factors to the patients physical and emotional distress.
- Exhibits symptoms of withdrawal.
- Patient meets with physician to ensure that all avenue of stabilization have been deployed and have been ineffective.
- The patient has met with the counselor to explore other psychosocial reasons that may be impacting medication effectiveness.
- The patient will receive ongoing education from the nursing staff and counselor regarding medication and dosing. Monitoring for effectiveness of split dose is done ongoing.

Courtesy (Guest) Dosing

If you need courtesy dosing at other clinic, our nurse must coordinate with the nursing staff at the other clinic and you must sign a release and the physician must write an order approving. The release requires an original signature, so you must make the request in person. It is you responsibility to have contact information for the other clinic and the nurse will send them the required documentation. You must still pay their weekly fees at this clinic.

Administrative Detoxification

You can be administratively detoxified and terminated from the program for noncompliance of treatment requirements, diversion of medication, and failure to meet financial obligations.

You and your counselor along with the medical staff will complete an initial treatment plan. The initial treatment plan is discussed with you, who agrees to comply with treatment requirements. Noncompliance will be discussed with you and every effort will be made to assist you in meeting plan objectives. However, given the nature of the medication and treatment, your inability to follow through with recommendation and treatment will result in discharge and referral to a higher acuity of care.

You may also be administratively detoxed and discharged for diversion of medication. If you sell, gift or buy your or anyone else's medication you will be discharge from the clinic. This is not only dangerous but also illegal. Selling or gifting your medication, we will notify the police. Additional not storing your medication in a safe and locked location, resulting in "accidental" diversion could also lead to dis=charge. This creates a safety hazard in the community and put everyone in danger.

You can also be administratively detoxed for failure to pay fees and meet clinic financial obligations. This can begin immediately as we do not allow you to carry a balance. If you are a woman you are given pregnancy test to ensure that you are not being detoxed if pregnant. Once the detox begins, you are detoxed at a rate of 10mgs per day and daily attendance is required. This can be adjusted if you are having extreme withdrawal symptoms. You are offered an appointment with the physician to discuss treatment options. You will also be referred for residential detoxification and treatment. Once you bring your account current, you can be increased in dose until stable and not experiencing any withdrawal symptoms. Patients who consistently become delinquent in their accounts as referred for other treatment modalities and will be required to stay a week in advance until their financial situation improves.

TREATMENT PHASES

Most opioid treatment programs, including our program, operate on a Phase system. The phase a patient is assigned is determined by the days you have been in treatment, drug screen compliance, and clinic participation. The phase system is used to determine the amount of take-home medication you are allowed. These standards are set by the DEA and our federal opioid treatment regulations. There is a link in your handbook to those regulations.

Methadone Phases

PHASE 0	6 days per week (0-3 months attendance - 1 take outs per week)
PHASE 1	5 days per week (3 months attendance and 1 compliant ds - 2 take outs per week)
PHASE 2	4 days per week (4 months min. attendance 2 compliant ds -3 take outs per week)
PHASE 3	3 days per week (6 months min. attendance 3 compliant ds -4 take outs per week)
PHASE 4	2 days per week (9 months min. attendance 4 compliant ds -5 take outs per week)
PHASE 5	1 day per week (9-12 months attendance 6 compliant ds -6 take outs per week)
PHASE 6	Bi-monthly (1-2 yrs. attendance 8 compliant ds -13 take outs)
PHASE 7	Monthly (2 yrs and greater attendance 12 compliant ds -27 take outs)

Buprenorphine Phases

There is not a phase system for Buprenorphine. The doctor will determine your eligibility for take home medication based on many factors, primarily the safety to you and the community.

TAKE HOME MEDICATION

Patients on Methadone must meet the federal requirements for take home medication this includes days in treatment, drug screen status and satisfaction with the 8-point criteria for take home medication. The patient

can request additional take homes as they achieve these requirements. They will need to complete an attendance change request in their patient portal. This will be reviewed by the counselor, nurse and physician. The doctor must approve any increases and decreases in attendance, for all patients.

Once a patient begins to have regular take home medication, if they fail to secure their take homes, have missing take homes, or overuse their medication, Suboxone/Buprenorphine, it is the doctor discretion the take home schedule.

Individuals who cannot properly secure their medication or manage their doses as prescribed are not safe to have a controlled substance in the community. This places them, the community, your license and our business at risk. As such when a patient arrives for dosing and pick up, if they do not have their own box that locks-and the nurse will make sure the box locks before they leave- they can not leave with the medication. You may not borrow a box from another patient, even couples. Borrowing boxes is a security violation and can result in both parties losing the privilege of take homes.

The program physician shall comply with 42 CFR, §8.12(i) regarding the dispensing of take-home doses of medication. The program physician shall adhere to the following criteria (8pt) in determining whether a patient is responsible in handling narcotic drugs:

- 1. absence of recent abuse of drugs (opioid or non-narcotic), including alcohol and THC;
- 2. regularity of clinic attendance;
- 3. absence of serious behavioral problems at the clinic;
- 4. absence of known recent criminal activity;
- 5. stability of the patient's home environment and social relationships;
- 6. length of time in comprehensive maintenance treatment;
- 7. assurance that take-home medication can be safely stored within the patient's home; and
- 8. whether the rehabilitative benefit to the patient derived from decreasing the frequency of clinic attendance outweighs the potential risks of diversion of narcotic drugs.

YOU MUST HAVE A WRITTEN OVERDOSE PREVENTION PLAN BEFORE TAKE HOMES CAN BE APPROVED. ALL PATIENTS WITH CHILDREN IN THEIR HOME MUST HAVE A DOSE OF NARCON AVAILABLE IN THEIR TAKE HOME BOX. NARCON IS AVAILABLE AT ALL WALGREENS WITHOUT A PRESCRIPTION.

Buprenorphine/Suboxone Take-Home Protocol

Federal and State regulations do not have a "time in treatment" requirement. Once a patient is stable and not experiencing withdrawal and the physician believes it to be safe for the patient and the community, the patient can receive up to 30 day supply of medication. The patient is required to attend the clinic one time per month minimum. This can be done in person or virtually.

Tapering

We have informed our staff that "when a patient is requesting a gradual tapering of their dose it is very important to discuss the patient's motivation. Many time patients are motivated by frustrations not related to their dose such as difficulties with staff or the clinic, pressure from significant others, financial problems, etc. The counselor or staff member must get to the root of the issue and address it on that level. Sometimes the

patient is not willing to work through the problem and demands to taper their dose. This is O.K. Sometimes a patient needs to learn through first-hand experience whether they are ready to taper."

We will ask that you complete a dose change request form. You will meet with the nurse and/or counselor to discuss your tapering plans/thoughts/reasons. All the information and the dose change request form will be given to the physician for review and approval. The doctor may want to schedule a session with the patient to discuss further.

We will document that you are aware of the relapse potential and how s/he will cope with triggers, cravings, stress, etc. We will encourage the development of a written relapse plan and overdose prevention plan before you begin a taper.

We will stress to you the importance of choosing to increase their dose of methadone instead of using illicit substances if they are experiencing craving or withdrawal symptoms.

Relapse can happen-but it is not the end of the world (although it may feel like it to you).

All females requesting a tapering schedule must provide documentation that you are sterile, or you must have a negative pregnancy test before starting the tapering and the pregnancy test must be performed monthly. Pregnant females will not be tapered.

FIRE PROCEDURES AND GUIDELINES

When a fire alarm is sounded ALL patients, staff and visitors will immediately be evacuated from the private estate and proceed to their designated primary assembly site, the circle driveway.

A roll call will be instituted at the assembly site for the purpose of accounting for all patients and visitors.

When leaving their areas and **AS** time permits, please see that you close all doors and windows, and turn off all heating/air conditioning units and fans to prevent further property damage and to help contain the fire.

Only after the "All Clear" has been announced, may you return to your normal activities.

In accordance with the federal and state rules governing our program, fire drills are regularly conducted to test and evaluate our response.

OTHER EMERGENCY PROCEDURES AND GUIDELINES

Axcel Treatment and Recovery Center is above flood level and therefore does not pose any real danger to patients, staff or visitors on estate grounds in the event of a flood. Procedures do address concerns with respect to waters rising, resulting in babble brook bridge access closed and the interruption of services. If Babbling brook is flowing above bridge, **turn around**.

Flood Warning:

A "Flood Warning" notifies people that water levels have actually begun to rise in certain areas, and to prepare to evacuate to high ground.

If you come to a flooded area, turn around and go back or just wait.

If your car stalls in a low-lying area, abandon it immediately and climb to higher ground.

Many deaths have resulted from attempts to stay with the vehicle.

Six inches of fast-moving water can knock you off your feet.

Do not do any high stepping; instead drag your feet to maintain your balance.

A depth of two feet will cause most vehicles to float. Flash floods can pick up cars, campers and mobile homes. They can roll large rocks, knock down trees, and rip out roads and bridges.

Keep a radio tuned to weather reports whenever possible.

Try to remain calm.

Tornado Warning:

A "Tornado Warning" lets people know that an actual sighting has occurred in the approximate vicinity, and to prepare to take cover if the tornado is approaching the immediate vicinity.

When weather conditions show a potential for heavy rains and/or tornado activity, we have staff members assigned to monitor the situation. **If** we hear this area is under a Tornado WARNING staff will call a "CODE GREEN". The responses to a "Code Green" are as follows:

All People will evacuate to the tornado room for safety staff will direct you to the downstairs bedroom through the closet to the tornado room. Bedrooms, bathrooms, common areas, elevator, stairwells, hallways, closets, smoking areas, kitchen, pool areas, basketball court, tennis court, horseshoes and Gym are to be completely evacuated

Immediately seek shelter inside a tornado room located downstairs in master bedroom at ground level. The tornado room is a concrete reinforced area away from windows and glassed areas.

Patients and visitors should assume a protective face down fetal type position. There will be pillows and blankets available in tornado room and should be used as protection from flying debris.

In any other emergency situation, we ask that you please cooperate with staff direction. Every effort will be taken to help ensure your safety and that of the staff and visitors. We perform general Disaster Preparedness Drills two times a year.

HIV OVERVIEW

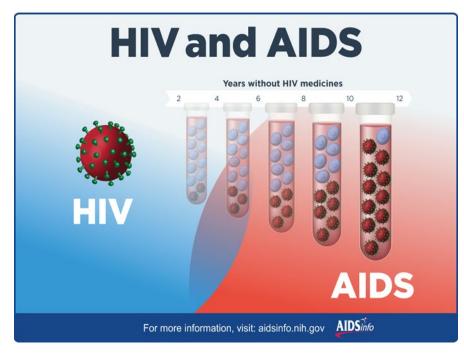
HIV/AIDS: The Basics

Key Points

- HIV is the virus that causes HIV infection. AIDS is the most advanced stage of HIV infection.
- HIV is spread through contact with the blood, semen, pre-seminal fluid, rectal fluids, vaginal fluids, or breast milk of a person infected with HIV. In the United States, HIV is spread mainly by having anal or vaginal sex or sharing drug injection equipment with a person infected with HIV.
- The use of HIV medicines to treat HIV infection is called antiretroviral therapy (ART). ART involves taking a combination of HIV medicines (called an <u>HIV regimen</u>) every day.
- ART can't cure HIV infection, but it can help people infected with HIV live longer, healthier lives. HIV medicines can also reduce the risk of transmission of HIV.

What is HIV/AIDS?

HIV stands for human immunodeficiency virus, which is the virus that causes HIV infection. The abbreviation "HIV" can refer to the virus or to HIV infection. AIDS stands for acquired immunodeficiency syndrome. AIDS is the most advanced stage of HIV infection. HIV attacks and destroys the infection-fighting <u>CD4 cells</u> of the <u>immune system</u>. The loss of CD4 cells makes it difficult for the body to fight infections and certain cancers. Without treatment, HIV can gradually destroy the immune system and advance to AIDS.



How is HIV spread?

HIV is spread through contact with certain body fluids from a person infected with HIV. These body fluids include:

- Blood
- Semen
- Pre-seminal fluid
- Vaginal fluids
- Rectal fluids
- Breast milk

The spread of HIV from person to person is called HIV transmission. The spread of HIV from an HIV-infected woman to her child during pregnancy, childbirth, or breastfeeding is called mother-to-child

transmission of HIV.

In the United States, HIV is spread mainly by having sex with or sharing drug injection equipment with someone who is infected with HIV. To reduce your risk of HIV infection, use condoms correctly and consistently during sex, limit your number of sexual partners, and never share drug injection equipment.

Mother-to-child transmission is the most common way that children become infected with HIV. HIV

medicines, given to HIV-infected women during pregnancy and childbirth and to their babies after birth, reduce the risk of mother-to-child transmission of HIV.

You can't get HIV by shaking hands or hugging a person infected with HIV. You also can't get HIV from contact with objects such as dishes, toilet seats, or doorknobs used by a person with HIV. HIV does not spread through the air or through mosquito, tick, or other insect bites.

What is the treatment for HIV?

The use of HIV medicines to treat HIV infection is called antiretroviral therapy (ART). ART involves taking a combination of HIV medicines (called an <u>HIV regimen</u>) every day. (HIV medicines are often called antiretrovirals or ARVs.)

ART prevents HIV from multiplying and reduces the amount of HIV in the body. Having less HIV in the body protects the immune system and prevents HIV infection from advancing to AIDS.

ART can't cure HIV, but it can help people infected with HIV live longer, healthier lives. ART also reduces the risk of HIV transmission.

What are the symptoms of HIV/AIDS?

Soon after infection with HIV, some people have flu-like symptoms, such as fever, headache, or rash. The symptoms may come and go for a month or two after infection.

After this earliest stage of HIV infection, HIV continues to multiply but at very low levels. More severe symptoms of HIV infection, such as chronic diarrhea, rapid weight loss, and signs of opportunistic infections, generally don't appear for many years. (Opportunistic infections are infections and infection-related cancers that occur more frequently or are more severe in people with weakened immune systems than in people with healthy immune systems.)

Without treatment, HIV can advance to AIDS. The time it takes for HIV to advance to AIDS varies, but it can take 10 years or more.

HIV transmission is possible at any stage of HIV infection—even if an HIV-infected person has no symptoms of HIV.

How is AIDS diagnosed?

The following criteria are used to determine if a person infected with HIV has AIDS:

The person's immune system is severely damaged, as indicated by a CD4 count of less than 200 cells/mm³. A CD4 count measures the number of CD4 cells in a sample of blood. The CD4 count of a healthy person ranges from 500 to 1,600 cells/mm³.

AND/OR

The person has one or more opportunistic infections.

Where can I learn more about HIV/AIDS?

- How Do You Get HIV or AIDS? from AIDS.gov
- HIV 101 from the Centers for Disease Control and Prevention (CDC)

This fact sheet is based on information from the following sources:

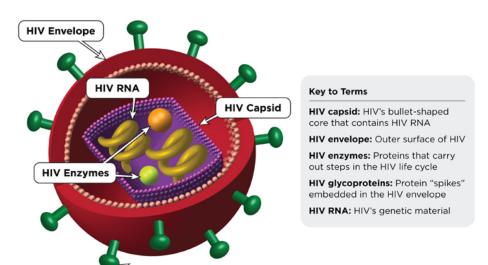
- From CDC: <u>HIV Basics</u>
- From the National Institute of Allergy and Infectious Diseases (NIAID):

The HIV Life Cycle

Key Points

- HIV gradually destroys the <u>immune system</u> by attacking and killing a type of white blood cell called a CD4 cell. CD4 cells play a major role in protecting the body from infection.
- HIV uses the machinery of the CD4 cells to multiply (make copies of itself) and spread throughout the body. This process, which is carried out in seven steps or stages, is called the HIV life cycle. HIV medicines protect the immune system by blocking HIV at different stages of the HIV life cycle.
- Antiretroviral therapy or ART is the use of HIV medicines to treat HIV infection. People on ART take a
 combination of HIV medicines from at least two different HIV <u>drug classes</u> every day. Because each
 class of drugs is designed to target a specific step in the HIV life cycle, ART is very effective at
 preventing HIV from multiplying. ART also reduces the risk of HIV <u>drug resistance</u>.
- ART can't cure HIV, but HIV medicines help people with HIV live longer, healthier lives. ART also reduces the risk of HIV transmission (the spread of HIV to others).

Once a person is infected with HIV, the virus begins to attack and destroy the CD4 cells of the <u>immune system</u>. CD4 cells are a type of white blood cell that play a major role in protecting the body from infection. HIV uses



HIV Glycoproteins

the machinery of the CD4 cells to multiply (make copies of itself) and spread throughout the body. This process, which is carried out in seven steps or stages, is called the HIV life cycle.

What is the connection between the HIV life cycle and HIV medicines? Antiretroviral therapy (ART) is the use of HIV medicines to treat HIV infection. HIV medicines protect the immune system by blocking HIV at different stages of the HIV life cycle.

HIV medicines are grouped into

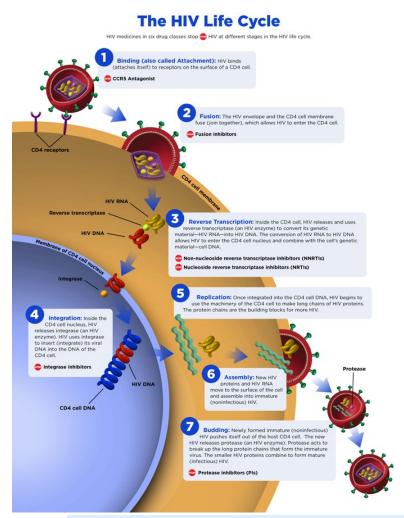
different <u>drug classes</u> according to how they fight HIV. Each class of drugs is designed to target a specific step in the HIV life cycle.

ART combines HIV medicines from at least two different HIV drug classes, making it very effective at preventing HIV from multiplying. Having less HIV in the body protects the immune system and prevents HIV from advancing to <u>AIDS</u>. ART also reduces the risk of HIV <u>drug resistance</u>.

ART can't cure HIV, but HIV medicines help people with HIV live longer, healthier lives. HIV medicines also reduce the risk of HIV transmission (the spread of HIV to others).

What are the seven stages of the HIV life cycle?

The seven stages of the HIV life cycle are: 1) <u>binding</u>, 2) <u>fusion</u>, 3) <u>reverse transcription</u>, 4) <u>integration</u>, 5) <u>replication</u>, 6) <u>assembly</u>, and 7) <u>budding</u>. To understand each stage in the HIV life cycle, it helps to first imagine what HIV looks like.



Now follow each stage in the HIV life cycle, as HIV attacks a CD4 cell and uses the machinery of the cell to multiply.

Where can I learn more about the HIV life cycle?

Visit this webpage from the National Institute of Allergy and Infectious Diseases (NIAID) to learn how HIV medicines work against the virus.

• Types of HIV/AIDS Antiretroviral Drugs

The Stages of HIV Infection

Key Points

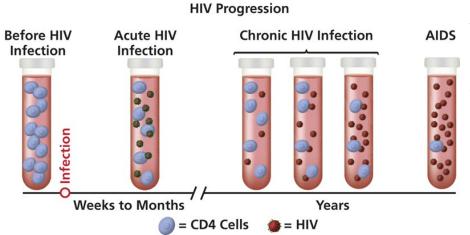
- Without treatment, HIV infection advances in stages, getting worse over time.
- The three stages of HIV infection are (1) acute HIV infection, (2) chronic HIV infection, and (3) acquired immunodeficiency syndrome (AIDS).
- HIV can be transmitted (spread to others) during any stage of infection, but the risk is greatest during acute HIV infection.
- There is no cure for HIV infection, but HIV

medicines (called antiretrovirals or ARVs) can prevent HIV from advancing to AIDS. HIV medicines help people with HIV live longer, healthier lives. HIV medicines also reduce the risk of HIV transmission.

Without treatment, HIV infection advances in stages, getting worse over time. HIV gradually destroys the <u>immune system</u> and eventually causes <u>acquired immunodeficiency syndrome (AIDS)</u>.

There is no cure for HIV infection, but HIV medicines (called antiretrovirals or ARVs) can prevent HIV from

advancing to AIDS. HIV medicines help people with HIV live longer, healthier lives. HIV medicines also reduce the risk of HIV transmission (the spread of HIV to others).



There are three stages of HIV infection:

1. Acute HIV Infection

Acute HIV infection is the earliest stage of HIV infection, and it generally develops within 2 to 4 weeks after a person is infected with HIV. During this time, some people have flu-like symptoms, such as fever, headache, and rash. In the acute stage of infection, HIV multiplies rapidly and

spreads throughout the body. The virus attacks and destroys the infection-fighting <u>CD4 cells</u> of the immune system. HIV can be transmitted during any stage of infection, but the risk is greatest during acute HIV infection.

2. Chronic HIV Infection

The second stage of HIV infection is chronic HIV infection (also called asymptomatic HIV infection or clinical latency). During this stage of the disease, HIV continues to multiply in the body but at very low levels. People with chronic HIV infection may not have any HIV-related symptoms, but they can still spread HIV to others. Without treatment with HIV medicines, chronic HIV infection usually advances to AIDS in 10 years or longer, though it may take less time for some people.

3. **AIDS**

AIDS is the final stage of HIV infection. Because HIV has severely damaged the immune system, the body can't fight off <u>opportunistic infections</u>. (Opportunistic infections are infections and infection–related cancers that occur more frequently or are more severe in people with weakened immune systems than in people with healthy immune systems.) People with HIV are diagnosed with AIDS when they have a CD4 count of less than 200 cells/mm³, they have one or more opportunistic infections, or both. Without treatment, people with AIDS typically survive about 3 years.

HIV Testing

Key Points

- HIV testing shows whether a person is infected with HIV. HIV stands for human immunodeficiency virus. HIV is the virus that causes AIDS (acquired immunodeficiency syndrome). AIDS is the most advanced stage of HIV infection.
- The Centers for Disease Control and Prevention (CDC) recommends that everyone 13 to 64 years old get tested for HIV at least once and that people at high risk of infection get tested more often.

- Risk factors for HIV infection include having unprotected sex (sex without a condom) with someone who is HIV-positive or whose HIV status you don't know; having sex with many partners; and injecting drugs and sharing needles, syringes, or other drug equipment with others.
- CDC recommends that all pregnant women get tested for HIV as early as possible during each pregnancy.

What is HIV testing?

HIV testing shows whether a person is infected with HIV. HIV stands for human immunodeficiency virus. HIV is the virus that causes AIDS (acquired immunodeficiency syndrome). AIDS is the most advanced stage of HIV infection.

HIV testing can detect HIV infection, but it can't tell how long a person has been infected with HIV or if the person has AIDS.

Why is HIV testing important?

Knowing your HIV status can help keep you—and others—safe.

If you are HIV-negative:

Testing shows that you don't have HIV. Continue taking steps to avoid getting HIV, such as using condoms during sex and taking medicines to prevent HIV if you are at high risk of becoming infected with HIV (pre-exposure prophylaxis or PrEP). For more information, read the <u>AIDS info</u> fact sheet on HIV prevention.

If you are HIV-positive:

Testing shows that you are infected with HIV, but you can still take steps to protect your health. Begin by talking to your health care provider about antiretroviral therapy (ART). ART is the use of HIV medicines to treat HIV infection. People on ART take a combination of HIV medicines every day. ART helps people with HIV live longer, healthier lives. ART also reduces the risk of transmission of HIV. People infected with HIV should start ART as soon as possible. Your health care provider will help you decide what HIV medicines to take.

Who should get tested for HIV?

The Centers for Disease Control and Prevention (CDC) recommends that everyone 13 to 64 years old get tested for HIV at least once. As a general rule, people at high risk for HIV infection should get tested each year. Sexually active gay and bisexual men may benefit from getting tested more often, such as every 3 to 6 months.

Factors that increase the risk of HIV infection include:

- Having vaginal or anal sex without using a condom with someone who is HIV-positive or whose HIV status you don't know
- Injecting drugs and sharing needles, syringes, or other drug equipment with others
- Exchanging sex for money or drugs
- · Having a sexually transmitted disease (STD), such as syphilis
- Having hepatitis or tuberculosis (TB)
- Having sex with anyone who has any of the HIV risk factors listed above

Talk to your health care provider about your risk of HIV infection and how often you should get tested for HIV. Should pregnant women get tested for HIV?

CDC recommends that all pregnant women get tested for HIV as early as possible during each pregnancy. Women who are planning to get pregnant should also get tested.

Women with HIV take HIV medicines during pregnancy and childbirth to reduce the risk of mother-to-child transmission of HIV. HIV medicines used as recommended during pregnancy can reduce the risk of mother-to-child transmission of HIV to less than 1%. For more information, read the AIDS *info* fact sheet on <u>Preventing</u> Mother-to-Child Transmission of HIV.

What are the types of HIV tests?

There are three main types of HIV tests: antibody tests, combination tests (antibody/antigen tests), and nucleic acid tests (NATs). How soon each test can detect HIV infection differs because each test has a different window period. The window period is the time between when a person gets HIV and when a test can accurately detect HIV infection.

- Antibody tests check for HIV antibodies in blood or fluids from the mouth. HIV antibodies are disease-fighting proteins that the body produces in response to HIV infection. It can take 3 to 12 weeks for a person's body to make enough antibodies for an antibody test to detect HIV infection. (In other words, the window period for antibody tests in most people is somewhere between 3 to 12 weeks from the time of infection.)
- Combination tests (antibody/antigen tests) can detect both HIV antibodies and HIV antigens (a part of the virus) in blood. A combination test can detect HIV infection before an HIV antibody test. It can take 2 to 6 weeks for a person's body to make enough antigens and antibodies for a combination test to detect HIV infection. Combination tests are now recommended for HIV testing that's done in labs, and they are becoming more common in the United States.
- NATs look for HIV in the blood. NATs can detect HIV infection about 7 to 28 days after a person has been infected with HIV. NATs are very expensive and not routinely used for HIV screening unless the person had a high-risk exposure or a possible exposure with early symptoms of HIV infection.

A person's initial HIV test will be either an antibody test or a combination test. If the initial test result is positive for HIV infection, then follow-up testing will be done to make sure that the diagnosis is correct. If the initial test result is negative and the test was done during the window period, re-testing should be done 3 months after the possible exposure to HIV.

How long does it take to get the results of an HIV test?

It usually takes a few days to a few weeks to get results of an HIV test. Some rapid HIV tests can produce results within 30 minutes.

Is there an HIV test for home use?

There are two HIV tests approved by the U.S. Food and Drug Administration (FDA) for home use. Both are HIV antibody tests.

The **Home Access HIV-1 Test System** is a home collection kit, which involves pricking the finger for a blood This program is licensed by the Texas Health and Human Services Commission and CARF Accredited

sample, sending the sample to a lab for testing, and then calling the lab for results as early as the next business day. If the result is positive for HIV, the lab will do a follow-up test on the same blood sample to confirm the initial HIV-positive test result.

The OraQuick In-Home HIV Test comes with a test stick and a tube with a testing solution. The test stick is used to swab the gums to get a sample of oral fluids. To get results, the test stick is inserted into the test tube. Test results are ready in 20 minutes. A positive result on this home HIV test must always be confirmed by additional HIV testing performed in a health care setting.

Is HIV testing confidential?

HIV testing can be confidential or anonymous.

Confidential testing means that your HIV test results will include your name and other identifying information, but only people allowed to see your medical records will see your test results. HIV-positive test results may be reported to local or state health departments to be counted in statistical reports. Health departments remove all personal information (including names and addresses) from HIV test results before sharing the information with CDC. CDC uses this information for reporting purposes and does not share this information with any other organizations.

Anonymous testing means you don't have to give your name when you take an HIV test. When you take the test, you receive a number. To get your HIV test results, you give the number instead of your name.

Where can I get tested for HIV?

Your health care provider can give you an HIV test. HIV testing is also available at many hospitals, medical clinics, community health centers, and AIDS service organizations. Use this <u>CDC testing locator</u> to find an HIV testing location near you.

You can also buy a home testing kit at a pharmacy or online.

FDA-Approved HIV Medicines

(Last updated 9/27/2016; last reviewed 9/9/2016)

Treatment with HIV medicines is called antiretroviral therapy (ART). ART is recommended for everyone with HIV. People on ART take a combination of HIV medicines (called an HIV regimen) every day. A person's initial HIV regimen generally includes three HIV medicines from at least two different <u>drug classes</u>.

ART can't cure HIV, but HIV medicines help people with HIV live longer, healthier lives. HIV medicines also reduce the risk of HIV transmission.

The following table lists HIV medicines approved by the <u>U.S. Food and Drug Administration (FDA)</u> for the treatment of HIV infection in the United States. The HIV medicines are listed according to drug class and identified by generic and brand names. Click on a drug name to view information on the drug from the <u>AIDS info Drug Database</u>. Or download the <u>AIDS info Drug Database</u> app to view the information on your Apple or Android devices.

To see a timeline of all FDA approval dates for HIV medicines, view the AIDS *info* <u>FDA Approval of HIV Medicines</u> infographic.

FDA-Approved HIV Medicines			
Drug Class	Generic Name (Other names and acronyms)	Brand Name	FDA Approval Date
Nucleoside Reverse Transcr	iptase Inhibitors (NRTIs)		
NRTIs block reverse transcriptase, an enzyme HIV needs to make copies of itself.	abacavir (abacavir sulfate, ABC)	Ziagen	December 17, 1998
	didanosine (delayed-release didanosine, dideoxyinosine, enteric-coated didanosine, ddl, ddl EC)	Videx	October 9, 1991
		Videx EC (enteric- coated)	October 31, 2000
	emtricitabine (FTC)	Emtriva	July 2, 2003
	lamivudine (3TC)	Epivir	November 17, 1995
	stavudine (d4T)	Zerit	June 24, 1994
	tenofovir disoproxil fumarate (tenofovir DF, TDF)	Viread	October 26, 2001
	zidovudine (azidothymidine, AZT, ZDV)	Retrovir	March 19, 1987
Non-Nucleoside Reverse Tra	anscriptase Inhibitors (NNRTIs)		
NNRTIs bind to and later alter reverse transcriptase, an enzyme HIV needs to make copies of itself.	efavirenz (EFV)	Sustiva	September 17, 1998
	etravirine (ETR)	Intelence	January 18, 2008

Drug Class	Generic Name (Other names and acronyms)	Brand Name	FDA Approval Date
	nevirapine (extended-release nevirapine, NVP)	Viramune	June 21, 1996
		Viramune XR (extended release)	March 25, 2011
	rilpivirine (rilpivirine hydrochloride, RPV)	Edurant	May 20, 2011
Protease Inhibitors (PIs)			
PIs block HIV protease, an enzyme HIV needs to make copies of itself	atazanavir (atazanavir sulfate, ATV)	Reyataz	June 20, 2003
	darunavir (darunavir ethanolate, DRV)	Prezista	June 23, 2006
	fosamprenavir (fosamprenavir calcium, FOS-APV, FPV)	Lexiva	October 20, 2003
	indinavir (indinavir sulfate, IDV)	Crixivan	March 13, 1996
	nelfinavir (nelfinavir mesylate, NFV)	Viracept	March 14, 1997
	ritonavir (RTV)	Norvir	March 1, 1996
	saquinavir (saquinavir mesylate, SQV)	Invirase	December 6, 1995
	tipranavir (TPV)	Aptivus	June 22, 2005
Fusion Inhibitors			

Drug Class	Generic Name (Other names and acronyms)	Brand Name	FDA Approval
	(Other names and acronyms)	Name	Date
Fusion inhibitors block HIV from entering the <u>CD4</u> <u>cells</u> of the <u>immune system</u> .	enfuvirtide (T-20)	Fuzeon	March 13, 2003
Entry Inhibitors			
Entry inhibitors block proteins on the CD4 cells that HIV needs to enter the cells.	maraviroc (MVC)	Selzentry	August 6, 2007
Integrase Inhibitors			
Integrase inhibitors block HIV integrase, an enzyme HIV needs to make copies of itself.	dolutegravir (DTG)	Tivicay	August 13, 2013
	elvitegravir (EVG)	Vitekta	September 24, 2014
	raltegravir (raltegravir potassium, RAL)	Isentress	October 12, 2007
Pharmacokinetic Enhancers			
Pharmacokinetic enhancers are used in HIV treatment to increase the effectiveness of an HIV medicine included in an HIV regimen.	cobicistat (COBI)	Tybost	September 24, 2014
Combination HIV Medicines			
Combination HIV medicines contain two or more HIV medicines from one or more drug classes.	abacavir and lamivudine (abacavir sulfate / lamivudine, ABC / 3TC)	Epzicom	August 2, 2004
	abacavir, dolutegravir, and lamivudine (abacavir sulfate / dolutegravir sodium / lamivudine, ABC / DTG / 3TC)	Triumeq	August 22, 2014

Drug Class	Generic Name (Other names and acronyms)	Brand Name	FDA Approval Date
	<u>abacavir, lamivudine, and zidovudine</u> (abacavir sulfate / lamivudine / zidovudine, ABC / 3TC / ZDV)	Trizivir	November 14, 2000
	atazanavir and cobicistat (atazanavir sulfate / cobicistat, ATV / COBI)	Evotaz	January 29, 2015
	darunavir and cobicistat (darunavir ethanolate / cobicistat, DRV / COBI)	Prezcobix	January 29, 2015
	efavirenz, emtricitabine, and tenofovir disoproxil fumarate (efavirenz / emtricitabine / tenofovir, efavirenz / emtricitabine / tenofovir DF, EFV / FTC / TDF)	Atripla	July 12, 2006
	elvitegravir, cobicistat, emtricitabine, and tenofovir alafenamide fumarate (elvitegravir / cobicistat / emtricitabine / tenofovir alafenamide, EVG / COBI / FTC / TAF)	Genvoya	November 5, 2015
	elvitegravir, cobicistat, emtricitabine, and tenofovir disoproxil fumarate (QUAD, EVG / COBI / FTC / TDF)	Stribild	August 27, 2012
	emtricitabine, rilpivirine, and tenofovir alafenamide (emtricitabine / rilpivirine / tenofovir AF, emtricitabine / rilpivirine / tenofovir alafenamide fumarate, emtricitabine / rilpivirine hydrochloride / tenofovir AF, emtricitabine / rilpivirine hydrochloride / tenofovir alafenamide, emtricitabine / rilpivirine hydrochloride / tenofovir alafenamide fumarate, FTC / RPV / TAF)	Odefsey	March 1, 2016
	emtricitabine, rilpivirine, and tenofovir disoproxil fumarate (emtricitabine / rilpivirine hydrochloride / tenofovir disoproxil fumarate, emtricitabine / rilpivirine / tenofovir, FTC / RPV / TDF)	Complera	August 10, 2011
	emtricitabine and tenofovir alafenamide (emtricitabine / tenofovir AF, emtricitabine / tenofovir alafenamide fumarate, FTC / TAF)	Descovy	April 4, 2016

Drug Class	Generic Name (Other names and acronyms)	Brand Name	FDA Approval Date
	emtricitabine and tenofovir disoproxil fumarate (emtricitabine / tenofovir, FTC / TDF)	Truvada	August 2, 2004
	lamivudine and zidovudine (3TC / ZDV)	Combivir	September 27, 1997
	lopinavir and ritonavir (ritonavir-boosted lopinavir, LPV/r, LPV / RTV)	Kaletra	September 15, 2000

SEXUALLY TRANSMITTED DISEASE SYMPTOMS: COMMON STDS AND THEIR SYMPTOMS

If you have sex — oral, anal or vaginal intercourse and genital touching — you can get an STD, also called a sexually transmitted infection (STI). Straight or gay, married or single, you're vulnerable to STIs and STI symptoms. Thinking or hoping your partner doesn't have an STI is no protection — you need to know for sure. And although condoms are highly effective for reducing transmission of some STDs, no method is foolproof.

STI symptoms aren't always obvious. If you think you have STI symptoms or have been exposed to an STI, see a doctor. Some STIs are easy to treat and cure; others require more-complicated treatment to manage them.

It's essential to be evaluated, and — if diagnosed with an STI — get treated. It's also essential to inform your partner or partners so that they can be evaluated and treated.

If untreated, STIs can increase your risk of acquiring another STI such as HIV. This happens because an STI can stimulate an immune response in the genital area or cause sores, either of which might raise the risk of HIV transmission. Some untreated STIs can also lead to infertility.

STIs often have no signs or symptoms (asymptomatic). Even with no symptoms, however, you can pass the infection to your sex partners. So it's important to use protection, such as a condom, during sex. And visit your doctor regularly for STI screening, so you can identify and treat an infection before you can pass it on.

Some of the following diseases, such as hepatitis, can be transmitted without sexual contact, by coming into contact with an infected person's blood. Others, such as gonorrhea, can only be transmitted through sexual contact.

Chlamydia is a bacterial infection of your genital tract. Chlamydia may be difficult to detect because early-stage infections often cause few or no signs and symptoms. When they do occur, they usually start one to three weeks after you've been exposed to chlamydia. Even when signs and symptoms occur, they're often mild and passing, making them easy to overlook.

Signs and symptoms may include:

- Painful urination
- Lower abdominal pain
- Vaginal discharge in women
- Discharge from the penis in men
- Pain during sexual intercourse in women
- Bleeding between periods in women
- Testicular pain in men

Gonorrhea is a bacterial infection of your genital tract. It can also grow in your mouth, throat, eyes and anus. The first gonorrhea symptoms generally appear within 10 days after exposure. However, some people may be infected for months before signs or symptoms occur.

Signs and symptoms of gonorrhea may include:

- Thick, cloudy or bloody discharge from the penis or vagina
- Pain or burning sensation when urinating
- Heavy menstrual bleeding or bleeding between periods
- Painful, swollen testicles
- Painful bowel movements
- Anal itching

Trichomoniasis is a common STI caused by a microscopic, one-celled parasite called Trichomonas vaginalis. This organism spreads during sexual intercourse with someone who already has the infection.

The organism usually infects the urinary tract in men, but often causes no symptoms. Trichomoniasis typically infects the vagina in women. When trichomoniasis causes symptoms, they may appear within five to 28 days of exposure and range from mild irritation to severe inflammation.

Signs and symptoms may include:

- Clear, white, greenish or yellowish vaginal discharge
- Discharge from the penis
- Strong vaginal odor
- Vaginal itching or irritation
- Itching or irritation inside the penis
- Pain during sexual intercourse
- Painful urination

HIV is an infection with the human immunodeficiency virus. HIV interferes with your body's ability to fight off viruses, bacteria and fungi that cause illness, and it can lead to AIDS, a chronic, life-threatening disease.

When first infected with HIV, you may have no symptoms. Some people develop a flu-like illness, usually two to six weeks after being infected. Still, the only way you know if you have HIV is to be tested.

Early signs and symptoms

Early HIV signs and symptoms may include:

- Fever
- Headache
- Sore throat
- Swollen lymph glands
- Rash
- Fatigue

These early signs and symptoms usually disappear within a week to a month and are often mistaken for those of another viral infection. During this period, you're highly infectious. More-persistent or -severe symptoms of HIV infection may not appear for 10 years or more after the initial infection.

As the virus continues to multiply and destroy immune cells, you may develop mild infections or chronic signs and symptoms such as:

- Swollen lymph nodes often one of the first signs of HIV infection
- Diarrhea
- Weight loss
- Fever
- · Cough and shortness of breath

Late-stage HIV infection

Signs and symptoms of late-stage HIV infection include:

- Persistent, unexplained fatigue
- Soaking night sweats
- Shaking chills or fever higher than 100.4 F (38 C) for several weeks
- Swelling of lymph nodes for more than three months
- Chronic diarrhea
- Persistent headaches
- Unusual, opportunistic infections

Highly contagious, **genital herpes** is caused by a type of the herpes simplex virus (HSV) that enters your body through small breaks in your skin or mucous membranes. Most people with HSV never know they have it, because they have no signs or symptoms or the signs and symptoms are so mild they go unnoticed.

When signs and symptoms are noticeable, the first episode is generally the worst. Some people never have a second episode. Others, however, can have recurrent episodes for decades.

When present, genital herpes signs and symptoms may include:

• Small red bumps, blisters (vesicles) or open sores (ulcers) in the genital, anal and nearby areas

• Pain or itching around the genital area, buttocks and inner thighs

The initial symptom of genital herpes usually is pain or itching, beginning within a few weeks after exposure to an infected sexual partner. After several days, small red bumps may appear. They then rupture, becoming ulcers that ooze or bleed. Eventually, scabs form and the ulcers heal.

In women, sores can erupt in the vaginal area, external genitals, buttocks, anus or cervix. In men, sores can appear on the penis, scrotum, buttocks, anus or thighs, or inside the tube from the bladder through the penis (urethra).

Ulcers can make urination painful. You may also have pain and tenderness in your genital area until the infection clears. During an initial episode, you may have flu-like signs and symptoms, such as headache, muscle aches and fever, as well as swollen lymph nodes in your groin.

In some cases, the infection can be active and contagious even when sores aren't present.

HPV infection is one of the most common types of STIs. Some forms put women at high risk of cervical cancer. Other forms cause genital warts. HPV usually has no signs or symptoms. The signs and symptoms of genital warts include:

- Small, flesh-colored or gray swellings in your genital area
- Several warts close together that take on a cauliflower shape
- Itching or discomfort in your genital area
- Bleeding with intercourse

Often, however, genital warts cause no symptoms. Genital warts may be as small as 1 millimeter in diameter or may multiply into large clusters.

In women, genital warts can grow on the vulva, the walls of the vagina, the area between the external genitals and the anus, and the cervix. In men, they may occur on the tip or shaft of the penis, the scrotum, or the anus. Genital warts can also develop in the mouth or throat of a person who has had oral sex with an infected person.

Hepatitis A, hepatitis B and hepatitis C are all contagious viral infections that affect your liver. Hepatitis B and C are the most serious of the three, but each can cause your liver to become inflamed.

Some people never develop signs or symptoms. But for those who do, signs and symptoms may occur after several weeks and may include:

- Fatigue
- · Nausea and vomiting
- Abdominal pain or discomfort, especially in the area of your liver on your right side beneath your lower ribs
- Loss of appetite
- Fever
- Dark urine
- Muscle or joint pain
- Itching

Yellowing of your skin and the whites of your eyes (jaundice)

Syphilis is a bacterial infection. The disease affects your genitals, skin and mucous membranes, but it can also involve many other parts of your body, including your brain and your heart.

The signs and symptoms of syphilis may occur in four stages — primary, secondary, latent and tertiary. There's also a condition known as congenital syphilis, which occurs when a pregnant woman with syphilis passes the disease to her unborn infant. Congenital syphilis can be disabling, even life-threatening, so it's important for a pregnant woman with syphilis to be treated.

Primary syphilis

The first sign of syphilis, which may occur from 10 days to three months after exposure, may be a small, painless sore (chancre) on the part of your body where the infection was transmitted, usually your genitals, rectum, tongue or lips. A single chancre is typical, but there may be multiple sores.

The sore typically heals without treatment, but the underlying disease remains and may reappear in the second (secondary) or third (tertiary) stage.

Secondary syphilis

Signs and symptoms of secondary syphilis may begin three to six weeks after the chancre appears, and may include:

- Rash marked by red or reddish-brown, penny-sized sores over any area of your body, including your palms and soles
- Fever
- Enlarged lymph nodes
- Fatigue and a vague feeling of discomfort
- Soreness and aching

These signs and symptoms may disappear without treatment within a few weeks or repeatedly come and go for as long as a year.

Latent syphilis

In some people, a period called latent syphilis — in which no symptoms are present — may follow the secondary stage. Signs and symptoms may never return, or the disease may progress to the tertiary stage.

Tertiary syphilis

Without treatment, syphilis bacteria may spread, leading to serious internal organ damage and death years after the original infection.

Some of the signs and symptoms of tertiary syphilis include:

- Lack of coordination
- Numbness
- Paralysis
- Blindness

Dementia

Neurosyphilis

At any stage, syphilis can affect the nervous system. Neurosyphilis may cause no signs or symptoms, or it can cause:

Headache

Behavior changes

Movement problems

If you suspect you have these or other STIs or that you may have been exposed to one, see your doctor for testing. Timely diagnosis and treatment are important to avoid or delay more-severe, potentially life-threatening health problems and to avoid infecting others.

TUBERCULOSIS: GENERAL INFORMATION

What is TB?

Tuberculosis (TB) is a disease caused by germs that are spread from person to person through the air. TB usually affects the lungs, but it can also affect other parts of the body, such as the brain, the kidneys, or the spine. A person with TB can die if they do not get treatment.

What Are the Symptoms of TB?

The general symptoms of TB disease include feelings of sickness or weakness, weight loss, fever, and night sweats. The symptoms of TB disease of the lungs also include coughing, chest pain, and the coughing up of blood. Symptoms of TB disease in other parts of the body depend on the area affected.

How is TB Spread?

TB germs are put into the air when a person with TB disease of the lungs or throat coughs, sneezes, speaks, or sings. These germs can stay in the air for several hours, depending on the environment. Persons who breathe in the air containing these TB germs can become infected; this is called latent TB infection.

What is the Difference Between Latent TB Infection and TB Disease?

People with *latent TB infection* have TB germs in their bodies, but they are not sick because the germs are not active. These people do not have symptoms of TB disease, and they cannot spread the germs to others. However, they may develop TB disease in the future. They are often prescribed treatment to prevent them from developing TB disease.

People with TB disease are sick from TB germs that are active, meaning that they are multiplying and destroying tissue in their body. They usually have symptoms of TB disease. People with TB disease of the lungs or throat are capable of spreading germs to others. They are prescribed drugs that can treat TB disease.

What Should I Do If I Have Spent Time with Someone with Latent TB Infection?

A person with latent TB infection cannot spread germs to other people. You do not need to be tested if you have spent time with someone with latent TB infection. However, if you have spent time with someone with TB disease or someone with symptoms of TB, you should be tested.

What Should I Do if I Have Been Exposed to Someone with TB Disease?

People with TB disease are most likely to spread the germs to people they spend time with every day, such as family members or coworkers. If you have been around someone who has TB disease, you should go to your doctor or your local health department for tests.

How Do You Get Tested for TB?

There are two tests that can be used to help detect TB infection: a skin test or TB blood test. The Mantoux tuberculin skin test is performed by injecting a small amount of fluid (called tuberculin) into the skin in the lower part of the arm. A person given the tuberculin skin test must return within 48 to 72 hours to have a trained health care worker look for a reaction on the arm. The TB blood tests measure how the patient's immune system reacts to the germs that cause TB.

What Does a Positive Test for TB Infection Mean?

A positive test for TB infection only tells that a person has been infected with TB germs. It does not tell whether or not the person has progressed to TB disease. Other tests, such as a chest x-ray and a sample of sputum, are needed to see whether the person has TB disease.

What is Bacille Calmette-Guèrin (BCG)?

BCG is a vaccine for TB disease. BCG is used in many countries, but it is not generally recommended in the United States. BCG vaccination does not completely prevent people from getting TB. It may also cause a false positive tuberculin skin test. However, persons who have been vaccinated with BCG can be given a tuberculin skin test or TB blood test.

Why is Latent TB Infection Treated?

If you have latent TB infection but not TB disease, your doctor may want you to take a drug to kill the TB germs and prevent you from developing TB disease. The decision about taking treatment for latent infection will be based on your chances of developing TB disease. Some people are more likely than others to develop TB disease once they have TB infection. This includes people with HIV infection, people who were recently exposed to someone with TB disease, and people with certain medical conditions.

How is TB Disease Treated?

TB disease can be treated by taking several drugs for 6 to 12 months. It is very important that people who have TB disease finish the medicine, and take the drugs exactly as prescribed. If they stop taking the drugs too soon, they can become sick again; if they do not take the drugs correctly, the germs that are still alive may become resistant to those drugs. TB that is resistant to drugs is harder and more expensive to treat. In some situations, staff of the local health department meet regularly with patients who have TB to watch them take their medications. This is called directly observed therapy (DOT). DOT helps the patient complete treatment in the least amount of time.

HARMS OF CIGARETTE SMOKING AND HEALTH BENEFITS OF QUITTING

Does tobacco smoke contain harmful chemicals?

Yes. Tobacco smoke contains many chemicals that are harmful to both smokers and nonsmokers. Breathing even a little tobacco smoke can be harmful.

Of the more than 7,000 chemicals in tobacco smoke, at least 250 are known to be harmful, including hydrogencyanide, carbon monoxide, and ammonia.

Among the 250 known harmful chemicals in tobacco smoke, at least 69 can cause cancer. These cancercausing chemicals include the following:

- Acetaldehyde
- Aromatic amines
- Arsenic
- Benzene
- Benzo[α]pyrene
- Beryllium (a toxic metal)
- 1,3-Butadiene (a hazardous gas)
- Cadmium (a toxic metal)
- Chromium (a metallic element)
- Cumene
- Ethylene oxide
- Formaldehyde
- Nickel (a metallic element)

- Polonium-210 (a radioactive chemical element)
- Polycyclic aromatic hydrocarbons (PAHs)
- Tobacco-specific nitrosamines
- Vinyl chloride

What are some of the health problems caused by cigarette smoking?

Smoking has been found to harm nearly every bodily organ and organ system in the body and diminishes a person's overall health.

Smoking is a leading cause of cancer and death from cancer. It causes cancers of the lung, esophagus, larynx, mouth, throat, kidney, bladder, liver, pancreas, stomach, cervix, colon, and rectum, as well as acute myeloid leukemia.

Smoking causes heart disease, stroke, aortic aneurysm (a balloon-like bulge in an artery in the chest), chronic obstructive pulmonary disease (COPD) (chronic

bronchitis and emphysema), diabetes, osteoporosis, rheumatoid arthritis, age-related macular degeneration, and cataracts, and worsens asthma symptoms in adults. Smokers are at higher risk of developing pneumonia, tuberculosis, and other airway infections. In addition, smoking causes inflammation and impairs immune function.

Since the 1960s, a smoker's risk of developing lung cancer or COPD has actually increased compared with nonsmokers, even though the number of cigarettes consumed per smoker has decreased. There have also been changes in the type of lung cancer smokers develop – a decline in squamous cell carcinomas but a dramatic increase in adenocarcinomas. Both of these effects may be due to changes in the formulation of cigarettes.

Smoking makes it harder for a woman to get pregnant. A pregnant smoker is at higher risk of miscarriage, having an ectopic pregnancy, having her baby born too early and with an abnormally low birth weight, and having her baby born with a cleft lip and/or cleft palate. A woman who smokes during or after pregnancy increases her infant's risk of death from Sudden Infant Death Syndrome (SIDS). Men who smoke are at greater risk of erectile dysfunction.

Cigarette smoking and exposure to tobacco smoke cause about 480,000 premature deaths each year in the United States. Of these premature deaths, about 36 percent are from cancer, 39 percent are from heart disease and stroke, and 24 percent are from lung disease. Smoking is the leading cause of premature, preventable death in this country.

Regardless of their age, smokers can substantially reduce their risk of disease, including cancer, by quitting.

What are the risks of tobacco smoke to nonsmokers?

Secondhand smoke (also called environmental tobacco smoke, involuntary smoking, and passive smoking) is the combination of "sidestream" smoke (the smoke given off by a burning tobacco product) and "mainstream" smoke (the smoke exhaled by a smoker). The U.S. Environmental Protection Agency, the U.S. National Toxicology Program, the U.S. Surgeon General, and the International Agency for Research on Cancer have classified secondhand smoke as a known human carcinogen (cancer-causing agent). Inhaling secondhand smoke causes lung cancer in nonsmoking adults. Approximately 7,300 lung cancer deaths occur each year

among adult nonsmokers in the United States as a result of exposure to secondhand smoke. The U.S. Surgeon General estimates that living with a smoker increases a nonsmoker's chances of developing lung cancer by 20 to 30 percent.

Secondhand smoke causes disease and premature death in nonsmoking adults and children. Exposure to secondhand smoke may increase the risk of heart disease by an estimated 25 to 30 percent. In the United States, exposure to secondhand smoke is thought to cause about 34,000 deaths from heart disease each year. Exposure to secondhand smoke also increases the risk of stroke by 20 to 30 percent. Pregnant women exposed to secondhand smoke are at risk of having a baby with low birth weight. Children exposed to secondhand smoke are at an increased risk of SIDS, ear infections, colds, pneumonia, and bronchitis. It can also increase the frequency and severity of asthma symptoms among children who have asthma. Being exposed to secondhand smoke slows the growth of children's lungs and can cause them to cough, wheeze, and feel breathless.

Is smoking addictive?

Yes. Nicotine is a drug that is naturally present in the tobacco plant and is primarily responsible for a person's addiction to tobacco products, including cigarettes. The addiction to cigarettes and other tobacco products that nicotine causes is similar to the addiction produced by using drugs such as heroin and cocaine.

How much nicotine is in cigarettes and cigars?

Cigarettes, cigars, and other tobacco products vary widely in their content of nicotine, cancer-causing substances, and other toxicants. In a cigarette (which contains 0.49 to 0.89 gram of tobacco), the nicotine content can vary between 13.79 and 22.68 milligrams per gram of dry tobacco. In a cigar (which can contain as many as 21.5 grams of tobacco), the nicotine content can vary between 6.3 and 15.6 milligrams per gram of tobacco or 5.9 to 335.2 milligrams per cigar.

The way a person smokes a tobacco product is as important as the nicotine content of the product in determining how much nicotine gets into the body. Nicotine is absorbed into the bloodstream through the lining of the mouth and the lungs and travels to the brain in a matter of seconds. Taking more frequent and deeper puffs of tobacco smoke increases the amount of nicotine absorbed by the body.

Are other tobacco products, such as smokeless tobacco or pipe tobacco, harmful and addictive?

Yes. All forms of tobacco are harmful and addictive. There is no safe tobacco product.

In addition to cigarettes and cigars, other forms of tobacco include smokeless tobacco (also called chewing tobacco, snuff, and snus), pipes, hookahs (waterpipes), bidis, and kreteks.

Pipes: Pipe smoking causes lung cancer and increases the risk of cancers of the mouth, throat, larynx, and esophagus.

Hookahs or waterpipes (other names include argileh, ghelyoon, hubble bubble, shisha, boory, goza, and narghile): A hookah is a device used to smoke tobacco. The smoke passes through a partially filled water bowl before being inhaled by the smoker. Some people think hookah smoking is less harmful and addictive than smoking cigarettes, but research suggests that waterpipe smoke is at least as toxic as cigarette smoke.

Bidis: A bidi is a flavored cigarette made by rolling tobacco in a dried leaf from the tendu tree, which is native to India. Bidi use is associated with heart attacks and cancers of the mouth, throat, larynx, esophagus, and lung.

Kreteks: A kretek is a cigarette made with a mixture of tobacco and cloves. Smoking kreteks is associated with lung cancer and other lung diseases.

What are the immediate benefits of quitting smoking?

The immediate health benefits of quitting smoking are substantial:

Heart rate and blood pressure, which are abnormally high while smoking, begin to return to normal.

Within a few hours, the level of carbon monoxide in the blood begins to decline. (Carbon monoxide reduces the blood's ability to carry oxygen.)

Within a few weeks, people who quit smoking have improved circulation, produce less phlegm, and don't cough or wheeze as often.

Within several months of quitting, people can expect substantial improvements in lung function.

Within a few years of quitting, people will have lower risks of cancer, heart disease, and other chronic diseases than if they had continued to smoke.

In addition, people who quit smoking will have an improved sense of smell, and food will taste better.

What are the long-term benefits of quitting smoking?

Quitting smoking reduces the risk of cancer and many other diseases, such as heart disease and COPD, caused by smoking.

Data from the U.S. National Health Interview Survey show that people who quit smoking, regardless of their age, are less likely to die from smoking-related illness than those who continue to smoke. Smokers who quit before age 40 reduced their chance of dying prematurely from smoking-related diseases by about 90 percent, and those who quit by age 45-54 reduced their chance of dying prematurely by about two-thirds.

People who quit smoking, regardless of their age, have substantial gains in life expectancy compared with those who continue to smoke. Those who quit between the ages of 25 and 34 years lived about 10 years longer; those who quit between ages 35 and 44 lived about 9 years longer; those who quit between ages 45 and 54 lived about 6 years longer; and those who quit between ages 55 and 64 lived about 4 years longer.

Does quitting smoking lower the risk of cancer?

Yes. Quitting smoking reduces the risk of developing and dying from cancer. Although it is never too late to get a benefit from quitting, the benefit is strongest among those who quit at a younger age.

The risk of premature death and the chance of developing cancer from smoking depend on many factors, including the number of years a person smokes, the number of cigarettes he or she smokes per day, the age at which he or she began smoking, and whether or not he or she was already ill at the time of quitting. For people who have already developed cancer, quitting smoking reduces the risk of developing a second cancer.

Should someone already diagnosed with cancer bother to quit smoking?

Yes. Cigarette smoking has a profound adverse impact on health outcomes in cancer patients. For patients with some cancers, quitting smoking at the time of diagnosis may reduce the risk of dying by 30 percent to 40 percent (1). For those having surgery, chemotherapy, or other treatments, quitting smoking helps improve the body's ability to heal and respond to therapy. It also lowers the risk of pneumonia and respiratory failure. Moreover, quitting smoking may lower the risk of the cancer returning, of dying from the cancer, of a second cancer developing, and of dying from other causes.

How can I get help to guit smoking?

NCI and other agencies and organizations can help smokers quit:

Go to Smokefree.gov, a website created by NCI's Tobacco Control Research Branch, and use the Step-by-Step Quit Guide.

Call the NCI Smoking Quitline at 1–877–44U–QUIT (1–877–448–7848) for individualized counseling, printed information, and referrals to other sources.

Refer to the NCI fact sheet Where To Get Help When You Decide To Quit Smoking.

OVERDOSE PREVENTION AND RESPONSE

Risks and Prevention Strategies

The following section highlights common overdose risks and provides prevention tips. We understood that every prevention message might not be applicable or pragmatic in every situation; we hope these tips can provide direction and messages can be shared and adapted as needed.

Risk Factor: Mixing Drugs

Drugs taken together can interact in ways that increase their overall effect. Many overdoses occur when people mix heroin or prescription opioids and/ or alcohol with benzodiazepines (such as Klonopin®, Valium®, and Xanax®). Most fatal overdoses are the result of poly-drug use.

All sedating medications carry overdose risks when taken on their own. However, when drugs are combined, the risk is substantially increased, because the drugs typically use different mechanisms in the body to create sedation. These mechanisms represent overlapping protection from the brain and respiration shutting down. This overlapping protection is diminished when multiple substances are combined. For example, the more alcohol and/or downers in someone's system, the less heroin needed to cause an overdose.

"Speedballing" — mixing heroin and cocaine — is a common combination. While it seems intuitive that combining a stimulant and a depressant would counterbalance the drugs' different effects, the combination does not cancel out overdose risk. Actually, people who speedball are at higher risk for overdose than people who use heroin or cocaine alone.

This is likely because:

1) the body has to process more drugs;

- 2) the stimulant causes vasoconstriction (which reduces blood flow to the brain) and causes the body to use more oxygen, while the depressant reduces the breathing rate;
- 3) people who speedball usually inject more frequently with less time between shots than people who are using only heroin.

Prevention Tips: Mixing Drugs

- Use one drug at a time.
- Use less of each drug.
- Try to avoid mixing alcohol with heroin/pills this is an incredibly dangerous combination.
- ➤ If drinking or taking pills with heroin, do the heroin first to better gauge how high you are alcohol and especially benzos impair judgment so you may not remember how much you have used.
- Have a friend with you who knows what drugs you have taken and can respond in case of an emergency.

Risk Factor: Tolerance

Tolerance is your body's ability to process a certain amount of a drug. Low tolerance means that your body can only process a small amount of a drug (i.e., it takes less drugs to feel the effects) and increased tolerance means your body has learned how to process increased amounts of the drug (i.e., it takes more drugs to feel the effects).

Tolerance develops over time, so the amount of a drug a long-time user needs to feel the drug's effects is a lot greater than a newer user. Tolerance also wavers depending on several factors including, weight, size, illness, stress, compromised immune system, and age.

Most importantly, tolerance can decrease rapidly when someone has taken a break from using a substance whether intentionally (i.e. while in drug treatment or on methadone detox) or unintentionally (i.e. while in jail or the hospital). Research has also shown that tolerance is affected when a person uses drugs in a new or unfamiliar environment, and can therefore increase their risk for overdose.

Prevention Tips: Tolerance

- > Use less after any period of abstinence or decreased use even a few days away can lower your tolerance.
- If you are using after a period of abstinence, be careful and go slow.
- Use less when you are sick and your immune system may be weakened.
- Do a tester shot, or go slow to gauge how the shot is hitting you.
- Use a less risky method (i.e. snort instead of inject).
- ➤ Be aware of using in new environments, or with new people this can change how you experience the effects of the drugs and in some cases, increase the risk of overdose.

Risk Factor: Quality

Quality refers to how pure, or strong, a drug is. The content and purity of street drugs is always unpredictable. They are often "cut" with other drugs or materials that can be dangerous. You can't tell how pure your drugs are from looking at them, and purity levels are always changing, which means you can do a shot that's a lot stronger than what you are used to and put yourself at risk of an overdose.

The same applies to prescription drugs — while we may know the contents of the pill and the dosage, you may not know how strong one type of pill is compared to another of a similar type. For example, an Oxycontin® is not the

same as a Vicodin[®], even though both are in the opioid family. Understanding strength and dosage when taking pills is as important as knowing the strength and purity of street drugs like heroin.

Prevention Tips: Quality

- > Test the strength of the drug before you do the whole amount.
- > Try to buy from the same dealer so you have a better idea of what you're getting.
- Talk to others who have copped from the same dealer.
- Know which pills you're taking and try to learn about variations in similar pills.

Be careful when switching from one type of opioid pill to another since their strengths and dosage will vary.

Risk Factor: Using Alone

While using alone isn't necessarily a cause of overdose, it increases the chance of dying from an overdose because there is no one there to call for help or take care of you if you go out. Many fatal overdoses have occurred behind closed or locked doors where the victims could not be found and no one was there to intervene.

Prevention Tips: Using Alone

- ➤ USE WITH A FRIEND!
- Develop an overdose plan with your friends or partners.
- Leave the door unlocked or slightly ajar whenever possible.
- Call or text someone you trust and have them check on you.
- Some people can sense when they are about to go out. This is rare, but if you are one of the people can do this, have a loaded syringe or nasal naloxone ready. People have actually given themselves naloxone before!

Risk Factor: Age and Physical Health

Your age and physical health impact your body's ability to manage drugs. While having more experience with substances is probably protective (and can increase tolerance), the cumulative effects of long-term substance use—which could include illnesses like viral hepatitis or HIV or infections, kidney, heart, lung, or circulation problems, or infections like endocarditis or cellulitis — may hinder resiliency. Older people who overdose are less likely than younger people to survive their overdose.

If you have a compromised immune system, you've been sick, or if you have a current infection, like an abscess, this also puts you at higher risk for overdose because your body is weakened. Dehydration and not eating or sleeping enough also puts you at greater risk for overdose. If you are a stimulant user, you are more at risk for a seizure, stroke, or heart attack if you also have other health issues like high blood pressure, heart disease, diabetes, high cholesterol or if you smoke cigarettes.

Liver and lung health, negatively impacted by hepatitis and smoking respectively, play an important role in overdose. The liver filters substances in the body and is involved in their metabolism; a poorly functioning liver means less capacity to metabolize substances in a timely manner. In other words, when your liver is not working well it can't process drugs and alcohol as easily, leading to "build-up" of drugs in your system; this can be toxic and make the effects of certain drugs last longer than they should.

Since downers cause your breathing to slow down, asthma or other breathing problems can put you at higher risk for overdose. Poor lung function decreases the body's capacity to replenish oxygen supply, which is essential to survive

an overdose. Using less when you are sick or recovering from an illness can reduce the risk of overdose. It is important to rely more on what you know about your own body, tolerance and experience, as opposed to what partners or friends may experience because there is substantial variability in how different substances are processed by different people.

Anyone who uses opioids, including *people who take opioids for pain*, should be aware of increased overdose risk if they:

- Smoke or have COPD, emphysema, asthma, sleep apnea, respiratory infection or other respiratory illness
- ➤ Have kidney or liver disease or dysfunction, cardiac illness or HIV/AIDS
- Drink alcohol heavily

Are currently taking benzodiazepines, other sedative prescription or antidepressant medication

Prevention Tips: Age and Physical Health

- > Stay hydrated! Drink plenty of water or other fluids.
- > Eat regularly.
- Get enough sleep and rest when you feel worn down.
- ➤ Pharmaceuticals (like opioids and benzos) especially those with Tylenol® (acetaminophen) in them are harder for your liver to break down. If you have liver damage, stay away from pharmaceuticals with a lot of acetaminophen in them, like Vicodin® and Percocet®.
- > Carry your inhaler if you have asthma, tell your friends where you keep it and explain what to do if you have trouble breathing.
- ➤ Go slow (use less at first) if you've been sick, lost weight, or have been feeling under the weather or weak this can affect your tolerance.
- > Try to find a good, nonjudgmental doctor and get checked out for any health factors that may increase your risk for a stroke, seizure, respiratory problems or heart attack.

Risk Factor: Mode of Administration

There are many ways to use drugs, including swallowing, snorting, plugging (drug-water solution introduced rectally with a needleless syringe — aka booty bumping), intramuscular injection, and intravenous injection. Regardless of the mode of administration, if someone uses enough drugs in a short enough period of time, overdose is possible.

Methods that deliver the drug quicker to the brain and are more likely to create a rush (such as intravenous injection and smoking) are linked to higher risk for overdose. Transition periods (i.e. changing modes of administration) can be dangerous, too. When someone switches the mode of administration that they are used to, it is harder to anticipate the effects. Similarly, when someone migrates to a different drug of preference or temporarily substitutes a different primary drug, there can also be a period of heightened risk. Some examples include: Going from swallowing methadone to injecting methadone; switching from swallowing oxycodone (OxyContin®, Roxicodone®, Percocet®) to swallowing oxymorphone (Opana®); or moving from injecting heroin to injecting Dilaudid®; these are all periods when heightened overdose prevention techniques are important.

Prevention Tips: Mode of Administration of the Substance

- ➤ Be mindful that injecting and smoking can lead to increased risk.
- Consider snorting, especially in cases when you're using alone or may have decreased tolerance.

- ➤ If you inject, try and remove the tie after registering and before injecting this will allow you to better taste your shot and inject less if it feels too strong.
- Be careful when changing modes of administration since you may not be able to handle the same amounts.

Risk Factor: Previous Nonfatal Overdose

People who have had a nonfatal overdose in the past may be at increased risk for overdose in the future. It is believed that this is related to drug use patterns and potentially risky behavior. Experiencing a nonfatal overdose may cause damage to the body, even if the person survives the overdose. One study found that many people who had experienced a nonfatal overdose also experienced other harms, including physical injury sustained when falling at overdose, burns, assault while unconscious, peripheral neuropathy (nerve damage, numbness/tingling), vomiting, temporary paralysis of limbs, chest infections and seizure.

Prevention Tips: Previous Nonfatal Overdose

- ➤ Always use with a friend or around other people.
- Use less at first, especially if you are using a new product.
- Make an overdose plan with friends or drug partners.

Overdose Recognition

If someone is using downers, like heroin or pills, and they are very high but not necessarily experiencing overdose, they may exhibit certain symptoms.

If a person seems too high or on the verge of overdose but is still conscious, walk them around, keep them awake, and monitor their breathing. If a person is experiencing an overdose emergency, their symptoms will be more severe than when they are high.

If someone is making unfamiliar sounds while "sleeping" it is worth trying to wake him or her up. Unfortunately, many loved ones of users have thought a person was snoring, when in fact the person was overdosing. These situations are a missed opportunity to intervene and save a life.

Important: It is rare for someone to die immediately from an overdose. When people survive, it's because someone was there to respond. *The most important thing is to act right away!*

High vs. Overdose

How do you tell the difference between someone who is really high or overdosing?

High:

- Pupils will contract and appear small
- Muscles are slack and droopy
- They might "nod out" (but remain responsive to stimulus)
- Scratch a lot due to itchy skin
- Speech may be slurred
- They may be out of it, but they will respond to outside stimulus like loud noise or a light shake from a concerned friend

Overdose:

- Awake, but unable to talk
- Body is very limp
- Face is very pale or clammy
- Fingernails and lips turn blue or purplish black
- For lighter skinned people, the skin tone turns bluish purple, for darker skinned people, it turns grayish or ashen
- > Breathing is very slow and shallow, erratic, or has stopped
- > Pulse (heartbeat) is slow, erratic, or not there at all
- Choking sounds, or a snore-like gurgling noise
- Vomiting
- Loss of consciousness
- Unresponsive to outside stimulus
- Responding to Opioid or Depressant Overdose

Assess the Signs:

- ➤ Is the person breathing?
- ➤ Is the person responsive?
- > Does the person answer when you shake them and call their name?
- Can the person speak? What is the skin color (especially lips and fingertips)?

Stimulation

If the person is unconscious or in a heavy nod, try and wake them up first by calling their name. You can also say something that they might not want to hear, like "I'm going to call 911" or "I'm going to give you naloxone (Narcan®)."

If they remain unresponsive, try to stimulate them with mild pain by rubbing your knuckles into the sternum (the place in the middle of your chest where your ribs meet) or rubbing your knuckles on their upper lip. The sternal rub is preferable over the upper lip because the person may have dental problems, or prosthetic teeth that may cause pain or unnecessary discomfort when rubbed vigorously. However, if the person is in a position where you cannot get to their sternum easily, or if they are wearing multiple layers of heavy clothing, rub the upper lip area.

If this causes the person to wake up, try to get them to focus. Can they speak to you? Check their breathing. Continue to monitor them, especially their breathing and pulse and try to keep them awake and alert. If their breathing is shallow, they tell you that they feel short of breath, or they are experiencing chest tightness — *call 911*.

If the person *does not* respond to stimulation and remains unconscious or the condition appears to get worse, do *not* try a different or alternative form of stimulation. Treat this as an emergency and call 911 immediately.

Recovery Position

If you have to leave the overdosing person at any time — even for a minute to phone 911 — make sure you put them in the Recovery Position: lay the person slightly on their side so that their body is supported by a bent knee, with their face turned to the side. This will help to keep their airway clear and prevent them from choking on their own vomit if they begin to throw-up.

Call for Help

It is recommended that you call 911 in the case of an overdose because it is important to have trained medical professionals assess the condition of the overdosing person. Even though naloxone can address the overdose, there may be other health problems going on. Also, people who survive any type of overdose are at risk of experiencing other health complications as a result of the overdose; such as pneumonia and heart problems. Getting checked out by a medical professional is an important part of reducing harms associated with overdose.

What to say when calling 911 will depend somewhat on how local responders typically handle overdose emergencies. In every situation, it is important to report certain key information including that the person's breathing has slowed or stopped, that they are unresponsive, and to clearly state the exact location. In many communities, the police respond along with the ambulance to *all 911 calls*. In other cases, police are only dispatched in cases where illegal activity is suspected, or if the dispatcher is concerned about the safety of first responders. In some communities, when the police respond they do not routinely arrest bystanders or victims at the scene of an overdose. However, in other places, it is common for police to arrest people at the scene of an overdose, and they have been known to charge people with everything from drug possession, to manslaughter (if the overdosing person dies and the bystander is proven to be the supplier of drugs). Fear of arrest and police involvement when calling 911 is substantial. Agencies should talk to participants about perceived and real risks associated with calling 911 and work with police and emergency personnel to address the fear of arrest and police involvement.

If calling 911 is not an option (some people will not call), it is important to make alternative plans in case your rescue attempts are not working. Can someone else in the vicinity call? Can you leave to alert someone else to call (even a passerby) after providing rescue breathing, administering naloxone, and/or putting the person in the recovery position? If you do need to leave the person, do your best to make sure they are in a place where they can be found, with doors unlocked and/or open. Remember, doing something is better than doing nothing.

Tips When Calling 911

It is important to educate participants about the safest and most effective ways to communicate with emergency dispatchers and personnel.

Tell the paramedics exactly where you and the overdosing person are. Give them as much information as possible so that they can find you quickly (i.e. 3rd floor, or in the bathroom).

When speaking with the dispatcher on the phone, avoid using words like drugs or overdose — stick to what you see: "The person is not breathing, turning blue, unconscious, non-responsive, etc." This makes the call a priority because it will be identified as a life-threatening emergency. The dispatcher does not need to know the details of the situation, only that there is an emergency that requires immediate assistance.

When calling 911, keep loud noise in background to a minimum — if it sounds chaotic, they will surely dispatch police to secure the scene and protect the paramedics.

When the paramedics arrive, it is important to give them as much information as possible; tell them what you know about what drugs the person may have been using, when they used them, whether naloxone was administered, etc. If the paramedics suspect opioid use, they will give the victim an injection or intranasal dose of naloxone. Remember: paramedics' main goal is to address the health of the individual and respond to the medical emergency.

Poison Control Centers

<u>Poison Control Centers</u> (PCC) are another resource available. Poison centers provide poison expertise and treatment advice by phone. PCC can answer a wide variety of questions about medications and street drugs and can help decide if it is necessary to go to the hospital or if a problem can be managed at home. The centers are completely confidential; specifically they never call law enforcement.

All poison centers can be reached by calling the same telephone number 1-800-222-1222, 24 hours a day. They are staffed by pharmacists, physicians, nurses and poison information providers who are toxicology specialists. They are not only available to the 50 states and Puerto Rico, but also to The Federated States of Micronesia, American Samoa, and Guam.

Perform Rescue Breathing

For a person whose breathing is severely impaired, rescue breathing is one of the most important steps in preventing an overdose death.

When someone has extremely shallow and intermittent breathing (around one breath every 5-10 seconds) or has stopped breathing and is unresponsive, rescue breathing should be done as soon as possible; it is the quickest way of getting oxygen to someone who has stopped breathing. If you are performing rescue breathing, you are getting much needed air into someone's body who will die without it; the difference between survival and death in an opioid overdose depends on how quickly enough oxygen gets into the person's body.

You may have heard that new CPR guidelines recommend "hands-only CPR" or the use of chest compressions only instead of both rescue breathing and chest compressions. However, these guidelines refer to layperson response to cardiac arrest, and **not** overdose. Rescue breathing is still recommended when responding to an overdose, where the primary issue is respiratory depression, and not cardiac arrest.

If you are alone with the overdosing person and have naloxone, give the person a few breaths first, then put them in the Recovery Position and go get your naloxone kit. If there is more than one of you there to respond to the overdose, DIVIDE DUTIES — have one person perform rescue breathing while another goes to get the naloxone kit and/or call 911.

Please review the attached link for information on overdose prevention and response. <u>Module 5: Overdose</u> <u>Prevention and Response - National Harm Reduction Coalition</u>

STATEMENT OF RECEIPT OF PATIENT HANDBOOK

I have received a copy of the handbook and received a formal orientation to the program and agency.