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AIDS AND METHADONE TREATMENT

by

Diana Hoover

**A Thesis Submitted to the Faculty of the Graduate School
of Loyola University of Chicago in Partial Fulfillment
of the Requirements for the Degree of**

Master of Arts

January

1988

(c) 1987, Diana Hoover

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VITA

The author, Diana Hoover, is the daughter of Keith Hoover and Evelyn Tussey Hoover. She was born January 26, 1954, in Elmhurst, Illinois.

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CHAPTER I

INTRODUCTION

In 1981, a group of homosexual men in the United States were identified as having unexplainable, typically fatal infections. The severity of infections in these men reflected a failure of their immune system to fight off invading microorganisms that generally pose no threat to the average person. What was initially perceived as a phenomenon limited only to homosexual men quickly expanded to include intravenous drug abusers who used nonsterile needles, and some recipients of blood transfusions. The spread of the illness to these groups suggested that the cause of the disease was an agent transmitted through both blood and semen. It was at this time that the term Acquired Immunodeficiency Syndrome, or AIDS, was developed. It described an acquired disease of the immune system that reflected a deficiency in immunity and predisposed affected persons to frequent and overwhelming infections. Less than three years later, researchers isolated a virus as the causative agent. By that time, over 12,000 Americans had contracted the disease. Most of those affected died within a year of diagnosis, and it was estimated that the number of cases would double every eight to ten months (Frumkin & Leonard, 1987).

Purpose of the Study

The purpose of this thesis is to examine several factors and issues related to counseling intravenous drug users in methadone treatment who have AIDS. This was accomplished partly through the use of a case study of a young woman with AIDS in methadone treatment in Chicago, Illinois. Her substance abuse history is given, as well as level of psychological functioning, and educational/vocational/financial history. Her legal, family, social, and treatment histories are detailed as well as her medical history as it pertains to AIDS, opportunistic infections and prognosis. Following an

assessment of the case, the study addresses issues that people with AIDS face, in particular, the issues she faces, death and dying issues as well as family/support issues she is confronting.

As a result of this inquiry, it is hoped that counselors working with substance abusers with AIDS will find the study of value when working with similar clients. In 1987, scientists are only beginning to see the impact this epidemic will have on IV drug users and their partners. The chronicity of IV drug use compounded by a nearly always fatal disease makes working with individuals such as these increasingly difficult. Counselors in the field of drug abuse treatment are now being forced to face their own issues of death and dying as they try to facilitate drug-free recovery and bring some comfort to an already socially disenfranchised population.

Methadone Treatment

Methadone maintenance, a form of drug abuse treatment used in this country since the late 1960's, services intravenous drug users. Methadone is a synthetic narcotic which is taken orally as a substitute for heroin. Methadone treatment refers to a regimen which utilizes methadone as a medical support of therapeutic and ancillary rehabilitation services designed to assist narcotic-addicted clients in their efforts toward recovery (Illinois Alcoholism & Drug Dependence Association [IADDA], 1987). Methadone treatment is thought by many to be the most cost effective method of helping people addicted to heroin and of reducing the incidence of needle sharing. In New York, an addict in methadone treatment is found to be ten times less likely to be involved in the transmission of the virus causing AIDS through needle sharing (IADDA, 1987). The state drug abuse authorities in California, New York, and New Jersey have expanded methadone treatment services and attempted to make them more accessible.

The Acquired Immunodeficiency Syndrome Virus

The virus that causes AIDS is now referred to as Human Immunodeficiency Virus, or HIV. Because the AIDS virus has appeared in the literature under the names HTLV-III/LAV, HTLV-III, LAV, and ARV (AIDS-Associated Retrovirus), an international committee of virologists voted in early 1986 to recommend that scientists use the term HIV when referring to the causative agent of AIDS (Frumkin & Leonard, 1987).

More than a million U.S. residents are thought to carry HIV. Until recently, scientists have been predicting that the majority of HIV-infected persons would remain free of the disease. The U.S. Surgeon General, for example, said in his 1986 report on AIDS, "The majority of infected antibody positive individuals who carry the AIDS virus show no symptoms and may not come down with the disease for many years, if ever," (Koop, 1986). As time progresses, however, the number of persons developing AIDS continues to increase. Of those who are HIV positive who develop AIDS, the percentage quoted in the scientific community has ranged from 20% to 60% or 70%. Increasingly, scientists are saying that they simply do not know what percentage of infected persons will develop the disease (NIDA, 1987).

The Centers for Disease Control in Atlanta is estimating that 20-30% of people positive for HIV will develop AIDS; however, predictions are changing over time. One year ago the CDC estimated that 5-10% of HIV-infected persons would develop AIDS. Theoretically, if the rate of progression from infection to disease does not slow with time, all seropositives (those people with the virus) would eventually manifest AIDS-related illnesses especially as the immune system becomes less effective with age (NIDA, 1987).

State and National Statistics of Infected IV Drug Users

By May 1, 1987, 903 AIDS cases were reported in Illinois; 661 in Chicago (Chicago Department of Public Health, 1987). Five-hundred and twenty-two of those 903 persons are dead. As of May 1, 1987, 11-12% of AIDS cases in Chicago are intravenous drug

users, and the reported number of AIDS cases among IV drug users in Illinois totaled 98, 11 of whom have died. Nationally, 25% of AIDS cases are IV drug users (NIDA, 1987). In New York, it is projected that 60-80% of all IV drug users have the virus. In Chicago where there are 60,000 IV drug users, seroprevalence (an estimation of how many people have the virus) has been estimated as high as 40%.

Nationally, there have been 35,068 diagnosed AIDS cases. Twenty-thousand two-hundred and forty-one have died, with a case fatality rate of 58%. For every person with AIDS, it is estimated that there are ten people with AIDS-Related Complex, or ARC, and 100 people infected with HIV. The number of people with AIDS is doubling every year, some claim every ten months (NIDA, 1987). As the number of AIDS cases increases, the impact on society becomes greater. A June 1986 update of the Public Health's Service master plan for controlling AIDS predicts an eight-fold increase in diagnosed cases within the next five years—for a total of 270,000 AIDS victims by the end of 1991 in the U.S. alone, of whom 179,000 will have died (NIDA, 1987).

The Illinois Department of Public Health records indicate that 100 Illinois IV drug users have been diagnosed with AIDS, as of May, 1987. An estimated 1,000 have ARC, and 5,000-10,000 IV drug users are infected with HIV. If every effort to educate IV drug users, their sexual partners and the public was successful, and no more people became infected, Illinois might still see 2,000 to 4,000 IV drug abusers develop AIDS within five years and expect to see a total of 5,000 to 10,000 IV drug users develop AIDS within the next 10-20 years—because they are already infected. At a cost of \$100,000 each for medical care, Illinois will pay \$200 million - \$400 million over the next five years and a total of \$500 million - \$1 billion in the next 10-20 years just for the intravenous drug abusers and their sexual partners. At the present time, drug abusers make up 11% of Illinois AIDS cases. However, this is expected to increase to 25%. If through prevention and substance abuse treatment, one in ten people at risk avoids AIDS, Illinois could

save \$50-100 million over the next 10-20 years (NIDA, 1987).

In New Jersey, the majority of people with AIDS are IV drug users, as contrasted with homosexuals, and drug users have been the largest population at risk since 1985. Intravenous drug use is thought to be the major mode of HIV transmission because of the high incidence of IV drug use in New Jersey and New York. Additionally, much heroin is channeled through New York City. The expansion of the epidemic in New Jersey is indicative of the potential in Illinois and other states where the epidemic is in its early stages. By late 1991, there will be a new case of AIDS in New Jersey every three hours (NIDA, 1985). Drug abuse treatment tends to diminish the sharing of needles. Theoretically, if addicts are in treatment, they will share fewer needles, thereby decreasing the spread of HIV; and complementarily, reduce the spread of the virus through sexual intercourse. The number of people infected by the currently infected population of drug abusers, their sexual partners and babies will double every ten to twelve months so that 5,000-10,000 carriers will increase to 160, 000 - 320,000 in five years (NIDA, 1986).

AIDS & Methadone Treatment

Since one of every four AIDS cases to date has been an intravenous drug user, drug abuse treatment programs have been affected by AIDS. Contaminated needles are now, directly or indirectly, the major sources of this to-date fatal disease for women, newborns, prisoners, and minorities (Koop, 1986). The hope for control of AIDS is education and prevention since there is not yet any reliable cure or vaccine. Intravenous drug users are, however, difficult to reach with AIDS prevention messages. Methadone treatment programs provide an opportunity to impact a portion of the intravenous drug-using culture.

There are several areas in which AIDS is affecting methadone treatment. As addicts learn about AIDS there is a greater interest in methadone treatment. Most drug-

abuse treatment programs in cities with high numbers of AIDS cases have long waiting lists for clients to enter treatment (IADDA, 1987).

Many programs have strict admission criteria, often highly exclusionary, which prevent addicts from entering treatment, for e.g., some clinics will not allow re-entry to clients who have been there or at other clinics too many times ("too many" being an arbitrary number). Some programs are reassessing their admission criteria favoring treatment for as many addicts as possible over treatment for relatively newer clients not in the treatment system very long who may be more receptive to change.

Clients on low doses of methadone (up to 25 mg.) may continue to use heroin intravenously to obtain a "high," thereby possibly continuing to share contaminated needles. Although clients on high doses of methadone may use heroin less frequently, the ethical question of creating more greatly dependent methadone addicts may supercede the argument to reduce needle sharing.

Some states are considering dispensing needles to addicts in an effort to curb the incidence of needle sharing. The double message given to addicts has prevented widescale acceptance of this idea. Additionally, no Illinois drug treatment programs are dispensing bleach for addicts to clean their needles and drug paraphernalia before sharing them. However, some drug clinics are handing out spermicidally lubricated condoms to reduce the spread of the virus through sexual intercourse.

Drug treatment programs are becoming more politically active given the legislation on AIDS in front of many general assemblies. Many legislative packets directly involve IV drug users and the treatment programs that serve them, for e.g., routine mandatory testing of addicts seeking treatment, contact tracing of other people that clients may have infected, quarantining of those people infected with HIV, and issues pertaining to the confidentiality of infected individuals.

Format of the Study

Following the introductory chapter, the format of the study includes a description of AIDS and pertinent factual information necessary to understanding the disease (Chapter 2). The history of the disease will be discussed as well as basic immunology, symptoms of the disease, HIV testing, high risk behaviors related to infection, the prognosis of the disease and treatments currently available.

Chapter 3 will give the reader a basic understanding of methadone treatment and how AIDS is affecting IV drug use and drug abuse treatment. Chapter 4 is the case study of a young woman with AIDS who is currently in methadone treatment. Finally, Chapter 5 includes recommendations for counseling people with AIDS who are in methadone treatment as well as in drug-free models of treatment.

CHAPTER II

ACQUIRED IMMUNODEFICIENCY SYNDROME

Origin of Human Immunodeficiency Virus

AIDS is an acronym for Acquired Immune Deficiency Syndrome. This serious infectious disease, which was first recognized in the United States in the summer of 1981, undermines the body's immune system and leaves the affected person susceptible to a variety of fatal "opportunistic" diseases and cancers which are not ordinarily life-threatening to persons with normal immune responses. Additionally, AIDS has been increasingly associated with a variety of severe neurological impairments, including fatal dementia, a debility that initially affects memory. Some central nervous system complications may also be present in the majority of AIDS cases (NIDA, 1985).

Africa and Haiti have been associated with the origins of AIDS. It has been suggested that the Human Immunodeficiency Virus (HIV) is akin to a virus found in the African green monkey. There are several theories regarding the precise mode of transmission. According to one theory, the African green monkey virus may have been transferred to humans who were bitten by infected monkeys. Some researchers have speculated that the disease was transmitted because some African populations eat the monkeys. Theorists suggest that the disease may have been passed to Europeans who traveled to Africa or by Africans visiting Europe or Haiti, where the virus was transmitted by unsafe gay sexual contacts. Some researchers have further suggested that the spread through Africa is promulgated by both prostitution and unsterile hypodermic needles used in health care (NIDA, 1985). It is important to understand that all theories as to the origin of HIV are conjecture. Its origin is simply not known at this time.

Haiti has also been placed under particular scrutiny in theories regarding AIDS transmission. There is tremendous poverty among many Haitian residents, and Haiti

has a reputation as a "playground" for vacationing gays and bisexuals (NIDA, 1985). It has been suggested that some Haitians, motivated in part by their extreme poverty, become sexually involved with gay vacationers in exchange for monetary rewards. As the theory holds, these Haitians, unknowingly infected with the virus, passed it on to other Haitians through heterosexual contact (NIDA, 1985).

Some African scientists criticize these assertions and findings by noting that European and American researchers did not collect their data in Africa and by charging that their research methods are erroneous and unscientific. They suggest that there may be no African connection at all to the worldwide AIDS epidemic and that what has occurred is merely another strain of virus similar to the so-called AIDS virus found in some Central African populations. This is borne-out, they contend, by the distinct differences between the human response to the African virus and the human response to the European and American virus. The African virus seems easily transmittable from women to men, unlike the American and European virus. Moreover, according to some African scientists, the African virus does not destroy the immune system like its European and American counterparts. Consequently, half the African population who have the virus are women. They then transmit it to men. However, Africans do not appear to die from the virus like Europeans and Americans. Finally, according to the argument of African scientists, the few Africans who have AIDS similar to the European and American response are principally Africans who have visited Europe or America and then returned to Africa (NIDA, 1985).

In considering these issues, it is always important to remain aware of the sensitivities provoked by the topic. First of all, presumably no one wants the heavy burden of an association with the origin of AIDS. Hence, until proven otherwise, anyone who is the object of such an association quite understandably may be inclined to deny it. In the cases of African nations and Haiti, spokespersons for those countries

have charged that racism and poorly conceived opinion are the fundamental bases of the AIDS-origin theories (NIDA, 1985).

Another variation on the origin of the virus lies in the Haitian connection to Zaire. When Zaire (formerly Belgian Congo) became independent in the early 1960s, it appealed to the United Nations for black, French-speaking professionals to help with economic independence. Haiti responded. As a result many Haitians resided in Zaire. However in the mid-70s, Zaire began nationalizing businesses and many Haitians left. Most went back to Haiti, but some went to the United States and Europe. Since Haiti is a vacation place for Americans, some Haitians may have been carrying HIV and infected American vacationers (NIDA, 1985). However, others believe Haitians may not have been responsible but that it could have been any traveler. A very small number could have begun an epidemic. There does not seem to be verifiable proof for any of this. It was perhaps the best guess because HIV has been found in those places. It is important to know the natural history of the virus, however. If the source can be located, although it is unlikely at this stage of the virus' progression, it would be possible for scientists to go back to the locale and learn more about its living relatives and ancestors. Potentially local variants of the virus may be found that happen to be non-virulent. A non-virulent relative could be used to develop a vaccine (Finkbeiner, 1985).

HIV & the Immune System

Essentially, HIV works by eliminating the key component of the body's immune system, the T4 lymphocyte, or helper cell. The normal human immune system has an army of millions of white blood cells, manufactured in the bone marrow, that can be mobilized for war against foreign invaders such as viruses, and the call to arms is issued by the T4 cells. Normally, viruses work as follows: Both the common cold and the flu are caused by viruses. When the virus, which is insoluble, gets into the blood stream, it is spotted by white blood cells called phagocytes (Greek for "eater of cells").

The phagocytes are the foot soldiers of the immune army, patrolling for enemies. The phagocyte, in this case a "macrophage," literally chews the virus into small pieces. Then the phagocyte reports back to the command post, or the T4 cell. Much like holding up a sign, the phagocyte presents to the T4 cell the chewed-up pieces of the virus called viral antigens (Latin for "anti-species"). This process is called "antigen presentation." The T4 cell recognizes the antigen signal and orders a mobilization for war. There are two fighting divisions, the B cells, named for the bone marrow where they are manufactured, and the T cells, named for the thymus gland (Breo, 1987).

Initially, the T4 cells manufacture interleukin-2 (a hormonal ingredient), a growth factor that tells all the cells of the immune system to start multiplying, and the multiplying B cells manufacture antibodies to attack the virus. This process is called "antibody-mediated" immunity. The multiplying T cells include Killer T-Cells and Natural Killer Cells, both of which attack the virus. This process is called "cell-mediated" immunity. The T4 cell (or helper cell) also sends out a signal to activate the T8 cells (or suppressor cells). T8 cells regulate the response of the immune system preventing it from "overkill" or an inappropriate immune response. Without the suppressor cells, the immune system might make antibodies forever and overdose on its own defense (Breo, 1987). A hyperallergic response is such an example of this type of inappropriate immune response.

The B division and the T division of the immune army fight separately and collectively against the foreign invaders and, in the case of a cold, usually subdue the virus within a week. This is not the case with HIV, which is believed to enter the body as an infected cell in blood or semen. The phagocyte rushes to the infected cell, ingests the HIV, but the foregoing plan of attack cannot happen. This virus can live in the phagocyte, not well, but it can survive there. So, when the phagocyte presents the HIV to the T4 cell, it is presenting not a chewed up bit of antigen but the whole virus. This is

further compounded by the fact that the T4 cell becomes infected, too. By ingesting whole virus, the phagocyte itself becomes capable of infecting the T4 cell. Once the T4 cell is infected, the virus can remain undetected for years waiting for the right conditions that will enable it to take over and destroy the cell and manufacture new viruses (Breo, 1987).

It is necessary for viruses to locate inside a living cell before they can make copies of their genetic programs which exist simply to make more viruses. This is what HIV does. To enter a cell, the specifically shaped protein coat of a virus must match receptors, portals of entry, on the cell surface. If a virus' protein coat fails to fit the cell's receptor, as the key fits a lock, no infection occurs (Thompson, 1985). The protein that wrap HIV have a special affinity for helper T cells. To take command of the DNA-based T cell, however, the RNA -based retrovirus must use a special enzyme called reverse transcriptase to translate its genetic information into the more standard DNA (Thompson, 1985). (A retrovirus is a type of virus that stores its genetic information in a chemical called ribonucleic acid, or RNA. Almost every other organism from virus to bacteria, fungi, plants, insects, fishes, birds and mammals stores its genetic information in deoxyribonucleic acid, or DNA.)

Once the HIV genes have been converted into chunks of DNA, they can become randomly integrated into the human DNA already in the cell. Once inserted, the HIV can lie dormant for weeks before it causes disease. Or it can lie quietly for a year or two or up to 10-20 years (Thompson, 1985). It is the periods of latency and occasional activation which may explain why there is such a long lag time between exposure to the virus and development of the disease. Typically, the latency period is two to five years. To activate the HIV, a leading theory holds that the infected T cells must begin to divide, which they typically do when preparing to create more T cells to fight some other infection (Thompson, 1985). This is why it is other "opportunistic" infections which

kill a person with HIV. As the T cells divide, HIV genes become activated and begin making large numbers of new viruses. This process destroys the T cells and floods the blood with new viruses that go on to infect other T cells. The HIV continues to replicate and destroy T cells until few remain causing the host's immune system to fail (Thompson, 1985).

HIV Modes of Transmission

Not everyone who comes into direct contact with HIV becomes infected, just as influenza does not occur from every exposure to the flu virus, even if prior immunity to a particular strain is not present (NIDA, 1985). It is important to distinguish between infection, meaning a virus has actually entered the body and invaded a living cell, and exposure, meaning there was only an opportunity for such invasion (NIDA, 1985). HIV is actually a somewhat fragile virus and not very contagious. It takes quite a large dose and repeated exposures to actually infect someone. HIV is also readily inactivated by standard disinfecting procedures, and is apparently only transmitted among humans in three ways: 1) through intravenous injection of HIV contaminated blood or blood products (e.g., the clotting factor, Factor 8, used by hemophiliacs), during blood transfusions, treatments for hemophilia, needle-sharing among drug users, and, less frequently, by unsterile instruments used for procedures like tattooing; 2) through sexual contact in which there is exchange of infected semen between males, and less so in this country, from vaginal secretions from female to male, and through infected semen from male to female; and 3) from infected mothers to babies in the uterus before birth, during the birth process, or (less likely) through breast milk while nursing (NIDA, 1985).

Relative Risk of Transmission

As every exposure to the virus does not result in infection, it is important to understand those factors which seem to increase the occurrence of HIV infection from

exposure(s). Among these risk factors is primarily the body fluid that conveys the virus. HIV has been cultured from infected patients' blood, semen, vaginal and cervical secretions, saliva, tears, brain tissue, spinal fluid, lymphnodes, bone marrow, breast milk, urine, feces, and menstrual blood. However, blood products and semen are the most likely transmitters of HIV. These body fluids contain a high concentration of lymphocytes, the cells most likely to be invaded by HIV (NIDA, 1985). Although HIV has been isolated from tears and saliva, and the other products mentioned above, the concentration of the virus in these fluids and products are low. No cases of AIDS have been confirmed as a result of exposure to infected saliva or tears (NIDA, 1985).

Some experts theorize that HIV-infected persons only "shed the virus" intermittently, being more contagious at some times than others. The concentration of the virus probably also varies among individuals and with the stage of disease progression. Researchers think asymptomatic carriers or mildly ill "ARC" patients may be more contagious than AIDS patients whose immune system is so severely damaged that the infected carrier cells are depleted. "ARC" stands for AIDS-Related Complex, or Conditions, and it is a lesser form of the disease AIDS. AIDS is actually a diagnosis not a disease. A person who is positive for HIV antibodies does not have AIDS, or ARC. The infected person must be HIV antibody positive and have the presence of certain "opportunistic" infections to be classified as having AIDS. An ARC patient will be HIV antibody positive and have some less serious symptoms of immune dysfunction.

Cofactors of AIDS-Related Complex & Acquired Immunodeficiency Syndrome

A number of possible "cofactors" (agents or other factors that are necessary or increase the probability for development of a disease) may either predispose some individuals or groups to initial HIV infection and/or potentiate the effects of infection causing progression to serious disease (NIDA, 1985). Some examples of cofactors are

drug use, herpes simplex, tuberculosis, anxiety or other stressors, pregnancy, allergies, pre-existing disease— cancer, diabetes, trauma— surgery, accidents, and poor nutrition. Other intercurrent infections such as hepatitis B, and other sexually transmitted disease are also cofactors that may trigger rapid progression from infection to disease (NIDA, 1985).

Spectrum of Response to HIV

Persons who become infected with HIV can manifest a broad spectrum of clinical responses, of which AIDS is just the end stage and most severe form. Three types of responses briefly referred to previously are 1) asymptomatic seropositive (sero means blood, i.e., positive for antibodies in blood), 2) ARC, and 3) "full-blown" or "frank" AIDS. Most persons infected with HIV show no immediate symptoms or signs of illness. There is no way to know just when infection occurs or if it will. However, about 20% of AIDS cases in England as well as a few cases in the U.S. and Australia have reported sudden but brief illnesses that may have signaled "onset" of infection. These acute reactions lasting three to 14 days, resembled mononucleosis or flu, accompanied by fever, fatigue, a red rash, swollen glands, headache, sore throat, and muscle pains. These transient and limited illnesses appeared a few weeks after probable infection and were, in turn, followed by seroconversion. Seroconversion is the point at which antibodies to specific antigens are produced by B lymphocytes and become detectable in the blood. Those with no symptoms or signs of illness are considered asymptomatic (NIDA, 1985).

It takes from two weeks to six months or longer after HIV enters the body before antibodies to the virus are detectable in blood samples or seroconversion takes place. Nearly all HIV-infected persons remain symptom-less for the first six months to a year. This incubation period, also referred to as latency or dormancy, may continue for as long as seven years and perhaps for life. The history of AIDS is still too short for us to know (NIDA, 1985). Some initially asymptomatic carriers of HIV do, however, develop

mild to severe clinical symptoms of a damaged immune system. Unfortunately, the significance of HIV infection for any individual is unknown, and one of the most troubling questions about HIV infection is the prognosis for progression to a disease state. It should be noted with regard to HIV infected persons that those infected with HIV must be presumed infectious even though they are asymptomatic (NIDA, 1985).

If the rate of progression from infection to disease does not abate, pessimistic AIDS researchers predict that half or more of the currently infected will have ARC, or AIDS, or be dead within a decade. Other scientists think as many as 35% of currently seropositive persons will develop AIDS in 6 to 8 years. Some believe that theoretically, if the rate of progression from infection to disease does not slow with time, all seropositives could eventually manifest AIDS-related illnesses, especially as the immune system becomes less effective with age (NIDA, 1985).

HIV Antibody Testing

There are two forms of testing used to detect the presence or absence of HIV antibodies in the blood. The first form of testing is called the ELISA, the enzyme-linked immunosorbent assay. When pieces of HIV are placed in a blood sample (approximately one tablespoon is used for both forms of testing), any matching antibodies in the blood will stick to the virus. The ELISA test is however non-specific to this group of viruses, and may sometimes indicate that antibodies are present when they are not (Finkbeiner, 1985). The secondary follow-up testing needs to be done to all ELISA positive tests, and it is called the Western Blot. This test is specific to HIV antibodies and is used as the confirmatory test. The Western Blot can differentiate between HIV antibodies and others that also "cross-react" with the ELISA and cause most of the false positive results. However, the Western Blot test can only be conducted by specially trained technicians, requires several days to complete, and costs from \$30 to \$75 or more per

test. This contrasts with relatively simple procedures for the ELISA, a turnaround time of only a few hours, and an approximate cost of \$2 to \$3 per test (NIDA, 1985).

Another type of HIV diagnostic test is currently being improved and should overcome many of the deficiencies encountered with the current ELISA. A "gene-probe" procedure is currently under investigation which can detect actual presence of HIV by binding with its unique genetic material. This new technology promises to be much more specific and reliable than the ELISA, as well as less expensive and faster. Because this test detects active virus, not antibodies, it will also provide better evidence of infectiousness (NIDA, 1985).

A negative, or seronegative, test result means that no antibodies to HIV were found in the patient's blood— at this time. There are two interpretations of this result: 1) the client has not been infected, by good luck or good management, and should continue exercising all necessary precautions to avoid future exposure to HIV, or 2) the client is infected, but the body has not yet produced antibodies that can be detected by the test. Most people who become infected produce antibodies within six to eight weeks of infection, but a few take as long as six months, and a rare number never manufacture antibodies— even though HIV can be cultured from their body fluids. To be safe, the patient should continue taking all necessary precautions against further exposure and consider retesting after six months (NIDA, 1985).

Symptoms of Acquired Immunodeficiency Syndrome & AIDS-Related Complex

HIV-infected persons who do manifest clinical signs usually have one or more symptoms which may also be indicators of other common illnesses, including withdrawal from drug dependence. There are no clinical symptoms of abnormal functioning of the immune system per se (NIDA, 1985). Unusual persistence of two or more signs for a month or longer, in the absence of other explanations, is cause for concern.

A physician is needed to investigate these symptoms and rule out or confirm HIV infection as their cause. Symptoms of AIDS-Related Complex (ARC) are as follows (the first six being typical of ARC, the last five associated more with AIDS): 1) unusual unexplainable fatigue or listlessness, 2) rapid unexplained weight loss of 10-15 pounds or 10% of body weight, 3) persistent fever of 100 degrees, 4) recurrent drenching night sweats, 5) chronic swollen lymph nodes in the neck and/or armpits in addition to the groin area, 6) chronic unexplained diarrhea, 7) persistent dry cough and/or shortness of breath, not from smoking or flu, 8) oral thrush, or white patches on tongue, throat and/or inside the mouth, 9) bruising or bleeding that does not heal easily, 10) brownish, reddish, or bluish skin spots that are usually painless and found on ankles, inside the mouth and nose, under eyelids or around the rectum, 11) memory loss, changes in gait or coordination, confusion, blurring of vision/hearing, slurred speech or delusions (NIDA, 1985). The foregoing symptoms are indicative of ARC and AIDS, however do not exclusively constitute a diagnosis of AIDS. A complete diagnosis of AIDS follows in the next section.

Additionally, to confirm a diagnosis of a HIV associated condition, physicians use a variety of laboratory tests, as well as thorough physical examinations and careful medical and social histories. They may look for suppressed lymphocyte counts, inverted T-helper to suppressor cell ratios, elevated immunoglobulin (proteins that fight infection) levels, non-reactive skin tests to recall antigens for such other viruses as mumps or tuberculosis, and other evidence of immune abnormalities in addition to positive results from one or more HIV antibody tests. Persons with evidence of immune system abnormalities but none of the "opportunistic" infections and malignant cancers required by the Centers for Disease Control in Atlanta for confirming a full-blown case of AIDS are usually said to have ARC (NIDA, 1985).

The prognosis for ARC cases, like that for seropositives is unclear, but to date at least one quarter or more do develop full-blown AIDS within a five-year period. Epidemiologists estimate there are approximately 10 persons with ARC for every diagnosed AIDS case. And for every 10 persons with ARC, there are 100 people infected with HIV, it is estimated (NIDA, 1985).

A diagnosis of ARC says little about individual functioning or the fluctuations between acute illness and "slightly run down" conditions that these patients experience. Some ARC-diagnosed patients die before they are reclassified as "full-blown" AIDS; others may continue a relatively normal and productive lifestyle for an indefinite period of time (NIDA, 1985).

The difference between ARC and AIDS is one of definition for purposes of reporting the cases to the Centers for Disease Control. For surveillance purposes, to make certain that the cases counted officially are accurate, the CDC requires that at least three conditions be met: 1) a positive HIV antibody test, 2) the presence of a reliably diagnosed, objectively confirmable (by culture of biopsy) disease that is at least moderately indicative of underlying cellular immunodeficiency and the absence of other explanations for this condition, and 3) other diseases and malignancies not on the original CDC list of opportunistic infections and cancers that are included in the definition when found in combination with a positive antibody test (NIDA, 1985).

Infections Which Constitute An AIDS Diagnosis

The opportunistic infections and cancers that persons with AIDS suffer from are not common or significant in persons with healthy immune systems. Many are caused by infectious agents that are found throughout our environment. These illnesses recur in AIDS patients after specific treatment stops because they have no more "resistance." The most frequently encountered AIDS-associated illnesses are: 1) Pneumocystis Carinii Pneumonia (often referred to as PCP) which is characterized by dry cough,

shortness of breath and intense pain when inhaling. It often lasts for a month and is sometimes preceded by diarrhea, night sweats, fever and weight loss. The drug therapy used in treatment is frequently accompanied by adverse reactions in AIDS patients (NIDA, 1985), 2) Kaposi's Sarcoma (KS) which is a rare cancer of the skin's blood vessels that first appears as small lesions on the trunk, arms, head, and neck and later develops into ulcerating sores or invades the lungs and other organs. It is the second most common manifestation of AIDS. It most frequently occurs in white, gay males but has been found in all risk groups. The great majority of AIDS cases have one or both of these two conditions—PCP and/or KS. About half of AIDS patients die of PCP and another fifth succumb to KS (NIDA, 1985).

Candidiasis or candida (thrush of the esophagus), is the third most frequent disease listed as evidence of an AIDS diagnosis. Some form of thrush is present in 60% of AIDS cases, but may not be listed as a primary condition. Oral thrush is often the first manifestation of HIV infection. Cryptococcus is a fungus infection that may cause meningitis or central nervous system involvement in AIDS cases or may produce pneumonia or pleurisy with headache or fever. Other opportunistic infections include: Cytomegalovirus (CVM) which causes a mononucleosis-like syndrome; Cryptosporidium, which is a parasite that produces unrelenting diarrhea with enormous fluid losses in AIDS patients, accompanied by nausea, vomiting and loss of appetite. Herpes simplex virus, toxoplasmosis (a parasite found in undercooked meats which can lead to brain infections), various neurological diseases and lymphomas (tumors of the lymph system), and unusual forms of tuberculosis are also included in the list of opportunistic infections associated with AIDS (NIDA, 1985).

Some of these severe infections occur more frequently in different risk groups than others for unknown reasons. For example, IV drug users are more likely to have tuberculosis and pneumonia, gays to contract Kaposi's Sarcoma, Haitians to get

toxoplasmosis, and immigrants from developing countries to have cryptomeningitis. Only a small percentage of heterosexuals report KS without PCP (NIDA, 1985).

Opportunistic infections recur in AIDS patients, even after apparently successful treatment, until the patient finally succumbs to one of them. Autopsies often show multiple undiagnosed diseases. Patients don't die from AIDS itself, it should be remembered, only from repeated invasion by the devastating secondary infections and cancers (NIDA, 1985).

The average life expectancy for an AIDS patient is now 18 to 24 months after diagnosis. This means survival time has been substantially increased since 1982 (6-9 months) by better treatment techniques for the opportunistic infections that attack AIDS patients. Eighty percent of Persons With AIDS (PWAs) still die within the first three years and virtually all succumb within five years. Those who present with certain diseases like PCP seem to die faster. Intravenous drug users usually die more rapidly than other risk group members probably because their immune systems are so compromised before they get AIDS, and they fail to get a diagnosis until the disease has progressed severely (NIDA, 1985).

Treatments for AIDS

Aside from special therapies used to combat opportunistic diseases and malignancies in AIDS patients, there is currently no effective cure for AIDS itself. Research is underway to find ways of either killing HIV or restoring the damaged immune system or both. Attempts have been made to restore the immune system and replenish it with doses of interleukin-2 or interferon (a substance that regulates cell growth and immune response). Neither of these approaches has met with much success (NIDA, 1985).

One of the first antiviral medications to achieve some effectiveness against HIV is azidothymidine, or AZT. AZT slows the replication of the virus. The drug's annual

cost is estimated at \$8,000 to \$10,000 per patient. Eligibility to receive the drug, which has demonstrated to extend the survival and improve the quality of life of some patients, is limited to AIDS patients who have recovered from PCP and who do not have physical conditions that would contraindicate the drug (Breo, 1987). AZT must be taken every four hours in capsule form so that the patient needs to awaken for the pill in the middle of the night. Among AZT's side effects are that it affects the bone marrow and can cause anemia, or a low red-blood-cell count, often requiring transfusions. Other reported side effects include earache, mild confusion or anxiety, skin rashes and itching, and a lowered white-blood-cell count, which can lead to other infections. Long-range side effects are not known at this time (Breo, 1987).

The greatest hope is for a vaccine to prevent HIV infection. The virus, however, presents numerous challenges because it mutates rapidly. A marketable vaccine for general distribution is not anticipated before 1990 (NIDA, 1985).

It has been estimated that in Illinois (primarily Chicago) 40% of all intravenous drug users are HIV antibody positive. The overwhelming majority are injecting heroin, of which approximately 20% seek treatment through methadone maintenance. Methadone treatment programs are seeing increasing numbers of sick clients, some already diagnosed with ARC and AIDS. The following chapter will offer a basic understanding of the history of methadone treatment, the current use of methadone treatment and issues confronting methadone treatment programs.

CHAPTER III

METHADONE TREATMENT

Origin of Methadone

Methadone hydrochloride is a central nervous system depressant. This long-acting analgesic compound was developed in Germany during World War II as a substitute for morphine which was in short supply (Blum, 1984). In the 1950s, a Joint Commission of the New York State Medical Society and the American Bar Association called for an evaluation of legal narcotics substitution therapy for heroin addicts (Senay, 1985). This action paved the way for the work of Dole and Nyswander at Rockefeller University in New York City in the mid-1960s.

Dole and Nyswander

In 1964, Dole and Nyswander's classic study was conducted. Twenty-two male patients aged 19-37 who had been IV heroin users for several years were admitted to a hospital for approximately six weeks (the exact length of time being dependent on the patient). During this time, Phase One, methadone was orally administered on a daily basis, and the dose was increased to the point at which street doses of heroin would have no effect, that is, a "blockade." The blockade doses for patients ranged from 10-180 mg. with 16 of the 22 doses above 100 mg. During their hospital stay some patients took classes for their high school equivalency. In Phase Two, patients were then discharged to the community and returned every day for methadone where they received their orally administered daily dose of methadone. Patients received help from staff at this point in obtaining jobs, housing and education. Two patients qualified for Phase Three in which the addict was considered to be a self-supporting individual. How this was judged was not stated. Patients duration of stay in the study ranged from one week to 15 months.

Dole and Nyswander (1965) found that 80% of the addicts studied were markedly improved by methadone maintenance therapy with reference to incidence of illegal heroin use. Success rates have not continued to be as high as those reported by Dole and Nyswander. One explanation for this is that the study excluded complicated clinical cases, and these cases had to be treated when the method became standardized and in widespread use (Senay, 1985).

Additionally, most programs today do not administer doses as high as those employed by Dole and Nyswander due to the comparative impurity now of street heroin. A typical average dose today is 20-25 mg. Today, private programs, as opposed to state-funded programs, administer larger doses up to 100 mg. In private programs, clients pay high fees for services received, and traditionally there is a counselor to client ratio of one to 50. In state-funded programs, clients pay nothing or a fee based on income and number of dependents, and the counselor to client ratio is one to 25-35.

Certain aspects of Dole and Nyswander's study may be brought into question. Use of illicit drugs was tested via patients' urinalysis samples. While hospitalized patients' urine was screened every day when presumably there would be less opportunity to obtain illegal drugs, it is unclear how frequently these samples were taken when patients received their methadone on an outpatient basis. Also unclear is whether the obtaining of a urine sample was observed by a staff member. Common among addicts in treatment is the behavior of bringing in urine to the clinic and "switching" a clean sample with one's own sample to avoid the possible repercussions from street drug use. Additionally, although 11 of the 22 subjects were employed at the end of the study upon more detailed reading it is noted that all but two were employed at the start of the study. Upon entering the study, four patients were high school graduates. During the course of the study, of the remaining patients, five became high school certified and ten were attending night school. No follow-up data collected precludes knowing if night school

was completed by these patients.

It was reported by Dole and Nyswander of their study that the most dramatic effect of methadone treatment was the disappearance of narcotic hunger. Critics suggest that perhaps their drug hunger was satiated because of the large doses of methadone administered. The authors further stated that patients had become so indifferent to narcotics as to forget to take a scheduled dose of medication when they were busy at home. Critics suggest that perhaps they "forgot" (if we can rely on the patient's self-report) because they were already toxic or "high" on their methadone dose.

Origin of Methadone Treatment Programs

By the early 1970s, methadone maintenance programs were an accepted mode of treatment for heroin abuse. Regulations were established jointly by the Food and Drug Administration and the National Institute on Drug Abuse. The number of methadone maintenance clinics increased rapidly between 1970 and 1973, and by the late 1970s over 75,000 heroin addicts were being treated with methadone maintenance treatment programs across the United States. In 1982, the 71,000 clients in outpatient methadone programs represented 41% of all clients in drug treatment units (Allison, Hubbard & Rachel, 1985).

Criticism of Methadone Treatment

Despite continuing controversy about philosophy of treatment, duration of treatment, dosage size and approaches to treatment, the general approach to methadone treatment has not changed markedly. Some programs have professionalized their therapeutic services by hiring Master's level counselors as opposed to the generally exclusive ex-addict counseling staff of methadone programs of the past (Allison et al., 1985). However, professionalized counseling staffs have posed some problems concerning medical personnel. Traditionally, methadone treatment has been governed strictly by a medical-model approach. The physician sets the dosage level, the amount

frequently "blind" to the patient, and counselors were merely support staff encouraging clients to obtain vocational training, linking them with various resources and support services. Some more educated therapists interested in other more psychologically therapeutic approaches have at times been seen as a threat to physicians, nurses and paraprofessional staff, all of which causes a split in treatment staff, a ripe environment for clients to manipulate and triangulate.

The greatest criticism leveled at methadone as a therapeutic agent has been its addictive properties as a narcotic substitute. Its use involves a therapeutic regimen in direct conflict with the popular philosophy that "drug-free" is not only the goal but should be the only process (Mason et al., 1986). Since methadone is just as addictive as heroin, clinicians working in drug-treatment programs where few or no drugs are consistently administered often express a lack of acceptance of methadone treatment. Some believe one should achieve a drug-free state by being drug-free in the process.

Also criticized in methadone treatment is its success rate. Few people after detoxifying from methadone achieve a drug-free state (Lowinson, 1981). Success in methadone treatment is defined in small increments of change, e.g., a client is now taking his blood pressure medication which he was not doing before he entered treatment; a client became stable enough on methadone to take her G.E.D. test and now has her high school equivalency; a client steals less and/or prostitutes less to support his or her habit; and more recently, the client has reduced his/her needle sharing behavior since on the program and is less likely to contract or spread HIV.

HIV & IV Drug Users

When an addict does not clean his/her drug injection equipment twice with straight bleach and then water, s/he is at risk of receiving or transmitting HIV. Drug injection equipment is the needle, hypodermic, and "cooker," often a bottle cap used to melt down heroin in prior to injection. Needles are frequently passed around a room of

addicts (often a "shooting gallery") in this ritualistic practice of IV drug use. Depending on whether or not the blood left in the hypodermic contains HIV, there is risk of infection.

AIDS & IV Drug Users

Methadone treatment is afforded to approximately 20% of all IV drug users. There are an estimated 60,000 to 100,000 IV drug addicts in Illinois alone. As of June, 1987, there have been 958 cases of AIDS in Illinois. Of those, 11% of the AIDS cases have been IV drug users, and the numbers are growing. Of 110 cases this year, 17.1% are IV drug users compared with 15.5% of 18 cases in 1982 (Griffin & Kotulak, 1987).

Nationwide, 37,386 AIDS cases have been diagnosed as of 6-22-87, and 21,621 people have died of AIDS. Of the total cases, 66% were homosexual or bisexual men, 17% were heterosexual IV users and 8% were gay men who were also IV drug users (Griffin & Kotulak, 1987).

There is no way of knowing exactly how many of Chicago's addicts have been infected with the virus that have not yet developed the disease. A survey of IV drug users entering drug abuse treatment in 1985 showed that 18% had been infected, and slightly more than 15% of the 178 IV drug users who were voluntarily tested for HIV infection by Chicago's city Health Department over the last year and a half were found to be infected (Griffin & Kotulak, 1987). These figures could be understating the problem because IV drug users are much less likely to volunteer to be tested than people in other risk groups perhaps due to feared criminal repercussion from illegal drug use.

AIDS & The Heterosexual Population

There is a further complication to society with IV drug users who are seropositive for HIV antibodies. Intravenous drug users are the conduit to the heterosexual population as a whole through their sexual partners. The average person when having sexual intercourse is having sex with his/her partner(s)' last ten years of sexual

partners, and their last ten years of sex partners, and so on (NIDA, 1985). (It has been estimated that the virus has been in this country since approximately 1978.) Due to this fact, all non-monogamous sexually active people are recommended to practice safe-sex, or more realistically safer-sex. Safe-sex involves abstinence from sexual activity. Safer-sex involves the use of a spermicidally lubricated (with non-oxynol-9, a spermicide which has been shown to kill HIV) condom used properly prior to intercourse in conjunction with a woman using a spermicidal gel or foam. As condoms can have a high failure rate, evidenced through their use as birth control, using a condom during sexual intercourse is not a guarantee HIV will not be transmitted.

Intravenous drug users can potentially infect those people with whom they are having sexual intercourse, and the people their partners have intercourse with. In addition, female and male addicts frequently support their drug habits through prostitution, another vector to the general population. Much of America is still unaware of the heterosexual connection of AIDS. In Africa, AIDS is primarily a heterosexual disease (NIDA, 1985). Another vulnerable group among the heterosexual population already infected, with the numbers growing over time, are babies born to infected mothers. Most children born infected with HIV are born out of wedlock, and HIV infected children do not generally live past two years (NIDA, 1985).

The following chapter is a case study of a young woman with AIDS who is in methadone treatment. The last segment of this project includes recommendations for methadone treatment staffs with respect to counseling HIV seronegative and seropositive clients, clients with ARC and clients with AIDS.

CHAPTER IV

CASE STUDY

Introduction

The subject of this case is a young woman named Cindy, in methadone treatment in Chicago, Illinois, who has been diagnosed with AIDS. Recommendations in Chapter 5 regarding counseling IV addicts in methadone treatment who have AIDS or ARC and/or are HIV antibody positive will in part result from an analysis of Cindy's treatment.

Cindy is a 28-year old woman, 5'7" tall who weighs 137 lbs. Her admission to the methadone treatment program in May, 1987, was her second treatment attempt at the same program, her third drug treatment attempt overall. Cindy also presented with a history of depression and was treated several years ago as an outpatient in the psychiatric unit of a hospital for two years. Cindy's counselor at "the program," which is how I will refer to her current methadone treatment program from now on, has been unsuccessful in obtaining the records from her psychiatric treatment.

Cindy's drug history, obtained through self-report, spans fourteen years with a five-year history of IV heroin use. Her substance abuse also includes valium, heavy alcohol use, marijuana, LSD, anti-depressant medications and anti-anxiety tranquilizers. She was administered 30 mg. of methadone upon admission to the program and was referred in June, 1987, to a physician for anti-depressant medications due to the extremely depressed state with which she entered treatment. She was prescribed elavil, an anti-depressant, and ativan, a minor tranquilizer. She has been taking these ancillary medications since they were prescribed in June, 1987. It is unclear if Cindy has been abusing them (they both have abuse potential) because the program's toxicology service does not screen for them. Her counselor reports in her

chart that as a result of taking the anti-depressants her "flat mood affect" has shown considerable improvement. She has been closely monitored by her counselor since admission through observation for depression and symptoms of suicidal ideation.

To date, Cindy's drug use in treatment has involved episodic IV heroin and cocaine use, and periodic alcohol use. At one point early in her treatment, Cindy admitted to being an alcoholic. At other times in treatment, she has flatly denied to the counselor any problem she has with alcohol. Heroin and cocaine have appeared on toxicology screens periodically throughout treatment. Alcohol is not tested for through the use of urinalysis. Clients who appear at the clinic for medication in an intoxicated state are often required to blow air into a breathalyzer monitor to determine their use of alcohol. No positive breathalyzer readings have been recorded for Cindy. She has denied any alcohol use in the past four months. Cindy admits to no drug allergies.

Due to Cindy's occasional heroin use (exactly how much she has been using while on the program is unclear), she has obtained several increases in her methadone dose. The rationale behind increasing a client's methadone is that if clients have been using heroin plus methadone they have increased their opiate dependence, or habit, which would render the client in physical withdrawal (excessive sweating, leg cramps, headaches, nausea). Presumably an increase in methadone would prevent symptoms of physical withdrawal provided the client does not continue to use another opiate, e.g., heroin, codeine, dilaudid, street methadone, etc. (Street methadone is methadone which has been diverted from methadone programs through the illegal sale of clients' methadone carry medication by clients or staff. Street methadone is frequently diluted or "cut," as is heroin and cocaine, with other substances enabling the sale of greater quantities.) Cindy's methadone dose has been increased throughout treatment from 30 mg. to 65 mg.

Therapeutic Relationship

Cindy's counselor at the program is John. He is a 37-year old Caucasian who is a recovering alcoholic working two 12-step programs, Alcoholics Anonymous (A.A.) and Al Anon, for those people with family members who are alcoholic. John has a Bachelor's Degree in Social Work with a minor in substance abuse. He has been working in the social services since 1974 in direct service and as an administrator. His employment experience includes working with underprivileged youth in vocational training and job seeking, working with transient populations coordinating referrals and housing, and working in alcohol and drug abuse settings both as a supervisor and clinician. He has been employed at his current treatment program for the past year and a half.

The therapeutic model that John uses with Cindy involves an eclectic approach to treatment. In addition to active listening, he has been confrontive with Cindy about her manipulative and destructive behavior and has employed biofeedback techniques and self-hypnosis as a relaxation technique to facilitate a more open therapeutic relationship. John stated to this writer that he has not delved very deeply into Cindy's past painful relationships with her mother concerning her death, other family members, and Cindy's boyfriend who died of lymphoma (cancer of the lymph nodes) last March under an AIDS diagnosis because he believes she is traumatized enough by her illness and does not want to dismantle her already fragile ego and inadequate support system.

The author has had no therapeutic sessions with Cindy. The following information was acquired from her counselor's written progress notes in Cindy's chart, taped individual counseling sessions and discussions between the writer and the counselor.

Psychosocial History

Cindy has been employed part-time as a secretary for a tool company for the past year. She also receives public assistance funding and although she is employed has managed to avoid being caught. Her boss is aware of her drug problem and supports her attendance in the program; however, he is unaware of her AIDS diagnosis, although he may suspect. Her frequent illnesses and absences from work have strained her relationship with her employers. Overall, her work appears to be an anchor to her mental stability.

Currently Cindy lives with her father, age 65, and two of her five older brothers at her father's home in Chicago. Her father and four of her brothers are alcoholics, although her father stopped drinking ten years ago, Cindy states. Her alcoholic brothers also have a history of polydrug abuse. At home with Cindy and her father is one alcoholic brother and the brother who is not. Cindy's mother died of a heart attack in 1983. In session when the subject is broached, Cindy frequently becomes tearful. This has been primarily a closed subject for Cindy as she is unwilling to discuss it.

Unresolved grief issues appear to be paramount with Cindy. She also becomes tearful when discussing her late boyfriend of five years who died of lymphoma in March, 1987. He was a narcotics dealer and although Cindy has no arrest record it is likely she assisted him. Currently she is involved with a man, also an IV drug user, who probably subsidizes her. He has tested HIV antibody negative at this time.

In her family, John has described Cindy's role as one of the "enabler" and "scapegoat." Cindy's mother appears to have been the classic enabler by indirectly sanctioning her husband's alcoholism through her behavior while acting as martyr. Working long hours, Cindy's father has been the family provider. When her mother became ill, Cindy attempted to take over her role. As caretaker, John believes Cindy rebelled through depression and drug and alcohol abuse. She sees herself as the cause of

her mother's death. It is unclear why she believes she is. Perhaps unable to replace her mother in the role of caretaker, she felt like a failure. John states that acting-out behavior is common among those who are scapegoated in families, and Cindy's depression, drug use, and subsequent illnesses have defocused the alcoholism in her family, including her own.

Cindy's counselor describes her as having very little power in the family. The same situation is present at work, her counselor believes. Her role as a Polish woman suggests she is a breeder and a cooker. She has very little empowerment in the family. John states that Cindy wants control of her life, which is why AIDS is so frightening to her. It is a life situation that guarantees no control whatsoever. Her family has always treated her in the same manner, John states, first as an alcoholic, then as a depressive, next as a drug addict, and now as an AIDS victim. He believes she is reaching out to be empowered through AIDS. Despite only an 11th grade education, Cindy has obtained some power in her family through her knowledge of AIDS, she states. She served for a time on an AIDS advisory board with an organization in the city active in AIDS affairs. Cindy also requested a cut in her methadone dose several months ago upon learning that methadone can suppress the immune system (Cushman, Gupta, & Grieco, 1977).

Cindy appears to be extremely angry with her father, but is unwilling to discuss with her counselor the nature of her anger. Her counselor suspects there may be a history of physical and sexual abuse with her father. Once again, John has stated that he is uncomfortable addressing past traumas due to the delicacy of her health and physical condition as well as her extreme anxiety and inherent depression. He believes it may be too much for her to cope with at this time.

Cindy speaks very little in session about her relationships with her brothers. Her counselor's assessment is that they are all male chauvinists and treat her accordingly. Obviously there is a great deal of alcoholism in her family which John states is high in



families of Polish extraction (Mondykowski, 1982). Her counselor also addresses in chart notes that grief in Polish Catholic homes is dealt with very briefly if not suppressed.

Treatment

Cindy is obviously out of control in several life areas: her drug use and AIDS diagnosis, and is very frightened. With very little internal locus of control, she frequently misses counseling sessions and often does not communicate her absences with the counselor leaving him in a position where he must "track her down" by putting her medication "on hold" until she sees him. Clients in methadone treatment are usually unwilling to miss their daily medication. Because of this, putting a client's methadone on hold has become a standard practice as a way to have clients comply with treatment. The negative side of "dangling the carrot" of methadone is the power it gives the drug, something counselors hope to have their clients move away from to a more internal locus of control.

Cindy's periodic heroin and cocaine use have warranted confrontation from her counselor. The more Cindy uses drugs and alcohol, the more she puts her health at risk. If she is sharing needles, she runs the risk of contracting hepatitis and other infections which do not support her AIDS diagnosis. She also may infect others. If she uses heroin she will put herself into withdrawal due to the fluctuations in use of opiates from the heroin and her methadone. She also runs the risk of overdose. Cindy has overdosed three times on heroin in her life, and 65 mg. is a substantial dose of methadone to be used in conjunction with heroin.

When confronted about her illicit drug use, her counselor reports that Cindy frequently attempts to manipulate him by crying and protesting that she is a "good girl." He states that she uses a defenseless, innocent posture to distract him from the subject of her drug use and its deleterious effects on her health.

The immediate vicinity of methadone treatment programs has often been a source for selling both illegal drugs and illegally obtained methadone. When Cindy's boyfriend waited for her outside the program several months ago while she was receiving her medication in the clinic, she was confronted that she was breaking a clinic rule by allowing this to happen. When her boyfriend did not discontinue his behavior, and she was again confronted, her counselor reports she cried once again using her tears as a defense mechanism. He states that when she did not get her desired response, the tears stopped and her boyfriend no longer continued to wait outside the clinic.

John also contends that Cindy uses her depression as a means to manipulate people who see her as helpless and in need of rescue. John reports that Cindy frequently responds to negative news with depression perhaps as a continued grief response to her mother's death four years ago. Cindy stated in session that she began having depressive episodes soon after she began abusing illicit drugs which occurred soon after her mother died. The death of her mother and boyfriend and concomitant grief issues have not been dealt with extensively in Cindy's treatment for the reasons stated earlier.

Cindy appears to be able to be assertive, sometimes aggressive, over the telephone. Her counselor noted several instances when she was more able to be direct and express her anger when on the telephone as opposed to in person. This is perhaps due to the distance and diminished perceived intimacy telephone communication affords.

John's therapeutic goals and course of treatment currently center around Cindy's continued drug use, and its harmful effect on her health. In October, 1987, she missed several days of methadone and did not communicate her absence to her counselor. He believed she was on a cocaine and/or alcohol "run" for the previous two months. Her support system still continues to be poor. There is little support from her family.

During the summer of 1987, Cindy attended a support group in Chicago for people who are HIV antibody positive with a history of substance abuse. She is no longer attending.

Medical History & Current Condition

Cindy was diagnosed HIV antibody positive when she underwent voluntary testing prior to the death of her boyfriend from lymphoma in March, 1987. Because Cindy has been at high-risk for contracting HIV through intravenous needle sharing and through unprotected sexual intercourse with her former boyfriend diagnosed with AIDS, it is unclear which mode of transmission is responsible for Cindy's HIV antibody positive status.

Prior to and during treatment Cindy has complained of symptoms of nausea, fatigue, infrequent bowel movements, impaired breathing, white patches in her mouth (a yeast-like infection known as "thrush"), dizziness, fever, chills, sweats, diarrhea, dysphagia (painful swallowing), and generalized malaise. Prior to admission to the program, she was hospitalized for candidial esophagitis (thrush of the esophagus), pulmonary dysfunction and dysphagia accompanied by nausea with a short-term history of anorexia, fecal impaction, vomiting, dehydration and lymphadenopathy (swollen lymph nodes). The presence of candidial esophagitis satisfies the Centers for Disease Control criteria for the diagnosis of AIDS (Frumkin & Leonard 1987).

Cindy's past medical history includes hepatitis and a peptic ulcer. She has smoked a pack of cigarettes a day for eight years and has a history of panic attacks which her counselor believes are associated with heavy alcohol use.

Prognosis

Cindy's medical prognosis is not good. Her prognosis for drug abuse treatment is also poor. Cindy states that she no longer shares needles because of her diagnosis and maintains that her boyfriend uses condoms prior to sexual intercourse. Of significance

is the rapidity in the past six months with which Cindy's symptoms and rate of infection appear to be developing. She has been hospitalized four times since admission to the program, three times in the past two months with fecal impaction, vomiting, dehydration, a viral infection and pulmonary dysfunction. Her depression and sleeplessness seem to have been alleviated through her use of anti-depressant medication. It is very difficult to predict the progression of AIDS based on past infections. In fact, infections have been shown to go into remission, with patients enjoying long periods of relatively good health in between. Cindy's condition is complicated by her continued illicit drug and alcohol use, and the apparently self-destructive downward spiral she is on. The counselor has chosen to discontinue discussion of Cindy's health problems with her due to the extreme anxiety and resulting depression they cause.

In the final chapter, the writer will offer recommendations to counselors of methadone programs working with IV drug users who are HIV antibody positive and/or have ARC or AIDS, and offer therapeutic recommendations for Cindy based on the information, albeit limited, that was provided.

CHAPTER V

RECOMMENDATIONS FOR COUNSELORS

Client Education

Whether or not a treatment facility has instituted a special AIDS education program, clients will have heard about the disease and probably know something about modes of virus transmission. The accuracy and extent of their information, however, may be limited. Counselors, therefore, should spend some time during individual sessions with each client discussing key points about AIDS and HIV infection (NIDA, 1987).

When and how the counselor should introduce the topic of AIDS into individual counseling sessions will depend on his/her style, relationship with the client, and treatment progress of each individual client. It is not recommended that the subject of AIDS be introduced in the midst of another crisis that has more immediate priority, for e.g., death of a parent or need of housing. The topic can be broached by referencing a recent educational program in the clinic, a current news article about AIDS, or as part of the counselor's responsibility to do so as part of an ongoing concern about potential health risks (NIDA, 1987).

It is recommended that counselors make certain that each client understands the basic facts about AIDS. Using a brochure or pamphlet as a reference is appropriate, but it is important to ask the client to tell in his/her own words, for example: 1) why AIDS should be of great concern to IV drug users; 2) how HIV is and is not transmitted, and whether s/he really believes this; 3) why prevention (avoidance of HIV infection) is important and what behaviors are risky for exposure; 4) the difference between infection with HIV and a diagnosis of ARC or AIDS; 5) the meaning of "healthy asymptomatic carrier"; 6) what one can do to keep healthy, even if infected; 7) the

major symptoms of ARC and AIDS; and 8) his/her own feelings about AIDS and addiction, including responsibilities for preventing transmission.

Also worthy of exploration is where the client gets his/her information about AIDS and what sources are believed to be credible. Whether the client has any major anxieties about infection risks or symptoms, and whether or not the client has made any lifestyle changes as a result of the AIDS scare is important for the counselor to know. It is necessary to clarify any points of confusion with clients.

There is such a wealth of information regarding AIDS and HIV that clinicians need not respond defensively about their own knowledge gaps. It is recommended to acknowledge one's lack of specific information to the client when the situation arises. It is incumbent upon counselors, however, to keep abreast of current AIDS information. Counselors can inform clients that they will get the answer, or more facts, as soon as possible (NIDA, 1987). For an immediate response, this research can be accomplished by a telephone call to an AIDS hotline or task force. Otherwise, making a note of the question and obtaining an answer by the next counseling session should suffice. Above all, counselors should support any concerns the client has about AIDS as an indication of interest in better health and the motivation to change, and should endorse any positive lifestyle changes the client has already made, or expects to undertake, that will reduce the risk of HIV infection or transmission.

Talking About Sensitive Topics With Clients

Once the counselor believes that the client has adequate information about AIDS, s/he can begin to assess the client's potential risk of infection and/or symptoms of immunosuppression. Before such an assessment can be conducted effectively, however, the counselor must be aware of his/her own values and sensitivities around sexuality and IV drug use (NIDA, 1987). A frequent excuse that drug treatment counselors offer for avoiding the subject of AIDS is not their lack of knowledge about the subject, but their

discomfort and embarrassment in talking about the private acts during which most infection transmission occurs (NIDA, 1987). It is recommended that to be a successful prevention educator with clients, counselors need to understand that 1) it is natural to feel uncomfortable or embarrassed when talking about sexual issues and other sensitive or value-laden topics; and 2) that acknowledging these feelings in oneself can make counselors more aware of clients' potential responses. Perhaps of greater concern, it is important that counselors avoid projecting their personal feelings upon clients when discussing these topics.

Conducting Individual Client Risk Assessments

The purpose of the individual client risk assessment interview is to determine if a client has engaged in, and is continuing to engage in practices that are risky for HIV infection and transmission, or possibly already has symptoms of ARC or AIDS. The focus on drug taking, sexual practices, and early warning symptoms is essential to the development of a more specific AIDS prevention plan (NIDA, 1987). There are three elements of the risk assessment interview: 1) content of questions about risky practices; 2) skills used to elicit responses to sensitive topics; and 3) process for opening, conducting and terminating the interview (NIDA, 1987).

Relative to content areas, the following information should be obtained: 1) likelihood of the clients' exposure to HIV through shared drug injection equipment; 2) exposure through sexual practices; 3) exposure from contaminated blood, blood products, or instruments; 4) exposure through risky practices in locations demonstrating a high number of AIDS cases; and 5) possible early symptoms the client may be manifesting. Many of the early warning signs and symptoms of ARC or AIDS are easily confused with those of withdrawal from heroin and other substances, e.g., excessive sweating, leg cramps, fever, nausea, headaches, and flu-like symptoms. Obviously, addicts who are ill may continue to insist that their illnesses are not AIDS-

related but just the "usual" reactions to drug use that can be masked or "cured" by another "hit." This may be a cover for an actual fear of AIDS (denial) or an ambiguity about the cause of such common symptoms among drug abusers as weight loss, diarrhea, fatigue or swollen lymph nodes.

Counselors and medical staff in programs that have worked with numerous AIDS cases usually are confident that differences between drug-related and HIV-related symptoms are not difficult to distinguish (NIDA, 1987). Poor nutrition associated with continuous heavy use of cocaine or amphetamines often causes rapid weight loss, but the behavior of a "speed freak" on a "run" is quite different from that of an AIDS patient who is "wasting." Clients on amphetamines frequently appear extremely agitated and restless. Similarly, although withdrawal from narcotics usually precipitates diarrhea and fever, these symptoms are not the same as the prolonged intestinal disturbances and drenching night sweats associated with AIDS-related conditions. Some common infections among drug users, however, (e.g., mononucleosis or sexually transmitted diseases), may cause very similar symptoms such as prolonged fatigue and swollen lymph glands. In turn, other AIDS-related symptoms, thrush or dry cough, are not related to drug abuse at all (NIDA, 1987).

It is important that all drug users in whom AIDS/ARC-like symptoms persist be referred to a physician for consultation and examination. Additionally, many IV drug users, especially those who are also immigrants from third-world countries that report a high frequency of tuberculosis, are infected with TB bacillus that will not ordinarily become clinically active tuberculosis unless immune system deficiencies allow the tubercle bacilli to multiply. Therefore, high risk clients who are likely to be seropositive for HIV should have a Mantoux tuberculin skin test and, if positive, given medication to prevent clinically active tuberculosis from developing (NIDA, 1987).

Encouraging a client to discuss risks for HIV infection challenges the counselor's

skills. The National Institute on Drug Abuse (1987) recommends the following: 1) Remain relaxed, non-threatening, non-judgmental and empathic no matter what is being discussed. The client should not be made to feel "guilty" about personal preferences or private behaviors that are not hurtful to others. Repeat the client's terminology for sexual acts or drug-using practices or substitute non-technical and non-medical terms of a similar sort if the counselor finds the client's languaging offensive. 2) Be sensitive to cultural differences. Particularly important here is the notion of "style." As a general rule, black clients seem to prefer a straightforward manner on the part of counselors. Many Hispanics, however, are not as responsive to such candid methods, and Asians are inclined to be considerably less receptive, perhaps even misinterpreting a direct approach as confrontive. Again, to create a comfortable atmosphere where the crucial risk information will be received by the client rather than blocked out, the interview should be culturally appropriate. 3) Reinforce spoken words with parallel non-verbal messages of concern. Speaking distinctively but causally, and using a normal conversational tone is appropriate. Shaking hands at leave-taking, reassuring the client with a touch on the arm or a hug, if comfortable for the counselor, are all non-verbal expressions that can be utilized. Touching and hugging, particularly after a discussion of personal sexual practices, could be perceived by some clients as a seduction attempt, so it is important to be attuned to clients' non-verbal messages. 4) Do not be too abrupt when sensitive subjects are being discussed. It is important to take whatever time is necessary to reestablish rapport and trust before pushing forward again. Let the conversation wander a few moments, if appropriate, to diffuse the material and allow the client to regain emotional control. Stress the importance of the discussion without evoking either guilt in the client or sense of "captivity" in the situation. Let the client know s/he can change the subject or refuse to answer questions at any time, if they seem too invasive. 5) Asking open-ended

questions that do not imply "right" answers or indicate the counselor's reactions are important. Counselors are more likely to get honest answers if they engage clients and keep them talking rather than just responding "yes" or "no." Drawing the client out with open-ended questions which begin with words such as "why, where, when, who, how, and how often," is sometimes a more efficient method of getting information quickly than structured questions with forced responses. 6) Being an active listener and paraphrasing the client's answers while reflecting them back to ensure comprehension is an excellent way of letting the client know s/he is acknowledged. 7) It is extremely important to reassure the client periodically about confidentiality. Whatever is disclosed in an individual counseling session remains completely private to that relationship and the treatment staff within that treatment program only. Counselors can reference federal guidelines and regulations regarding treatment records and also explain their own facility's procedures for recording and releasing client records, and for case conferences and supervision (NIDA, 1987).

Once the counselor has explored with the client any and all possible exposures to HIV, it is prudent to help summarize the potential for infection by asking, for example: "What do you think now about your risk for HIV infection?" If the counselor concludes that the client is at high risk, the reason why should be stated with the counselor focusing on the implications of infection. The assessment interview can be concluded with a brief summary of the client's responses and reactions, acknowledging how difficult the issues are to discuss and complimenting the client on his/her candor displayed.

Pre-Antibody Test Counseling

Testing for HIV antibodies is a very important and individual decision on the part of the client. It is therefore essential that clients be given appropriate information before making the decision. It is necessary to go slowly when discussing HIV antibody

testing and to avoid overly technical language. Using pictures or other visual materials can help keep the client's attention. It is important to watch for signs that the client is understanding what is being said. Asking clients questions along the way will allow the counselor to know if the material is being integrated. At least 24 hours should elapse between the pre-test counseling session and actual testing (NIDA, 1987).

During pre-test counseling, the counselor should review the client's risk of infection and motivation to take the test. Counselors should explain the testing and clarify the meaning of results. This involves telling the client clearly and simply what the test is and how it is administered. Most test sites, however, repeat the pre-test explanation and may want those being tested to complete an anonymous research questionnaire. The client may need to wait up to one month for test results. This should also be explained to the client before undergoing testing. Finally, counselors need to stress what the test can and cannot indicate in the context of the client's basic understanding of AIDS and its related conditions. Counselors should explain the limitations of the test (false positive and false negative results) in simple terms. Clients should also be informed of the procedures used at the test site to retest and confirm all test results. The circumstances under which negative results might occur should be explained ("six-month window of infection") to the client with a recommendation for retesting again in six months.

Counselors should clarify with clients the serious liabilities that could result from releasing test results. There could be discrimination and rejection by friends, family members, casual contacts, as well as employers, landlords, insurance companies, healthcare workers, and social service agencies (NIDA, 1987). Because of potential discrimination, counselors should help the client think about possible reactions to test results and help them decide who should be told. Counselors might also ask the client who s/he plans to tell about the test results and whether s/he would

like anyone else to be present when the results are disclosed.

Risk Reduction/Health Promotion Guidelines

The following guidelines are the necessary precautions all high-risk group members should take to avoid further exposure to HIV, whether or not they are confirmed seropositive. Continued exposure may lead to either infection or the progressive deterioration of the immune system, if it is already infected (NIDA, 1987). These precautions are also designed to stop transmission of the virus to other uninfected persons.

Scientists suggest that HIV multiplies when the immune system is active, fighting off other infections, antigens (any substance that can trigger an immune response because the body recognizes it as foreign), and allergans (agents which produce a histaminic or allergic reaction). If the client is already infected with HIV, new illnesses could trigger rapid progression of the infection from asymptomatic status to ARC or AIDS. If the client is not already infected, exposure to HIV while the immune system is activated may be more likely to result in infection. Many of the infections and diseases to which addicts fall prey because of their lifestyles (hepatitis, mononucleosis, herpes and other sexually transmitted diseases) can and should be avoided (NIDA, 1987).

The recommendation for high-risk women to avoid pregnancy until testing and medical advice is sought should also be emphasized. When negotiating health promotion plans with female clients, special attention should be given to their future expectations for and history of childbearing. Are the clients using birth control measures? Have other pregnancies been planned? Do they expect to have more children? High-risk male clients must also be convinced to warn female sexual partners about avoiding pregnancy (NIDA, 1987).

When planning risk reduction/health promotion plans with clients, counselors should encourage and reinforce any motivation they already have to initiate or continue

appropriate lifestyle changes. A client's attitude toward change is probably the most important factor in success. Unfortunately, it is also the hardest to influence (NIDA, 1987).

Every client should understand how urgent it is to avoid further exposure to HIV, and that it is not too late. It is unknown how much exposure to HIV it takes for HIV to occur. It may take only one large "dose" or repeated contacts with the virus for enough of a "load" to develop so that infection or disease will occur. Exposure while ill or to another new variant (mutant) of the virus that has not been encountered before could be the "last straw" that paves the way for infection or disease (NIDA, 1987). Whether or not high-risk group members confirm or rule out HIV infection by antibody testing, they must still plan lifestyle changes to avoid further exposure to the virus.

Counselors should remind the client that symptoms of HIV infection may take five to seven years or longer to develop. Carriers of infection may look and feel healthy. If the client wants to avoid infection and/or behave responsibly, a whole new and positive lifestyle must be anticipated.

Treatment Planning

The typical circumstances of the IV drug user, perhaps more so than other type of high-risk individual, is a manifestation of the multidimensional nature of the AIDS crisis. His/her physical condition is habitually debilitated by poor nutritional and sanitary practices, use of immune-suppressing drugs, bouts of infection and illness and high stress. His/her psychological functioning, oriented toward defense against intolerable feeling states, is largely evidenced in maladaptive denial, fatalism, escapism, and poor self-imaging (NIDA, 1987). S/he is a socioeconomic outcast, often a criminal outlaw, sometimes unentitled to social services, often unemployed and/or without financial resources. Politically, s/he does not even enjoy the modicum of power wielded by gay rights groups. And socioculturally, s/he is isolated from

immediate and extended family and community, and his/her subculture lacks cohesion, embraces a lifestyle devoid of satisfactions, rejects all forms of authority and supports interpersonal relations limited to a "shooting gallery" repertoire (NIDA, 1987). (A "shooting gallery" is a location where any number of addicts may share their drug injection equipment to get "high" in the ritualized practice of needle sharing). AIDS, a socially stigmatized, only partially understood, painful and degenerative, expensive and deadly epidemic exacerbates the condition of the IV drug user (NIDA, 1987). No client who has received confirmation of infected status is necessarily motivated to make the behavioral changes to protect others or to enhance his/her own life. The crisis situation, however, can be used to promote awareness and change.

Essential to treatment planning is a "needs assessment" conducted on the AIDS, ARC, HIV seropositive, or HIV seronegative client. Underlying the entire spectrum of needs is the need for addiction management. Clients who have received a medical diagnosis of full-blown AIDS, as was Cindy, will probably have been given pertinent information from the doctor about the course of the disease and opportunistic infections. The client's understanding of the information s/he was given should be assessed (NIDA, 1987).

All infected clients must be assessed for their awareness of HIV transmission, especially the lesser known perinatal risk and the negative consequences of denial of vulnerability to HIV transmission. The issues here differ from general educational efforts in degree of urgency as a function of established infection (NIDA, 1987).

Finally, infected clients must be assessed for: 1) their commitment, historically and currently, to drug abuse treatment; 2) current use of immunosuppressing drugs; 3) current nutrition, exercise, rest, and stress-related activities; 4) any accomplishments, activities or interests, no matter how distant or apparently insignificant, that might aid in refocusing time and attention (NIDA, 1987).

Treatment Goals

Treatment goals for clients who have tested seropositive or have been diagnosed with ARC or full-blown AIDS do not differ substantially from educational, prevention, and health promotion goals for all drug-abuse clients. The priorities do shift somewhat as a function of confirmed infection and status of response to infection. It is imperative that infected clients retain hope for a life of some quality and that s/he has the power to enhance that quality by continuing to engage in activities that do not risk transmission or disease progression. Goals must also increase involvement in drug treatment, improvements in diet, reductions in stress, involvement in exercise, and the development of healthy alternatives to abusive habits (NIDA, 1987).

The infected client, whether or not s/he has AIDS, lives with the threat or reality of death from moment to moment. His/her knowledge, attitudes, and behaviors as well as mental functioning will flow with that experience; they will change and be fluid. Thus, education will be an on-going interactive process and tool throughout treatment (NIDA, 1987).

Change Negotiation

Appeals to the client's concern for self may be the most expedient approach to change (NIDA, 1987). Addicts may fear the pain associated with AIDS as opposed to the end result, death. At the same time, appeals to the addict's basic interests must avoid fear tactics which are usually ineffective and sometimes counterproductive.

The effectiveness of education and negotiation will be seriously handicapped to the extent that the infected client's addiction remains unrehabilitated, as is the case with Cindy. One strategy recommended is peer counseling (NIDA, 1987). Other addicts who are successfully dealing with their dependency and their disease can be powerful role models and provide just the needed potential for identification that counselors cannot provide. Unfortunately, no such peer counseling program of infected addicts is

available at the treatment program Cindy attends. The support group she attended in the community during the summer of 1987 did provide such an opportunity. However, Cindy discontinued attendance.

Treatment planning is difficult with infected clients because 1) their reactions to crises may not be predictable; 2) few treatment strategies specific to AIDS distress have been devised or tested, and those that have are derived largely from work with gay male clients; and 3) reactions to situational distress are governed by one's habitual coping mechanisms and psychosocial resources, which in the case of addicts are typically maladaptive or nonexistent (NIDA, 1987).

The Situational Distress Model

Assisting clients infected with HIV requires individualized planning, care for pre-existing disorders, present crisis reactions and the counselor's intervention, and ongoing monitoring and revision of treatment. The Situational Distress Model gives the counselor a useful point of departure when working with infected clients. It suggests three phases of psychosocial adjustment: crises, transition state, and acceptance state. For clients diagnosed with or eventually developing full-blown AIDS, a fourth phase preparation for death, may also occur. The psychosocial responses characterizing each phase may be used to determine "where" the client needs lie and appropriate treatment goals and strategies for those needs.

Upon hearing of a seropositive test result, confirmation of ARC status, or diagnosis of AIDS, the client can be expected to experience shock. Almost immediately, the shock reaction will be followed by denial, alternating with periods of intense anxiety. The denial preserves the client's equilibrium during a crisis. It is a normal defense against overwhelming anxiety (NIDA, 1987). In the absence of denial, the initial anxiety can be so intense as to propel a more extreme defense, such as relapse to IV drug using or (less likely in the case of most addicts in treatment) suicide. Regardless

of how far the addict may have advanced in drug treatment, denial has at some point been an entrenched response pattern and is easily triggered by a crisis (NIDA, 1987).

Many users remain in denial through the entire process of AIDS-situation distress to death. Assessment at this phase must therefore determine the extent to which the client's denial of an AIDS-related diagnosis is or might be maladaptive. Another characteristic of this phase is the disruptive impact on supportive relationships, such as they are for the addict. An AIDS-related diagnosis may force disclosure of previously disguised drug use.

The primary treatment goal of the initial crisis stage is to guide the client through denial. A balance should be drawn between allowing the denial to "run its course" and preventing the client from disregarding medical advice. Other initial crisis intervention goals include assisting the client with disclosure of his/her condition to persons requiring protection from infection, ensuring s/he understands the nature of his/her condition and ensuring that required supportive services are delivered professionally whether they be medical, financial, if receiving public assistance funds, or social security supplemental income, etc. (NIDA, 1987).

My assessment of Cindy is that she vacillates in and out of the initial crisis phase. She seems to be aware of the seriousness of her condition and yet she continues to deny her infection and diagnosis by continuing to use illicit drugs and alcohol. It is unclear as to whether her boyfriend is using drugs with her. Perhaps if the counselor attempted to bring Cindy and her boyfriend in for a number of services, the counselor may be able to elicit support in encouraging Cindy to cease her destructive drug use.

The transition state begins when alternating feelings of anger, guilt, self-pity, and anxiety supersede denial. It is a time of distress, confusion, and disruptiveness. Despite the dangers present, or perhaps because of them, clients are especially accessible to

psychosocial intervention during this time (NIDA, 1987). Characteristics of this state are as follows: Client self-devaluation, in the form of "I'm a junkie; I deserve this," will be present as well as tremendous anger on the part of the client and the presence of fear and depression. Clients with full-blown AIDS may try to bargain their way out of the prognosis promising to "be good" in exchange for a cure, which is a cue as a precursor to depression (NIDA, 1987). Perhaps Cindy's tearful assertions that she is a "good girl" reflect such an attempt to bargain. Loss of control over some bodily functions and loss of control over self-sufficiency are also present in this state. For the addict, the need to maintain a sense of control and autonomy, however false it might be, is tantamount to a compulsion. S/he wards off interpersonal contact, keeps mobile and avoids all forms of authority (NIDA, 1987).

Closely allied with the depression response and sense of loss of control is withdrawal and escape behavior. As feelings of helplessness increase and the need for medical and other assistance also increases, clients may seek ways to avoid acknowledging their condition. If the client is unable to deny or to deal with the threat to autonomy that AIDS represents, s/he is likely to withdraw. S/he may fail to keep medical or counseling appointments and s/he is especially liable to return to the familiar escape of drugged oblivion (NIDA, 1987). In the author's estimation, the characteristic of withdrawal adequately describes Cindy. It is common for AIDS patients undergoing treatment for opportunistic infections to withdraw from even the most minimal social interaction (Jordan, Grallo, Mashberg, Gordon & Kapila, 1987).

Compounding these reactions will also be real or feared social rejection from those who learn about the client's condition, as well as mental deterioration. AIDS-associated dementia is a common side effect, often impairing memory, concentration, and dysfunction in gait and coordination (NIDA, 1987). Researchers have begun to report the emergence of major cognitive deficits, psychotic-like states and psychomotor

retardation in AIDS patients who are not suffering from the secondary infections of the central nervous system known to account for dementia. It has been hypothesized that this symptomatology may be due simply to the presence of HIV in the central nervous system. A current hypothesis is that HIV may attack cells in the brain other than the T-4 lymphocytes, thereby directly effecting changes in neurological functioning independent of those associated with opportunistic infections. The overall prevalence of dementia and other severe cognitive and affective disturbances in AIDS patients has been estimated to be 30-40% (Jordan et al., 1987).

Treatment goals during the transition state should focus on managing the array of difficult client reactions so as to prevent a lapse into deep psychosocial dysfunction while promoting healthy psychosocial change. The dominant strategy for intervention during the transitional state is to allow the client to freely ventilate his/her distress and confusion as the counselor guides him/her toward understanding his/her emotional and physical states (NIDA, 1987).

The counselor's explanations to the client should be geared toward getting the client to increasingly accept responsibility for his/her condition. The notion here is not one of blame, but of acknowledging the facts and sorting through the implications of "post-infection" life. Recommendations include engaging the client in problem-solving activities, and breaking tasks down into their simplest components. This is best accomplished by contact with persons of similar health status who have successfully negotiated the transitional state (NIDA, 1987). Perhaps such a group could be established at the treatment program Cindy attends. Such a group of peers coping in the transitional state may be able to help her deal with her conflicting emotions and help her move toward self-responsibility.

When clients come to accept the limitations that seropositivity, ARC, or AIDS imposes on them and they also realize that they can manage their lives by reacting with

more reason than emotion, they have reached the acceptance stage. They have accepted their condition and have begun to integrate it into their psychosocial life. The acceptance state is not permanent; new crises are liable to trigger renegotiation of transitional states (NIDA, 1987).

The primary needs of clients in the acceptance state are to continue the development of a new, quality life and to weather the inevitable challenges to their gains in psychosocial stability. Those clients with full-blown AIDS and ARC will also require increasing supportive services as their physical capacities to support themselves deteriorate.

Clients in the acceptance state are able to find satisfaction in a number of areas possibly of no prior interest to them, such as spiritual and community pursuits, holistic health practices and social activities. The treatment goal for clients who have reached acceptance is to maintain the state by extending their involvement in satisfying life activities, intervening early in destabilizing crises, and intensifying other support provision. Counselors must relentlessly probe and push to reinforce every personal accomplishment with explicit recognition, encourage the client to discover and engage further in satisfying experiences, move the client through periodic crises, and gain for the client those services s/he proves unable to meet for herself/himself (NIDA, 1987).

The final stage of adjustment reaction is preparation for death. If clients with full-blown AIDS never make it past initial denial or continue to bounce back and forth between transition reactions and denial (as Cindy seems to be doing), they will not be able to prepare for their deaths. This lack of readiness should be respected as a basic human right. Those Persons With AIDS (PWAs) who come to accept the prognosis of death before it happens, though, will present a number of needs that counselors can address, including grieving, completing unfinished business, and choosing a way to die (NIDA, 1987). The goals through this phase are to help clients work through their grief;

assist them in completing unfinished business and planning their death arrangements; and to facilitate the execution of expressed preparation desires (NIDA, 1987).

Recommendations for Administrators and Legislators

AIDS and ARC clients will demand more energy, time and emotion from the counselor. As the number of clients who convert to ARC and AIDS increases over the next five years, so will the demands on counselors. This condition is further exacerbated by the typical caseload size in methadone treatment programs of 30-50 clients. Working with such a caseload makes equal services for clients an impossibility. There is also little financial incentive for qualified and trained counselors to enter the field of drug treatment. Typically, a Bachelor's-level entry-level salary for counselors is \$14,000 with approximately \$16,000-17,000 on the Master's level.

If the needs of AIDS and ARC patients are going to be addressed in treatment, increased funding will be necessary so that programs can offer more services. And in order to reduce the spread of HIV infection, the capacity of publicly-funded methadone treatment programs must be expanded, and programs must aggressively reach out to bring IV drug users into treatment. The demand for treatment services currently exceeds the system's capacity. The demand for treatment exceeded available capacity even before AIDS prevention efforts began. Thus, AIDS has exacerbated an already intolerable situation. Addicts recognize AIDS as a threat and are trying to gain admission to over-crowded, under-staffed programs (IAADA, 1987).

If greater funding is directed to increasing the capacity at methadone treatment programs, fewer people will contract AIDS because fewer addicts will become infected through sharing needles. They, in turn, will infect fewer people through sexual contact (including prostitution), and fewer babies with HIV infection will be born. One of the potential dangers in allowing the pool of IV drug users to grow is that they might form a

reservoir of HIV sufficiently large enough that heterosexual transmission could become endemic in many large cities in the United States and Western Europe (Des Jarlais, Friedman, Casriel & Kott, 1987).

Psychotherapeutic Recommendations For Persons with AIDS

Based on Mages and Mendelsohn's (1979) personological approach (individual interviews as opposed to empirical data gathering) to working with cancer patients, I make the following general recommendations to therapists working with PWAs:

- 1) Help the patient understand the character of his/her illness as fully as possible (as the disease progresses, the need for information will be secondary to the need for emotional support);
- 2) Facilitate realistic planning of the future;
- 3) Allow the patient to talk about how his/her work, family, social, and sexual lives have changed;
- 4) Help the patient deal with his/her persistent vulnerability to illness;
- 5) Allow the patient to ventilate his/her anger;
- 6) Help the patient regulate his/her emotional reactions allowing integration of the experience of illness with the rest of his/her life;
- 7) Help the patient understand and communicate changed attitudes, needs, and limitations as a result of the illness;
- 8) Help the patient remain aware of the realities of his/her health condition so that appropriate medical follow-up is continued, all of which should be taken into consideration in making long-range plans;
- 9) Encourage the patient to exercise choice where possible and to accept one's helplessness and dependence where necessary without excessive regression or turning to a magical solution in lieu of appropriate treatment;
- 10) Help maximize the patient's sense of self-determination, usefulness, and self-esteem;
- 11) Help the patient come to terms with the prospect of death so that the remainder of life can be lived as well as possible;
- 12) Help the patient investigate the individual meaning of his/her illness;
- 13) Address the patient's illness relative to his/her social reality, i.e., family, friends;
- 14) Assist the patient in utilizing the help of others;
- 15) Help younger patients understand and accept their reduced

chances to develop their lives, e.g., the case of a young woman with no children who will probably never have children, and help mid-life patients understand and accept that their lives will be cut short before they can finish their desired tasks.

In addition to what follows, the foregoing should be addressed individually with Cindy in psychotherapy.

Psychological Profile of Cindy

The following points about Cindy stand in high relief: Cindy is an adult child of an alcoholic and is an active alcoholic herself. She is also addicted to heroin and is currently maintained on 65 mg. of methadone. In addition to her periodic alcohol abuse, she is episodically abusing intravenous cocaine. Cindy's father is an alcoholic who reportedly has not been drinking for the past ten years, and four of Cindy's five siblings are alcoholics as well as polydrug abusers. Cindy has reported one attempt of sexual molestation by her father. Her mother died of a heart attack four years ago.

Cindy is of Polish-Catholic extraction. According to Cindy, her maternal grandmother, who lived with the family until her own death two years ago, indirectly blamed Cindy for her daughter's death (Cindy's mother) because Cindy did not fully administer to her mother's needs while she was ill.

Recently, Cindy has engaged in serial relationships with men in which she purports to practice "safer sex." Her long-standing relationship of five years with an intravenous drug user ended last March when he died of lymphoma diagnosed with AIDS. Her relationships with men are seemingly characteristic of adolescent relationships. Cindy dresses like a young girl and frequently takes the posture of a young girl or "baby doll" in her relationships with men who frequently rescue and take care of her.

Cindy has a history of psychiatric depression and is currently taking anti-depressant medications which she may be abusing. Several years ago, she attended a

psychiatric hospital for two years as an outpatient.

Cindy is diagnosed with AIDS and , at the time of this writing, was not hospitalized. She has been in the hospital four times since she entered treatment in May, 1987, three times in the last two months, with infections related to AIDS.

Assessment & Recommended Interventions for Cindy

The writer suggests that the primary therapeutic goal for Cindy should be an integration of her illness with a mature life view in an attempt to achieve peace and self-acceptance. Her counselor is avoiding many subjects in therapy due, in part, to the success with which Cindy is able to intimidate people with her reactivity to certain topics. The topics being avoided include grieving and death relative to Cindy's mother, grandmother, her boyfriend and her own; her father and incest; her feelings, in general, particularly, her anger; and precipitation of her illness through continued drug use.

In an attempt to achieve the goal, exploration in therapy should focus on the following: Central to Cindy's self-destruction/pathology/inability to cope with her illness is her relationship with and death of her mother. Her mother was apparently sick for an extended period of time, although this should be clarified. Illness appears to be a symptom within the family. What function does being sick and dying serve in the family? Illness within the family has manifested itself in alcoholism, drug addiction, depression, heart disease and AIDS. (I suspect that Cindy's father and brothers have also been subjected to illness). Cindy apparently feels remorse and guilt over her mother's death. Is being sick and dying being loyal in her family? By precipitating her own illness through the use of drugs and high-risk behavior, does Cindy precipitate her retribution for a death she helped bring about (her mother's) thereby alleviating her guilt? Is being ill attention-seeking behavior in the family? Did illness elevate her mother's status in the family? Of paramount importance to Cindy's therapy is to learn what the theme of death means in the family. How do people grieve in her family? I do

not recommend that all of these questions be directly asked of Cindy. Many represent topics which should be explored and dynamics the therapist should seek to understand.

Currently missing in her therapy is an opportunity for Cindy to ventilate and express her feelings, particularly anger. Because it is often unclear whether sessions will focus on supplementary social-work matters such as resources for PWAs, or on psychotherapy, she probably withholds her feelings unaware of the type of session she will be entering into. Perhaps certain sessions should be designated for "social-work" tasks and referrals, and other sessions for dealing with "psychotherapy" issues and feelings. Critical to patients who are dying is the opportunity in therapy to express their feelings, have their pain listened to and be truly heard, and to assist them in dealing with their pain. With reference to anger, the incest attempt made by her father and accompanying feelings of rage and guilt must also be addressed.

Cindy reported in her most recent taped session with John that her father frequently did not return home at night when he was drinking. She states that he stopped drinking ten years ago, "But now he's just crazy." The counselor should explore what Cindy means by "crazy." What changes occurred in the family when her father stopped drinking? And what was happening in the family at the time he stopped drinking? Cindy also makes a reference in the session to an illegitimate child Cindy's mother conceived by a Puerto Rican man. Further information should be obtained on this, addressing the effect this incident had on the family.

I believe Cindy's alcohol and drug use began as an attempt to individuate and separate from the family. I also believe it was predicated on a healthy response to grow up and separate from her family. There appears to have been little permission for Cindy to individuate within and from her family. Her pseudo-separations have been attempted primarily through illness and rebellion through drug addiction. References have been made in counseling sessions that when Cindy's mother was ill, Cindy took

over many of her mother's household responsibilities and adopted a "wifely" role. (Presumably, the grandmother took over certain chores also; this and Cindy's relationship with her grandmother should be explored further.) Cindy may have increased her destructive behavior, and continues to do so, because if she were healthy, would she not have to be her father's surrogate wife?

I would also want to explore Cindy's relationships with men/boyfriends and have a clearer profile of the men involved. In the past three months, Cindy has had two relationships with men. She professes to be in love with her current boyfriend of approximately three weeks. Her relationships with men seem to be characterized by a little-girl seductiveness. Instead of her adolescent behavior being applauded in therapy, therapy should attempt to reveal her patterns and their effects. And what is the relationship between her serial paramours and her boyfriend who died last March? What happened to her anger over the death of her boyfriend? Her relationship with him was long-term. Perhaps the serial relationships she has engaged in since his death are a way for her to avoid the pain associated with her loss.

Following an exploration of the foregoing, I would attempt to bring Cindy's family in, particularly her father. In family therapy, I would initially attempt to elicit the family's support in helping Cindy avoid drug-using behavior. The family may be reluctant to participate, however, because such discussions may confront their own alcohol and drug use. Central to family therapy would be to have Cindy's father participate in treatment. I would solicit his help by suggesting that since he is her father, he knows his daughter much better than I, and that I need his help. With close supervision on the case, I would proceed slowly.

The primary goal in therapy with Cindy is integration of her illness with self-acceptance and knowledge. In order that Cindy avoid putting herself at further risk for infection and avoid accelerating her illness, she will have to have greater perspective

on what has been occurring in her family relative to illness and death. To achieve self-understanding, it will be crucial for Cindy to see the relationship between her family-of-origin issues and their role in her destructive behavior patterns. If illness and death serve a function in her family, will the family need to assign the responsibility to someone else after Cindy has gone?

Summary

"AIDS & Methadone Treatment" has attempted to provide the reader with a basic understanding of AIDS as it relates to substance abusers, particularly those in methadone treatment. The author has also given a brief history and explanation of methadone treatment today and has demonstrated the two in tandem by offering a case study of a young woman in methadone treatment who has AIDS. The addict described in the case study, Cindy, is a very chronic case. Despite her diagnosed medical condition, she has not been able to relinquish her use of illicit drugs. Despite a caseload of 50, her counselor's attempts at treatment have been admirable. The situation is further aggravated by the fact that Cindy frequently misses her scheduled counseling sessions. Counselors are dealing with a paradox. On the one hand, infection of HIV heightens the need for clients to eliminate risk behaviors, alter health habits and make the radical lifestyle changes so that they might prevent transmission to others and possibly salvage their own lives. On the other hand, a confirmed viral infection of AIDS diagnosis can act to complicate all of the IV drug use circumstances just mentioned so as to further impede drug abuse management, and AIDS prevention and treatment. The key to this paradox lies in somehow trying to convert the obstacles into incentives for change (NIDA, 1987), the basis for the majority of recommendations made in the final section. Counselors are called upon to discover how to elevate strategies for addiction management and chronic crises intervention. In an already over-worked and under-funded social service system, counselors will also need to

extend their empathy for the addict who may be desperately anxious and dying.

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APPROVAL SHEET

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The final copies have been examined by the director of the thesis and the signature which appears below verifies the fact that any necessary changes have been incorporated and that the thesis is now given final approval by the Committee with reference to content and form.

The thesis is therefore accepted in partial fulfillment of the requirement for the degree of Master of Arts.

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11/17/87

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