ACHIEVEMENT OF DRUG REHABILITATION AT CHIANG MAI DRUG DEPENDENT TREATMENT CENTER

RATTAPOOM CHAIRANGSI

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OF THE REQUIREMENTS FOR THE DEGREE OF
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Thesis
Entitled

ACHIEVEMENT OF DRUG REHABILITATION AT CHIANG MAI DRUG DEPENDENT TREATMENT CENTER

……
Mr. Rattapoom Chairangsi
Candidate

……
Asst.Prof. Asawin Watanavibool,
M.A.(Criminology and Criminal Justice)
Major-advisor

……
Asst.Prof. Nop Kanjanagunti,
M.S.(Criminal Justice Administration)
Co-advisor

……
Lect. Unisa Lerdtomornsakul,
Ph.D. (Criminal Justice)
Co-advisor

…….
Prof. Banchong Mahaisavariya,
M.D.
Dean
Faculty of Graduate Studies

……
Assoc. Prof. Tongtavach Anukarahanonta,
M.D.,Ph.D.
Chair
Master of Art Programme
In Addictionology
Faculty of Graduate Studies

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Thesis
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was submitted to Faculty of Graduate Studies, Mahidol University
for the degree of Master of Art (Addictionology)
on
December 1, 2008

.....
Mr. Rattapoom Chairangsi
Candidate

.....
Pol.Col.Lt. Suwit Madaman,
Ph.D. (Criminology JusticeAdministration and Society)
Chair

.....
Asst. Prof. Asawin Watanavibool,
M.A.(Criminology and Criminal Justice)
Member

.....
Lect. Unisa Lerdtomornsakul,
Ph.D. (Criminal Justice)
Member

.....
Asst. Prof. Nop Kanjanagunti,
M.S.(Criminal Justice Administration)
Member

.....
Prof. Banchong Mahaisavariya, M.D.
Dean
Faculty of Graduate Studies
Mahidol University

.....
Prof. Banchong Mahaisavariya, M.D.
Dean
Faculty of Graduate Studies
Mahidol University

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Finally, had this research yielded and benefits to all in general, the researcher would render them to my parents who were deepest reverence to my life as well as relatives who had morally supported me during conducing research. Any errors had been arisen; the researcher would accept them for improvements.

Rattapoom Chairangsi

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ACHIEVEMENT OF DRUG REHABILITATION AT CHIANGMAI DRUG DEPENDENT TREATMENT CENTER

RATTAPOOM CHAIRANGSI 4937830 GRAD/M

M.A. (ADDICTIONOLOGY)

THESIS ADVISORS: ASAWIN WATTANAWIBUL, MA; NOP ANJANAGUNTI, MSC. AND UNISA LERTTOMORNSAKUL, PHD.

ABSTRACT

This research was to study the models and consequences of drug rehabilitation in the Chiangmai Drug Dependent Treatment Center. A qualitative approach was taken and data collection was done by interviewing the officers of the Chiangmai Drug Dependent Treatment Center. There were 35 samples comprising 7 male officers and 28 female officers with an age range of 27- 54 years. Most samples had finished a bachelor degree in nursing science and had worked as the medical personnel with 8-15 years of working experience.

In general, the interviewers thought that the roots of drug addiction among most patients were family problems, poverty, and stress, failures in nurturing of children, aggression and curiosity about drugs. The problem was most severe among laborers and night workers. It was also prevalent among youth. The samples thought that the problem needed to be dealt with by rehabilitation on one hand and drug suppression by the authorities on the other. Rehabilitation techniques were divided into 2 phases, withdrawing from all toxins, followed by efficient rehabilitation. The Fast Model was used with the outpatients whereas the Therapeutic Community Model was used with the inpatients. However, both models were time consuming with high costs and delays in treatment of the patients. In addition, officers were found to have a high level of knowledge and experience in drug treatment but most ordinary people were unlikely to understand it, which consequently led to growing drug abuse. Smoking and alcohol drinking were, particularly, counted as channels that lead to other types of narcotic drugs. Therefore, the preventive approach was judged to be the best remedy but suppression associated with rehabilitation was, at the same time, imperative.

The researcher recommends that additional knowledge should be provided to officers and personnel in the Chiangmai Drug Dependent Treatment Center, through things such as excursions, exchanges of knowledge, and higher education in addictionology in Thailand and abroad. The Ministry of Public Health should support the Center with funds and experts including establishing networks to take care of patients, which would be able to help the Center to achieve greater efficiency.

KEY WORDS:ACHIEVEMENT /DRUG REHABILITATION/ CHIANGMAI DRUG DEPENDENT TREATMENT CENTER

137 pp.

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ผลสัมฤทธิ์ของการแก้ไขฟื้นฟูผู้ติดยาเสพติดศูนย์บำบัดยาเสพติดภาคเหนือจังหวัดเชียงใหม่
(ACHIEVEMENT OF DRUG REHABILITATION AT CHIANG MAI DRUG DEPENDENT TREATMENT CENTER)

รัฐภูมิ ชัยรังษี 4937830 GRAD/M

ศศ.ม. (วิทยาการเสพติด)

คณะกรรมการควบคุมวิทยานิพนธ์: อัศวิน วัฒนวิบูลย์, M.A., นภ กาญจนกันติ, M.S.,
อุนิษา เลิศโตมรสกุล, Ph.D.,

บทคัดย่อ

การวิจัยนี้มีวัตถุประสงค์เพื่อศึกษาถึงรูปแบบและผลที่ได้จากการบำบัดแก้ไขฟื้นฟูผู้ติดยาเสพติด ณ ศูนย์บำบัดรักษายาเสพติด เชียงใหม่ งานวิจัยชิ้นนี้เป็นงานวิจัยเชิงคุณภาพเก็บรวบรวมข้อมูลด้วยวิธีการสัมภาษณ์ โดยกลุ่มตัวอย่างเป็นเจ้าหน้าที่ ณ ศูนย์บำบัดรักษายาเสพติด เชียงใหม่ โดยมีผลการวิจัยดังต่อนี้

กลุ่มตัวอย่างจำนวน 35 คนประกอบด้วยเพศชาย 7 คน เพศหญิง 28 คน โดยอยู่ในช่วงอายุ 27 – 54 ปี กลุ่มตัวอย่างส่วนใหญ่จบการศึกษาระดับปริญญาตรีสาขาพยาบาลศาสตร์และแพทยศาสตร์มีหน้าที่เป็นบุคคลากรทางการแพทย์ และมีอายุการทำงานระหว่าง 8-15 ปี

สาเหตุของการติดยาเสพติดในผู้ป่วยส่วนใหญ่เกิดจากปัญหาครอบครัว ความยากจน ความกดดัน ความผิดพลาดในการเลี้ยงดูบุตร ความก้าวร้าวและความอยากรู้อยากเห็น กลุ่มที่มีการแพร่กระจายของยาเสพติดส่วนใหญ่เป็นกลุ่มผู้ใช้แรงงาน คนทำงานกลางคืนและมีการแพร่กระจายอย่างรวดเร็วในกลุ่มเด็กและเยาวชน เหตุผลของการแพร่ระบาดของยาเสพติดที่รุนแรงขึ้นก็เนื่องจากขาดการดูแลและปราบปรามอย่างจริงจังจากเจ้าหน้าที่ที่รับผิดชอบ วิธีการที่ใช้ในการบำบัดแบ่งออกเป็น 2 ระยะได้แก่ ระยะการถอนพิษและระยะการฟื้นฟูสมรรถภาพ เจ้าหน้าที่ใช้วิธี Fast Model กับผู้ป่วยนอก และใช้วิธี TC กับกลุ่มผู้ป่วยในแต่วิธีดังกล่าวต้องใช้เวลานานและเสียเวลาพร้อมทั้งมีค่าใช้จ่ายสูงรวมทั้งความไม่พร้อมในการเข้ารับการรักษาของผู้ป่วย นอกจากนี้ยังพบว่าเจ้าหน้าที่ของศูนย์บำบัดยาเสพติด เชียงใหม่มีความรู้ประสบการณ์ที่เกี่ยวกับการบำบัดยาเสพติดในระดับสูง แต่ประชาชนส่วนใหญ่ยังไม่ค่อยเข้าใจมีผลทำให้การแพร่ระบาดยาเสพติดเพิ่มสูงขึ้นโดยเฉพาะบุหรี่และเหล้าที่ถือได้ว่าเป็นช่องทางที่จะนำไปสู่ยาเสพติดประเภทอื่นๆ ดังนั้นวิธีการป้องกันไม่ให้เกิดปัญหาถือได้ว่าเป็นวิธีการแก้ไขที่ดีที่สุดแต่ขณะเดียวกันก็ต้องมีการปราบปรามและการแก้ไขฟื้นฟูควบคู่กันไป

ข้อเสนอแนะของผู้วิจัยคือควรส่งเสริมความรู้เพิ่มเติมให้แก่เจ้าหน้าที่และบุคคลากรของศูนย์บำบัดยาเสพติด เชียงใหม่ เช่น การดูงาน การแลกเปลี่ยนความรู้ การศึกษาต่อในสาขาวิทยาการยาเสพติดทั้งในประเทศและต่างประเทศ และกระทรวงสาธารณสุขควรให้การสนับสนุนในด้านงบประมาณผู้เชี่ยวชาญเพื่อให้การปฏิบัติงานของศูนย์ฯ มีความก้าวหน้ารวมไปถึงการสร้างเครือข่ายเพื่อดูแลผู้ป่วยก็จะสามารถสนับสนุนให้การทำการทำงานของศูนย์บำบัดรักษายาเสพติด เชียงใหม่มีประสิทธิภาพเพิ่มขึ้นได้

137 หน้า

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CHAPTER I
INTRODUCTION

1.1 Background and significance of the research

Drug abuse problem is the most significant of social problems. It has violence increasing and according to economic and social changing which spreading into the community, commerce and school. People who consume drug continually in the several means, they would become enslaved to the drugs physically and psychologically and having withdrawal symptoms when deprived of drug. Even though the Thai public sectors have attempted with all efforts on suppression and prevention, still drug problem has not yet eradicated and has existed in everywhere in the country.

Narcotic has long been a foremost threat to Thailand and its people for more than two decades. Such problem has consequently been placed as the national agenda, requiring a comprehensive approach on suppression, rehabilitation and prevention. Since situation on drug has always changed, a variety of strategies has to be implemented to eradicate and prevent such problem. With respect to the treatment of drug addicts in Thailand, there used to be two systems: voluntary system and treatment program in correctional facilities (imprisonment system). In 2002, another system has been introduced as a result of the enactment of the Narcotic Addict Rehabilitation Act 2002. The Act stipulates that those who are examined as drug abusers are subjected to undergo compulsory treatment in drug rehabilitation centre. Therefore, currently in Thailand, there are three systems of drug treatment and rehabilitation.

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1. **Voluntary System:** This system is practiced in both public and private agencies. In the public sector, Thanyarak Institute is a facility providing treatment program for drug addicts, which is a model for the practice of this type of program in other agencies.

2. **Compulsory System:** The Department of Probations is the main authority to provide compulsory treatment system to drug addicts. The program, consisting of intensive and non-intensive treatment, has been launched as a multilateral cooperation between the Department and other organizations such as the Military camps and health centre of the Ministry of Public Health.

3. **Corrections System:** In order to prevent drug relapse problem, the Department of Corrections has provided rehabilitative treatment to drug addicted prisoners. The Department has firstly applied TC into drug treatment program in prison since 1994, by the coordination with concerned agencies such as ONCB, Thanyarak Institute and other private sectors.

In addition, there are various methods in Rehabilitation for addict's methamphetamine group, especially the Fast-model treatment, for example the community therapy method, Fast-model method, Matrix program, Jirasa method, fresh model or modify matrix etc. There are using many kinds of Thai herbals such as three roots medicine, has the properties makes to vomit and transfer, Thunbergia laurifolia has the properties eradicates the poison etc., For Thai traditional treatment.

From the above, the researcher who is one's identify as officer at Chiang Mai Drug Dependence Treatment Center recognizes in these problems, which drug abuse affecting to be dangerous both physical and psychological of addict, family, social and country. It found that addict' people who have been rehabilitated in the institute when return to their community, still relapse to drug dependence, which affect to be a problem not finished. Therefore, the research would like to study "Achievement of drug rehabilitation at Chiang Mai Drug Dependence Treatment Center", would provide the way to protect and planning for rehabilitation furthermore.

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1.2 Research Objectives

1.2.1 To study model of Chiang Mai Drug Dependent Treatment Center in addict's rehabilitation.

1.2.2 To study achievement of Chiang Mai Drug Dependent Treatment Center in addict's rehabilitation.

1.3 Research Framework

Researcher specifics the target group, to study from officers of Chiang Mai Drug Dependent Treatment Center including doctors, nurses, psychologists, social workers and activity facilitators around 35 persons with in-dept interview.

1.4 Definition of Terms

1.4.1 **Narcotics** means any form of chemicals or substances which, upon being consumed whether by taking orally, inhaling, smoking, injecting or by whatever means, causes physiological or mental effect in a significant manner such as

- Need of taking continuously and seeking these drugs any way
- Need of continual increase of dosage
- To become enslaved to the drugs physically and psychologically and having withdrawal symptoms when deprived of drug.The health in general being deteriorated

1.4.2 **Drug Abuse** means a psychoactive drug or performance enhancing drug for a non-therapeutic or non-medical effect. Some of the most commonly abused drugs include alcohol, amphetamines, barbiturates, benzodiazepines, cocaine, methaqualone, and opium alkaloids.

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1.4.3 **Drug rehabilitation** mean to treat for addict's rehabilitation both of physical and mind, by purpose for the addict's person can live in the social happiness. The treatment by holistic is method to treat addict's person will be successful, for contribute addict's person has the development in every part. Now, there are many kinds, method or various activities which differential upon addict's rehabilitation.

1.4.4 **Addict's people** means who must take this substance continuously, having withdrawal symptoms when deprived of drug

1.4.5 **Consume** means to send drugs into the body by any way for example taking orally, inhaling, smoking, injecting, eating, smelling, keeping, rubbing and tucking

1.4.6 **Withdrawal** means the condition that the addict no takes or stop taking a substance such, make feel like do drugs, more and more continually until have the symptoms torments physical appear, the symptoms withdraws drug often is born very in the distance just 2 – 3 day then, softly decrease respectively.

1.4.7 **The symptoms resists drug action** means the condition that the addict has to take that substance in the quantity for more and more then will do give get the supernatural power follows to want.

1.4.8 **The Matrix Model** is a multi-element package of therapeutic strategies that complement each other and combine to produce an integrated outpatient treatment experience particularly drug addictive patient . It is a set of evidence-based practices delivered in a clinically coordinated manner as a "program." It is the compilation of clinical experience with the model, and the results of a multi-site trial have all provided information on the application of the entire package of techniques.

1.4.9 **Therapeutic Community** is a drug-free environment in which people with addictive (and other) problems live together in an organized and structured way in order to promote change and make possible a drug free life in the outside society. The therapeutic community forms a miniature society in which

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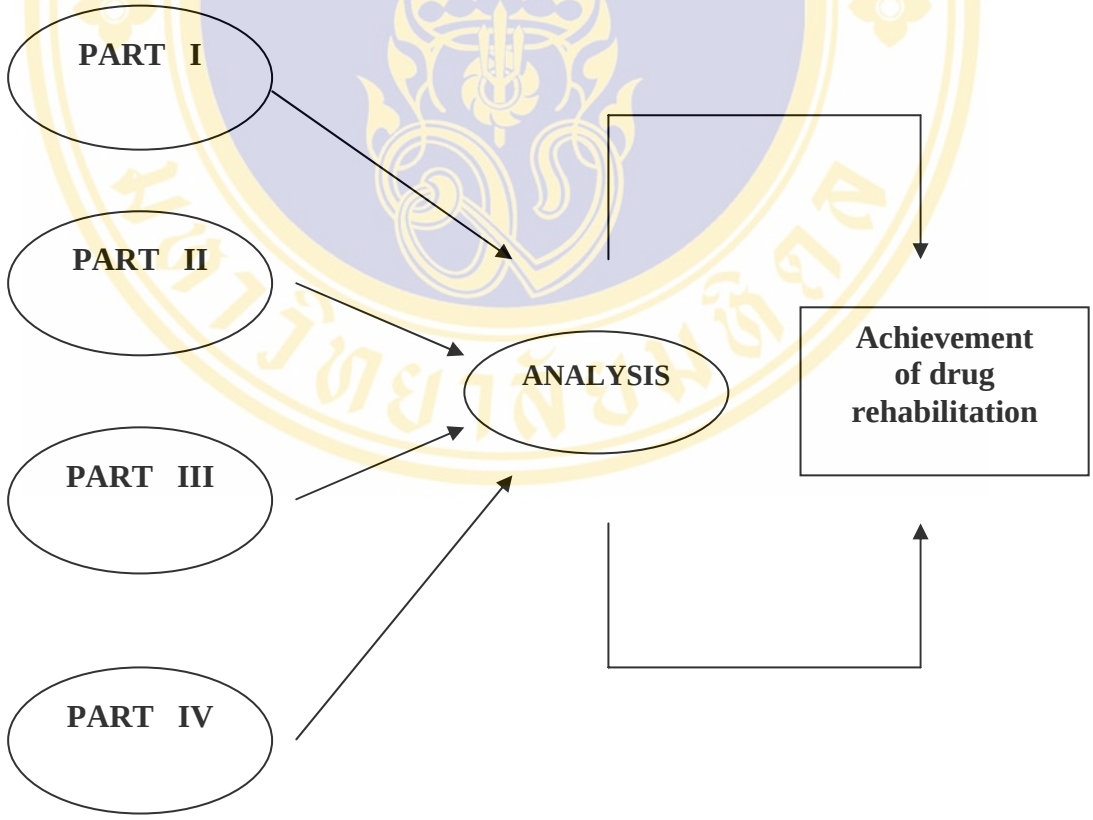
residents, and staff in the role of facilitators, fulfill distinctive roles and adhere to clear rules, all designed to promote the transitional process of the residents.

1.4.10 **Medical Detoxification** is the safe management of the acute physical symptoms of withdrawal associated with stopping drug and/or alcohol use. The healthcare team works with the patient to stabilize their withdrawal symptoms as well as manage any other acute medical problems. While detoxification alone does not treat addiction, for many patients it is the needed first step. Once stabilized, patients are provided with referrals for treatment of their addiction as well as follow up for any other medical problems.

1.5 Conceptual Framework



Part I: Personal Background

Part II: Work Experience in the process of drug rehabilitation

Part III: Comprehension of drug abuse and addicted people

Part IV: achievement of drug rehabilitation and related field works

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1.6 Research Question

How process of drug rehabilitation at Chiang Mai Drug Dependent Treatment Center could be useful for addict's people order to maximize their efficiency?

1.7 Expected Benefits

1.7.1 To know process of Chiang Mai Drug Dependent Treatment Center in addict's rehabilitation.

1.7.2 To guideline the relevant organization to adapting for drug rehabilitee achievement.

1.7.3 To utilize the integrated approach of Chiang Mai Drug Dependent Treatment Center for addict's rehabilitation.

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CHAPTER II
LITERATURE REVIEW

The study of “Achievement of drug rehabilitation at Chiang Mai Drug Dependent Treatment Center”, the researcher present review literature as follow:

2.1 Information of drug abuse/addiction

2.2 Drug rehabilitation

2.3 Drug Addiction Treatment in the United States

2.4 Chiang Mai Drug Dependent Treatment Center

2.5 Theoretical of drug rehabilitation

2.6 Related research

2.1 Information of drug abuse/addiction

2.1.1 Definition

Drug abuse has a wide rang of definitions related to taking a psychoactive drug or performance enhancing drug for a non therapeutic or non-medical effect. Some of the most commonly abused drugs include alcohol, marijuana, amphetamines, barbiturates, benzadiazepines, cocaine, heroin, morphine, and other opiates (codeine, hydrocodone, etc). Use of these drugs may lead to criminal penalty in addition to possible physical, social, and psychological harm, both strongly depending on local jurisdiction. Other definitions of drug abuse fall into four main categories: public health definitions, mass communication and vernacular usage, medical definitions, and political and criminal justice definitions. (wikipedia.org)

Drug abuse is not a new problem, but it is a stubborn one for contemporary society. What may start as medical or so-called recreational use of controlled drugs can tip over into craving and addiction, with dire consequences for the user’s well-

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being and, frequently, consequences for the community as well? Find out how to recognize the signs and symptoms of drug abuse or addiction in someone you care about.

Drug abuse, also known as substance abuse, involves the repeated and excessive use of a drug to produce pleasure or escape reality despite its destructive effects. Although legal substances such as alcohol and nicotine certainly can be and are abused, when we talk about drug abuse, we tend to think of two kinds of situations:

-Use of illegal substances such as marijuana, cocaine, or heroin

-Misuse of legal substances such as prescription drugs or fumes from household products

In such situations, even a small amount of an illegal of improperly consumed substance can alter how your brain works, and if you can't function normally under the influence of the substance, its use constitutes abuse. More dangerously, the short-term effects of the drug – whether they involve euphoria, extra energy, sensory enhancement, or heightened performance – tend to become so alluring that the drug takes over the user's life, disrupting his or her relationships, work, and peace of mind.

2.1.2 Signs and symptoms of drug abuse and addiction

Substance abusers are often the last ones to recognize their own symptoms of abuse, dependence and addiction. Even when they know they have a problem, drug abusers often try to down play their drug use and conceal their symptoms. But if you suspect that a friend or loved one is abusing drugs, there are a numbers of warning signs you can look for.

Behavioral symptoms of drug abuse

-Angry outbursts, mood swings, irritability, manic behavior, or overall attitude change

-Talking incoherently or making inappropriate remarks

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-Risky behavior, such as driving under the influence of drugs, starting a fight, or engaging in unprotected sex

-Secretive or suspicious behavior: frequent trips to the restroom, basement, or other isolated areas for privacy while using drugs

-Deterioration of physical appearance and grooming

-Wearing sunglasses and/or long-sleeved shirts frequently or at inappropriate times

-Frequent absences from work or school; drop-off in quality of work or grades

-Neglect of family responsibilities

-Evidence of money problems: frequent borrowing, selling possessions, or stealing items from employer, home, or school

-Legal problems rooted in drug use: arrest for driving under the influence, possession of a controlled substance, disorderly conduct, or stealing

-Using drugs first thing in the morning

-Using increasing doses of a drug

Social symptoms of drug abuse

-Abandoning of spending less time on activities such as hobbies, sports, and socializing

-Inability to relax of has fun without doing drugs

-Associating with known drug users and dropping friends who don't use drugs

-Talking about drugs all the time and encouraging others to use

-Estrangement from old friends and loved ones

Physiological signs of drug abuse

-Frequent exhaustion of weakness

-Unexplained injuries and infections

-Blackouts

-Flashbacks

-Delusions

-Paranoia

-Withdrawal symptoms such as nausea, tremors, and sweating

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Different illegal and misused substances produce different physiological symptoms; several articles listed in the Related Links below can provide information about substance-specific signs of drug abuse.

2.1.3 Classification of abused drugs

Almost all drugs, including common household items such as caffeine and aspirin, have the potential for abuse and addiction. However, the majority of drug problems not related to alcohol involve use of the substances listed below. These drugs affect users' brains and bodies in different ways, producing symptoms of intoxication and abuse that are unique to each substance.

Table 2-1 : Categories of Commonly Abused Drug

Categories of Commonly Abused Drug	
Central nervous system stimulants	
- Cocaine	- Methamphetamines
- Amphetamines	- Ritalin, Adderall, and other ADHD drugs
Central nervous system depressants	
- heroin, Opium	- Prescription painkillers (categorized as narcotics of poioids): codeine, Vicodin, Oxycontin, Percoset, Percodan, Davon
- Barbiturates such as Seconal and Nembutal	
- Tranquilizers such as Valium and Xanax	- Painkillers used in hospitals: morphine, Fentanyl, Dilaudid, Demerol
- Quaaludes	
- "Data-rape" drugs: GHB, Rohypnol	
Hallucinogens and psychedelics	
- Marijuana	- Psilocybin
- Hashish	- Peyote
- LSD	- MDMA (Ecstasy)
- PCP	- Ketamine

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Table 2-1 : Categories of Commonly Abused Drug (Cont.)

Inhalants	
- Solvents	- Nitrous oxide
- Aerosols	- Nitrites (poppers)
- Gases	
Drugs for increasing muscle mass	
- Anabolic steroids	- Human growth hormone

It would not be accurate to say that the dangers of abuse posed by all the substances listed above are so great that none of them should ever be used. Pain medication, for example, is a necessity after surgery and many other medical procedures. Marijuana has been shown to have medicinal applications. By and large, when a qualified health professional prescribes a medication and the patient for whom it is prescribed uses it as directed, that use does not become abuse. Abuse enters the picture when someone takes too much of a medication or takes it too long or too frequently or takes it when it is not prescribed. And a majority of substances listed above are dangerous enough so that any use can be seen as abuse.

The National Institute on Drug Abuse (NIDA) offers a chart of commonly abused drugs, listing most of the substances noted above, with brand names, street names, how they affect users when they’re taken, and long-term health consequences.

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Table 2-2 : Commonly abused drugs

Substances: Category and Name	Examples of Commercial and Street Names	DEA Schedule*/ How Administered**	Intoxication Effects/Potential Health Consequences
Cannabinoids			euphoria, slowed thinking and reaction time, confusion, impaired balance and coordination/cough, frequent respiratory infections; impaired memory and learning; increased heart rate, anxiety; panic attacks; tolerance, addiction
hashish	boom, chronic, gangster, hash, hash oil, hemp	I/swallowed, smoked	
marijuana	blunt, dope, ganja, grass, herb, joints, Mary Jane, pot, reefer, sinsemilla, skunk, weed	I/swallowed, smoked	
Depressants			reduced anxiety; feeling of well-being; lowered inhibitions; slowed pulse and breathing; lowered blood pressure; poor concentration/fatigue; confusion; impaired coordination, memory, judgment; addiction; respiratory depression and arrest; death Also, for barbiturates—sedation, drowsiness/depression, unusual excitement, fever, irritability, poor judgment, slurred speech, dizziness, life-threatening withdrawal for benzodiazepines—sedation, drowsiness/dizziness for flunitrazepam—visual and gastrointestinal disturbances, urinary retention, memory loss for the time under the drug's effects for GHB—drowsiness, nausea/vomiting, headache, loss of consciousness, loss of reflexes, seizures, coma, death for methaqualone—euphoria/depression, poor reflexes, slurred speech, coma
barbiturates	Amytal, Nembutal, Seconal, Phenobarbital: barbs, reds, red birds, phennies, tooies, yellows, yellow jackets	II, III, V/injected, swallowed	
benzodiazepines (other than flunitrazepam)	Ativan, Halcion, Librium, Valium, Xanax: candy, downers, sleeping pills, tranks	IV/swallowed, injected	
flunitrazepam***	Rohypnol: forget-me pill, Mexican Valium, R2, Roche, roofies, roofinol, rope, rophies	IV/swallowed, snorted	
GHB***	gamma-hydroxybutyrate: G, Georgia home boy, grievous bodily harm, liquid ecstasy	I/swallowed	
methaqualone	Quaalude, Sopor, Parest: ludes, mandrex, quad, quay	I/injected, swallowed	
Dissociative Anesthetics			increased heart rate and blood pressure, impaired motor function/memory loss; numbness; nausea/vomiting Also, for ketamine—at high doses, delirium, depression, respiratory depression and arrest for PCP and analogs—possible decrease in blood pressure and heart rate, panic, aggression,
ketamine	Ketalar SV: cat Valiums, K, Special K, vitamin K	III/injected, snorted, smoked	
PCP and analogs	phencyclidine; angel dust, boat, hog, love boat, peace pill	I, II/injected, swallowed, smoked	

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Substances: Category and Name	Examples of Commercial and Street Names	DEA Schedule*/ How Administered**	Intoxication Effects/Potential Health Consequences
			violence/loss of appetite, depression
Hallucinogens			altered states of perception and feeling; nausea; persisting perception disorder (flashbacks) Also, Also for LSD and mescaline—increased body temperature, heart rate, blood pressure; loss of appetite, sleeplessness, numbness, weakness, tremors for for LSD—persistent mental disorders for for psilocybin—nervousness, paranoia
LSD	lysergic acid diethylamide: acid, blotter, boomers, cubes, microdot, yellow sunshines	I/swallowed, absorbed through mouth tissues	
mescaline	buttons, cactus, mesc, peyote	I/swallowed, smoked	
psilocybin	magic mushroom, purple passion, shrooms	I/swallowed	
Opioids and Morphine Derivatives			pain relief, euphoria, drowsiness/nausea, constipation, confusion, sedation, respiratory depression and arrest, tolerance, addiction, unconsciousness, coma, death Also, for codeine—less analgesia, sedation, and respiratory depression than morphine for heroin—staggering gait
codeine	Empirin with Codeine, Fiorinal with Codeine, Robitussin A-C, Tylenol with Codeine: Captain Cody, schoolboy; (with glutethimide) doors & fours, loads, pancakes and syrup	II, III, IV, V/injected, swallowed	
fentanyl and fentanyl analogs	Actiq, Duragesic, Sublimaze: Apache, China girl, China white, dance fever, friend, goodfella, jackpot, murder 8, TNT, Tango and Cash	I, II/injected, smoked, snorted	
heroin	diacetyl-morphine: brown sugar, dope, H, horse, junk, skag, skunk, smack, white horse	I/injected, smoked, snorted	
morphine	Roxanol, Duramorph: M, Miss Emma, monkey, white stuff	II, III/injected, swallowed, smoked	
opium	laudanum, paregoric: big O, black stuff, block, gum, hop	II, III, V/swallowed, smoked	
oxycodone HCL	Oxycontin: Oxy, O.C., killer	II/swallowed, snorted, injected	
hydrocodone bitartrate, acetaminophen	Vicodin: vike, Watson-387	II/swallowed	

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Substances: Category and Name	Examples of Commercial and Street Names	DEA Schedule*/ How Administered**	Intoxication Effects/Potential Health Consequences
Stimulants			increased heart rate, blood pressure, metabolism; feelings of exhilaration, energy, increased mental alertness/rapid or irregular heart beat; reduced appetite, weight loss, heart failure, nervousness, insomnia Also, for amphetamine—rapid breathing/tremor, loss of coordination; irritability, anxiousness, restlessness, delirium, panic, paranoia, impulsive behavior, aggressiveness, tolerance, addiction, psychosis for cocaine—increased temperature/chest pain, respiratory failure, nausea, abdominal pain, strokes, seizures, headaches, malnutrition, panic attacks for MDMA—mild hallucinogenic effects, increased tactile sensitivity, empathic feelings/impaired memory and learning, hyperthermia, cardiac toxicity, renal failure, liver toxicity for methamphetamine—aggression, violence, psychotic behavior/memory loss, cardiac and neurological damage; impaired memory and learning, tolerance, addiction for nicotine—additional effects attributable to tobacco exposure; adverse pregnancy outcomes; chronic lung disease, cardiovascular disease, stroke, cancer, tolerance, addiction
amphetamine	Biphetamine, Dexedrine: bennies, black beauties, crosses, hearts, LA turnaround, speed, truck drivers, uppers	II/injected, swallowed, smoked, snorted	
cocaine	Cocaine hydrochloride: blow, bump, C, candy, Charlie, coke, crack, flake, rock, snow, toot	II/injected, smoked, snorted	
MDMA (methylenedioxy-methamphetamine)	Adam, clarity, ecstasy, Eve, lover's speed, peace, STP, X, XTC	I/swallowed	
methamphetamine	Desoxyn: chalk, crank, crystal, fire, glass, go fast, ice, meth, speed	II/injected, swallowed, smoked, snorted	
methylphenidate (safe and effective for treatment of ADHD)	Ritalin: JIF, MPH, R-ball, Skippy, the smart drug, vitamin R	II/injected, swallowed, snorted	
nicotine	cigarettes, cigars, smokeless tobacco, snuff, spit tobacco, bidis, chew	not scheduled/smoked, snorted, taken in snuff and spit tobacco	
Other Compounds			
anabolic steroids	Anadrol, Oxandrin, Durabolin, Depo-Testosterone, Equipoise: roids, juice	III/injected, swallowed, applied to skin	no intoxication effects/hypertension, blood clotting and cholesterol changes, liver cysts and cancer, kidney cancer, hostility and aggression, acne; in adolescents, premature stoppage of growth; in males, prostate cancer, reduced sperm production, shrunken testicles, breast enlargement; in females, menstrual irregularities, development of beard and other

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Substances: Category and Name	Examples of Commercial and Street Names	DEA Schedule*/ How Administered**	Intoxication Effects/Potential Health Consequences
			masculine characteristics
Dextromethorphan (DXM)	Found in some cough and cold medications; Robotripping, Robo, Triple C	not scheduled/swallowed	Dissociative effects, distorted visual perceptions to complete dissociative effects/for effects at higher doses see 'dissociative anesthetics'
inhalants	Solvents (paint thinners, gasoline, glues), gases (butane, propane, aerosol propellants, nitrous oxide), nitrites (isoamyl, isobutyl, cyclohexyl): laughing gas, poppers, snappers, whippets	not scheduled/inhaled through nose or mouth	stimulation, loss of inhibition; headache; nausea or vomiting; slurred speech, loss of motor coordination; wheezing/unconsciousness, cramps, weight loss, muscle weakness, depression, memory impairment, damage to cardiovascular and nervous systems, sudden death

* Schedule I and II drugs have a high potential for abuse. They require greater storage security and have a quota on manufacturing, among other restrictions. Schedule I drugs are available for research only and have no approved medical use; Schedule II drugs are available only by prescription (unrefillable) and require a form for ordering. Schedule III and IV drugs are available by prescription, may have five refills in 6 months, and may be ordered orally. Some Schedule V drugs are available over the counter.

** Taking drugs by injection can increase the risk of infection through needle contamination with staphylococci, HIV, hepatitis, and other organisms.

*** Associated with sexual assaults

2.1.4 Effects of drug abuse and addiction

The mind-altering effects of most drugs add a degree of risk, in some cases a very high degree, to even ordinary activities. These effects include

- poor balance and coordination - confusion and impaired reaction time - from psychedelics and inhalants, delusions or paranoia	- sleepiness - lowered inhibitions and poor judgment - from stimulants, anxiety or aggression

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Just as important, the temporary escape, relaxation, and pleasure that illicit and improperly used drugs give their users are outweighed by the destructive effects of long-term use, effects that damage users physically, mentally, and socially.

Common neurological effects of drug abuse

- Impaired memory and learning ability - Poor concentration, confusion - Panic attacks - Flashbacks	- Impaired motor function - Seizures - Depression

Common physical effects of drug abuse

- Changes in heart rate and blood pressure: slowed from depressants, elevated from other drugs - Nausea and vomiting - Loss of appetite, abnormal weight loss - Increased body temperature	- Danger to heart, liver, kidneys - Chest pain, stomach cramps - Hormonal changes

And these effects don't cover the dangers from accidental overdose or contamination, which can occur even when drugs are taken in small amounts: catastrophic brain damage, coma, death. (This is a particular danger with inhalants and injected drugs, or when drugs are mixed with alcohol.) Also, users who inject drugs intravenously are at a higher risk of contracting viruses such as HIV and hepatitis, and often suffer from abscesses, collapsed veins, and bacterial infections.

Drug abuse also destroys relationships and careers, as users' concerns shrink to obtaining and using their drugs of choice. A drug habit is usually expensive, and drug abusers may turn to criminal means of income if their salaries don't cover expenses. When poor performance at work or discovery of the drug habit leads to termination, the temptation to steal is heightened. Child neglect and abuse are

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endemic among drug abusers. Friends, relatives, and partners get fed up with being borrowed from, stolen from, lied to, and, often, subjected to violence or danger, and they leave.

2.2 Drug Rehabilitation

2.2.1 Definition

Drug rehabilitation is an umbrella term for the processes of medical and/or psychotherapeutic treatment, for dependency on psychoactive substances such as alcohol, prescription drugs, and so-called street drugs such as cocaine, heroin or amphetamines. The general intent is to enable the patient to cease substance abuse, in order to avoid the psychological, legal, financial social and physical consequences that can be caused, especially by extreme abuse. (Wikipedia.org)

Drug rehabilitation tends to address a stated twofold nature of drug dependency: physical and psychological dependency. Physical dependency involves a detoxification process to cope with withdrawal symptoms from regular use of a drug. With regular use of many drugs, legal or otherwise, the brain gradually adapts to the presence of the drug so that the desired effect is minimal. Apparently normal functioning of the user may be observed, despite being under the influence of the drug. This is how physical tolerance develops to drugs such as heroin, amphetamines, cocaine, nicotine or alcohol. It also explains why more of the drug is needed to get the same effect with regular use. The abrupt cessation of taking a drug can lead to withdrawal symptoms where the body may take weeks or months (depending on the drug involved) to return to normal.

2.2.2 Drug addiction treatment

There are many addictive drugs, and treatments for specific drugs can differ. Treatment also varies depending on the characteristics of the patient. Problems associated with an individual's drug addiction can vary significantly. People who are addicted to drugs come from all walks of life. Many suffer from

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mental health, occupational, health, or social problems that make their addictive disorders much more difficult to treat. Even if there are few associated problems, the severity of addiction itself ranges widely among people. A variety of scientifically based approaches to drug addiction treatment exists. Drug addiction treatment can include behavioral therapy (such as counseling, cognitive therapy, or psychotherapy), medications, or their combination. Behavioral therapies offer people strategies for coping with their drug cravings, teach them ways to avoid drugs and prevent relapse, and help them deal with relapse if it occurs. When a person's drug-related behavior places him or her at higher risk of disease transmission. Case management and referral to other medical, psychological, and social services are crucial components of treatment for many patients. The best programs provide a combination of therapies and other services to meet the needs of the individual patient, which are shaped by such issues as age, race, culture, sexual orientation, gender, pregnancy, parenting, housing and employment, as well as physical and sexual abuse. (See Figure 2-1)

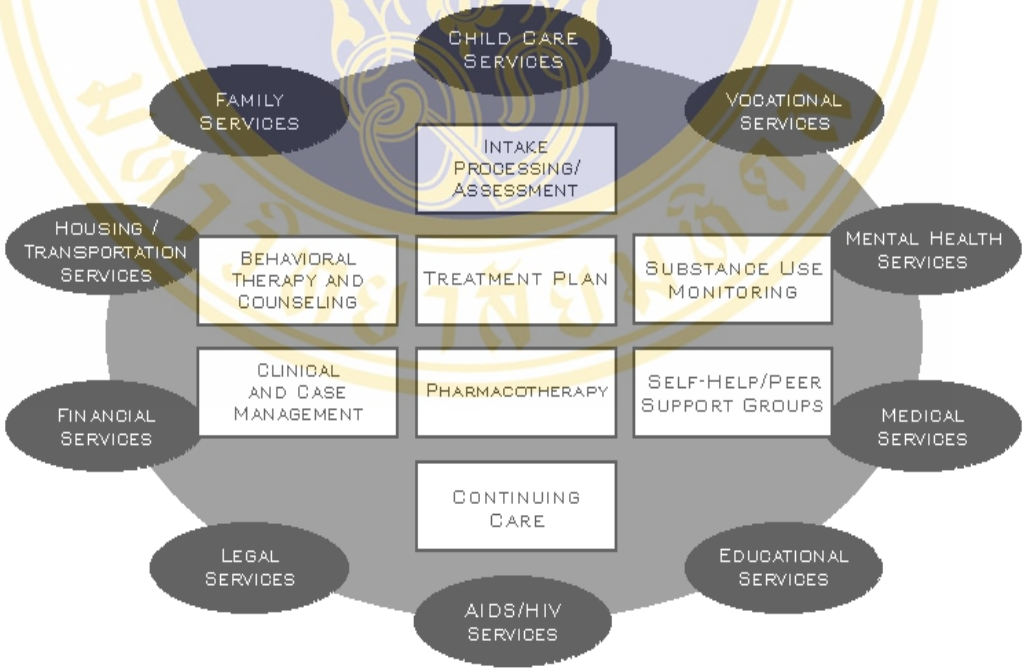

Figure 2-1 : Components of Comprehensive Drug Abuse Treatment

Treatment medications, such as methadone, LAAM, and naltrexone, are available for individuals addicted to opiates. Nicotine preparations (patches, gum, nasal spray) and bupropion are available for individuals addicted to nicotine.

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Medications, such as antidepressants, mood stabilizers, or neuroleptics, may be critical for treatment success when patients have co-occurring mental disorders, such as depression, anxiety disorder, bipolar disorder, or psychosis. Treatment can occur in a variety of settings, in many different forms, and for different lengths of time. Because drug addiction is typically a chronic disorder characterized by occasional relapses, a short-term, one-time treatment often is not sufficient. For many, treatment is a long-term process that involves multiple interventions and attempts at abstinence.

2.2.3 Scientifically based approaches to drug addiction treatment

There are several of treatment approaches and components that have been developed and tested for efficacy through research supported by the National Institute on Drug Abuse (NIDA). Each approach is designed to address certain aspects of drug addiction and its consequences for the individual, family, and society. The approaches are to be used to supplement or enhance not replaced existing treatment programs.

2.2.3.1 **Relapse Prevention**, a cognitive-behavioral therapy, was developed for the treatment of problem drinking and adapted later for cocaine addicts. Cognitive behavioral strategies are based on the theory that learning processes play a critical role in the development of maladaptive behavioral patterns. Individuals learn to identify and correct problematic behaviors. Relapse prevention encompasses several cognitive-behavioral strategies that facilitate abstinence as well as provide help for people who experience relapse. The relapse prevention approach to the treatment of cocaine addiction consists of a collection of strategies intended to enhance self-control. Specific techniques include exploring the positive and negative consequences of continued use, self-monitoring to recognize drug cravings early on and to identify high-risk situations for use, and developing strategies for coping with and avoiding high-risk situations and the desire to use. A central element of this treatment is anticipating the problems patients are likely to meet and helping them develop effective coping strategies.

2.2.3.2 **The Matrix Model** provides a framework for engaging stimulant abusers in treatment and helping them achieve abstinence. Patients learn about issues critical to addiction and relapse, receive direction and support from a

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trained therapist, become familiar with self-help programs, and are monitored for drug use by urine testing. The program includes education for family members affected by the addiction. The therapist functions simultaneously as teacher and coach, fostering a positive, encouraging relationship to reinforce positive behavior change. The interaction between the therapist and the patient is realistic and direct but not confrontational or parental. Therapists are trained to conduct treatment sessions in a way that promotes the patient's self-esteem, dignity, and self-worth. A positive relationship between patient and therapist is a critical element for patient retention. Treatment materials draw heavily on other tested treatment approaches. Thus, this approach includes elements pertaining to the areas of relapse prevention, family and group therapies, drug education, and self-help participation. Detailed treatment manuals contain work sheets for individual sessions; other components include family educational groups, early recovery skills groups, relapse prevention groups, conjoint sessions, urine tests, 12-step programs, relapse analysis, and social support groups. A number of projects have demonstrated that participants treated with the Matrix model demonstrate statistically significant reductions in drug and alcohol use, improvements in psychological indicators, and reduced risky sexual behaviors associated with HIV transmission. These reports, along with evidence suggesting comparable treatment response for methamphetamine users and cocaine users and demonstrated efficacy support for the use of the model.

2.2.3.3 **Supportive – Expressive Psychotherapy** is a time-limited, focused psychotherapy that has been adapted for heroin-and cocaine-addicted individuals. The therapy has two main components:

- Supportive techniques to help patients feel comfortable in discussing their persona experiences.

- Expressive techniques to help patients identify and work through interpersonal relationship issues.

Special attention is paid to the role of drugs in relation to problem feelings and behaviors, and how problems may be solved without recourse to drugs. The efficacy of individual supportive-expressive psychotherapy has been tested with patients in methadone maintenance treatment who had psychiatric problems. In a comparison with patients receiving only drug counseling, both groups fared similarly

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with regard to opiate use, but the supportive-expressive psychotherapy group had lower cocaine use and required less methadone. Also, the patients who received supportive-expressive psychotherapy main-tainted many of the gains they had made. In an earlier study, supportive-expressive psychotherapy, when added to drug counseling, improved outcomes for opiate addicts in methadone treatment with moderately severe psychiatric problems.

2.2.3.4 **Individualized Drug Counseling** focuses directly on reducing or stopping the addict's illicit drug use. It also addresses related areas of impaired functioning such as employment status, illegal activity, family/social relations as well as the content and structure of the patient's recovery program. Through its emphasis on short-term behavioral goals, individualized drug use and then maintaining abstinence. The addiction counselor encourages 12 step participation and makes referrals for needed supplemental medical, psychiatric, employment, and other services. Individuals are encouraged to attend sessions one or two times per week. In a study that compared opiate addicts receiving only methadone to those receiving methadone coupled with counseling, individuals who received only methadone showed minimal improvement in reducing opiate use. The addiction of counseling produced significantly more improvement. The addition of onsite medical/psychiatric, employment, and family services further improved outcomes. In another study with cocaine addicts, individualized drug counseling, together with group drug counseling, was quite effective in reducing cocaine use. Thus, it appears that this approach has great utility with both heroin and cocaine addicts in outpatient treatment.

2.2.3.5 **Motivational Enhancement Therapy** is a client-centered counseling approach for initiating behavior change by helping clients to resolve ambivalence about engaging in treatment and stopping drug use. This approach employs strategies to evoke rapid and internally motivated change in the client, rather than guiding the client stepwise through the recovery process. This therapy consists of an initial assessment battery session, followed by two to four individual treatment sessions with a therapist. The first treatment session focuses on providing feedback generated from the initial assessment battery to stimulate discussion regarding personal substance use and to elicit self-motivational statements. Motivational

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interviewing principles are used to strengthen motivation and build a plan for change. Coping strategies for high-risk situations are suggested and discussed with the client. In subsequent sessions, the therapist monitors change, reviews cessation strategies being used, and continues to encourage commitment to change or sustained abstinence. Clients are sometimes encouraged to bring a significant other to sessions. This approach has been used successfully with alcoholics and with marijuana-dependent individuals.

2.2.3.6 **Behavioral Therapy for Adolescents** incorporates the principle that unwanted behavior can be changed by clear demonstration of the desired behavior and consistent reward of incremental steps toward achieving it. Therapeutic activities include fulfilling specific assignments, rehearsing desired behaviors, and recording and reviewing progress, with praise and privileges given for meeting assigned goals. Urine samples are collected regularly to monitor drug use. The therapy aims to equip the patient to gain three types of control:

- Stimulus Control helps patients avoid situations associated with drug use and learn to spend more time in activities incompatible with drug use.

- Urge Control helps patients recognize and change thoughts, feelings, and plans that lead to drug use.

- Social Control involves family members and other people important in helping patients avoid drugs. A parent or significant other attends treatment sessions when possible and assist with therapy assignments and reinforcing desired behavior. According to research studies, this therapy helps adolescents become drug free and increases their ability to remain drug free after treatment ends. Adolescents also show improvement in several other areas employment/school attendance, family relationships, depression, institutionalization, and alcohol use. Such favorable results are attributed largely to including family members in therapy and rewarding drug abstinence as verified by urinalysis.

2.2.3.7 **Multidimensional Family Therapy (MDFT**) for Adolescents is an outpatient family-based drug abuse treatment for teenagers. MDFT vies adolescent drug use in terms of a network of influences (that is, individual, family, peer, community) and suggests that reducing unwanted behavior and increasing desirable behavior occur in multiple ways in different settings. Treatment includes

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individual and family sessions held in the clinic, in the home, or with family members at the family court, school, or other community locations. During individual sessions, the therapist and adolescent work on important developmental tasks, such as developing decision-making, negotiation, and problem-solving skills. Teenagers acquire skills in communication their thoughts and feelings to deal better with life stressors, and vocational skills. Parallel sessions are held with family members. Parents examine their particular parenting style, learning to distinguish influence from control and to have a positive and developmentally appropriate influence on their child.

2.2.3.8 **Multisystemic Therapy (MST)** addresses the factors associated with serious antisocial behavior in children and adolescents who abuse drugs. These factors include characteristics of the adolescent (for example, favorable attitudes toward drug use), the family (poor discipline, family conflict, parental drug abuse), peers (positive attitudes toward drug use), school (dropout, poor performance), and neighborhood (criminal subculture). By participating in intense treatment in natural environments (homes, schools, and neighborhood settings) most youths and families complete a full course of treatment. MST significantly reduces adolescent drug use during treatment and for at least 6 months after treatment. Reduced numbers of incarcerations and out-of-home placements of juveniles offset the cost of providing this intensive service and maintaining the clinicians' low caseloads.

2.2.3.9 **Combined Behavioral and Nicotine Replacement Therapy for Nicotine Addiction** consists of two main components:

- The transdermal nicotine patch or nicotine gum reduces symptoms of withdrawal, producing better initial abstinence.

- The behavioral component concurrently provides support and reinforcement of coping skills, yielding better long-term outcomes.

Through behavioral skills training, patients learn to avoid high-risk situations for smoking relapse early on and later to plan strategies to cope with such situations. Patients practice skills in treatment, social, and work settings. They learn other coping techniques, such as cigarette refusal skills, assertiveness, and time management. The combined treatment is based on the rationale that behavioral and

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pharmacological treatments operate by different yet complementary mechanisms that produce potentially additive effects.

2.2.3.10 **Community Reinforcement Approach (CRA) plus Vouchers** is an intensive 24-week outpatient therapy for treatment of cocaine addiction. The treatment goals are twofold:

- To achieve cocaine abstinence long enough for patients to learn new life skills that will help sustain abstinence.

- To reduce alcohol consumption for patients whose drinking is associated with cocaine use.

Patients attend one or two individual counseling sessions per week, where they focus on improving family relations, learning a variety of skills to minimize drug use, receiving vocational counseling, and developing new recreational activities and social networks. Those who also abuse alcohol receive clinic-monitored disulfiram (Antabuse) therapy. Patients submit urine samples two or three times each week and receive vouchers for cocaine-negative samples. The value of the vouchers increases with consecutive clean samples. Patients may exchange vouchers for retail goods that are consistent with a cocaine-free lifestyle.

This approach facilitates patients' engagement in treatment and systematically aids them in gaining substantial periods of cocaine abstinence. The approach has been tested in urban and rural areas and used successfully in outpatient detoxification of opiate-addicted adults and with inner-city methadone maintenance patients who have high rates of intravenous cocaine abuse.

2.2.3.11 **Voucher-Based Reinforcement Therapy** in Methadone Maintenance Treatment helps patients achieve and maintain abstinence from illegal drugs by providing them with a voucher each time they provide a drug-free urine sample. The voucher has monetary value and can be exchanged for goods and services consistent with the goals of treatment. Initially, the voucher values are low, but their value increases with the number of consecutive drug-free urine specimens the individual provides. Cocaine- or heroin-positive urine specimens reset the value of the vouchers to the initial low value. The contingency of escalating incentives is designed specifically to reinforce periods of sustained drug abstinence. Studies show that patients receiving vouchers for drug-free urine samples achieved significantly

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more weeks of abstinence and significantly more weeks of sustained abstinence than patients who were given vouchers independent of urinalysis results. In another study, urinalyses positive for heroin decreased significantly when the voucher program was started and increased significantly when the program was stopped.

2.2.3.12 **Day Treatment with Abstinence Contingencies and Vouchers** was developed to treat homeless crack addicts. For the first 2 months, participants must spend 5.5 hours daily in the program, which provides lunch and transportation to and from shelters. Interventions include individual assessment and goal setting, individual and group counseling, multiple psychoeducational groups (for example, didactic groups on community resources, housing, cocaine, and HIV/AIDS prevention; establishing and reviewing personal rehabilitation goals; relapse prevention; weekend planning), and patient-governed community meetings during which patients review contract goals and provide support and encouragement to each other. Individual counseling occurs once a week, and group therapy sessions are held three times a week. After 2 months of day treatment and at least 2 weeks of abstinence, participants graduate to a 4-month work component that pays wages that can be used to rent inexpensive, drug-free housing. A voucher system also rewards drug-free related social and recreational activities. This innovative day treatment was compared with treatment consisting of twice-weekly individual counseling and 12-step groups, medical examinations and treatment, and referral to community resources for housing and vocational services. Innovative day treatment followed by work and housing dependent upon drug abstinence had a more positive effect on alcohol use, cocaine use, and days homeless.

2.2.4 Types of treatment for drug addiction

The types of drug treatment programs listed below are based on the premise that drug addiction is a physiological disorder and should be treated medically, albeit in conjunction with counseling and other social interventions. Keep in mind that regardless of a program's length in weeks or months, follow-through and long-term follow-up are crucial to recovery.

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Table 2-3 : Types of treatment for drug addiction

Inpatient treatment	
Short-term residential programs	Based on the "**Minnesota Model**" (so called because it was pioneered at the Hazelden Foundation treatment facility outside Minneapolis). Residential term is typically three to four weeks, with intensive follow-up sessions for several months. This model combines the 12-step approach with a focus on behavioral and emotional change and group affiliation. Although most of the therapy is conducted in groups, the treatment plan is tailored to the individual's needs.
Long-term residential programs	Involving stays of 6 to 12 months, long-term residential programs, often called **therapeutic communities**, are geared toward drug addicts with more severe problems or who combine drug abuse with mental disorders. Here, too, there is an emphasis on group affiliation and the reshaping of outlooks and behaviors.
Rapid medical detoxification	This method can be used for withdrawal from opiates. After checking into a hospital, the patient is sedated, then administered medications that basically compress physical withdrawal into a few hours (while the patient is asleep). The patient remains in the hospital for another 24-48 hours for monitoring. Because physical detoxification is only the first stage of treatment, it's essential that the patient follow up with participation in therapy and a community-based program such as Narcotics Anonymous that will address the psychological roots of the addiction and the necessary behavioral changes.
Outpatient programs	
Methadone maintenance	Long used to counter urban heroin addiction, personnel in these programs administer an oral synthetic opiate such as methadone. The purpose is to keep clients out of the dangers of drug culture (such as dirty needles and overdose) and to decrease the craving for opiates without inducing withdrawal symptoms. The better programs offer counseling or referrals to community-based groups for continuing psychological services.
The "Matrix Model"	Used widely with people addicted to stimulants such as cocaine and methamphetamines, this is a drug-free approach that combines frequent sessions of behavioral therapy with emphasis on positive reinforcement, group and family involvement, 12-step work, and regular testing over a period of one year.
Bio-physical method	Rather than replacement drugs, this treatment uses vitamins, exercise, nutrition, and sauna visits (to sweat out the toxins), along with group sessions to attain insight into addiction and build social skills.
Criminal justice programs	There are two types of drug treatment programs administered by the criminal justice system. **Prison-based treatment programs** employ drug education classes, self-help programs, and the "therapeutic community" model, with participants separated from the general population. **Community-based treatment programs** are alternatives to incarceration and can include many social services besides counseling and medical treatment.

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2.2.5 Self-help programs for drug abuse treatment

Since the founding of Alcoholics Anonymous in 1935, people have been finding freedom from addiction through participation in peer-directed groups, where they can share experiences, learn social and coping skills, and gain strength from other people who have been where they have. Self-help programs call upon the individual addict to take responsibility for his or her life and lifestyle, at the same time fostering self-acceptance and self-esteem. While most experts in the field of drug addiction view addiction as a medical problem, because of its effects on both brain and body, some see it as a behavioral problem to be solved through the development of self-knowledge, behavioral changes, and coping techniques. There are self-help groups that embrace both views and others that lean toward the behavioral model. Each type of program encourages the individual to understand not only the reasons to refrain from using drugs but the underlying emotional causes of his or her addiction. Whichever treatment model best suits an individual, it's clear that participation in some kind of self-help program is desirable for people fighting addiction.

12–Step Programs

The most prominent self-help groups for drug addiction are the 12-step programs, based on the principles for living formulated by the founders of Alcoholics Anonymous (AA) in 1935. After World War II, other groups struggling with addiction formed 12-step groups such as **Narcotics Anonymous**, **Cocaine Anonymous**, **Marijuana Anonymous**, and **Crystal Meth Anonymous**. All these organizations have proliferated; in 2005, Narcotics Anonymous alone accounted for 21,500 registered groups, holding more than 33,500 weekly meetings in 116 countries.

Meetings in 12-step programs are always free and are facilitated not by professional health or social workers but by fellow addicts who share their strength, experience, and empathy in applying the program principles. The 12-step approach has a strong spiritual component in that the steps for addicts include admitting powerlessness over the addiction and surrendering to a "higher power," which they can interpret according to their individual beliefs.

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Research, including studies conducted over many years, indicates that these programs are effective, especially as a continuing follow-up to medical treatment for drug addiction. Recognizing their success, many different kinds of drug treatment settings, including jails and walk-in clinics, have begun to incorporate 12-step programs on site, and professionals in the field have made a point of being able to refer clients to such programs.

Quality drug detoxification programs should provide

Drug detox, short for drug detoxification, is only the first step in achieving lifelong abstinence from drugs and alcohol. Most people, due to the length and severity of use, develop a physical and psychological dependency on their drug of choice (including alcohol).

When you abruptly discontinue use, you will begin to experience the onset of symptoms associated with withdrawal. These initial symptoms may include sweats, cramping, constipation and anxiety or can be as medically complex as seizures, convulsions and delirium tremors. Once addicted, the risks associated with suddenly discontinuing drug or alcohol use are just too great to be done without medical supervision.

- A safe, medically supervised setting, focused on reducing or eliminating the symptoms associated with withdrawal
- A withdrawal that is humane and protects the patient's dignity
- A treatment plan for each patient, focused on what they must do in order to maintain their recovery after the alcohol and drug detox phase is completed

Rapid drug detox, also known as ultra rapid opiate detox, is basically a procedure conducted under general anesthesia which is designed to eliminate the body's craving for certain highly addictive drugs. This happens by purging your system of all the addictive substances. This procedure has proven most effective in treating dependency on a wide range of opiates such as:

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Heroin Addiction Treatment

Heroin was first synthesized in 1874 from morphine, a naturally occurring substance extracted from the seed pod of poppy plants. Before anything was known about heroin addiction, heroin was marketed in 1898 as a new pain medication and became widely used in medicine in the early 1900s until it became a controlled substance in 1914 under the Harrison Narcotic Act. Heroin is considered the most highly addictive drug and considered the most abused and most rapidly acting opiate. Continued use of heroin will most certainly lead to heroin addiction.

Heroin comes in various forms, but pure heroin is a white powder with a bitter taste. Most illicit heroin comes in powder form in colors ranging from white to dark brown. The colors are due to the impurities left from the manufacturing process or the presence of additives. "Black tar" is another form of heroin that resembles roofing tar or is hard like coal. Color varies from dark brown to black. It is important to remember, that regardless of the form, heroin addiction is a real possibility.

Heroin can be injected, smoked, or snorted. Over time, most people end up with a heroin addiction, injecting it for the euphoric feeling associated with this method of use. Effects are felt in 7 to 8 seconds. Even though effects for sniffing or smoking develop more slowly, beginning in 10 to 15 minutes, sniffing or smoking heroin has increased in popularity because of the availability of high-purity heroin and the fear of sharing needles. In addition, some users mistakenly believe that sniffing or smoking heroin will not lead to heroin addiction and allow them to control their use. The qualities associated with heroin addiction are much more powerful than a person's willpower and people snorting or smoking heroin will surely become as addicted to the drug as those persons injecting the drug.

After ingestion, heroin crosses the blood-brain barrier. While in the brain, heroin converts to morphine and binds rapidly to opioid receptors. Heroin use causes:

- A rush or surge of pleasurable sensations
- A warm flushing of the skin
- Dry mouth
- Heavy feeling in arms and legs

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- Nausea
- Vomiting
- Severe itching
- Drowsiness following initial effects
- Slowed mental function
- Slower than normal cardiac rate

Repeated heroin use produces tolerance and a physical dependence – a heroin addiction. Physical dependence causes the user's body to adapt to the presence of the drug and withdrawal symptoms occur if use is reduced.

Medical Consequences of Heroin Addiction

- Collapsed veins
- Bacterial infections
- Abscesses and other soft tissue infections
- Live or Kidney disease
- Lung complications including pneumonia and tuberculosis
- HIV/Aids
- Hepatitis B and C (which are contracted by sharing and reusing syringes and other injection paraphernalia).
- Miscarriage
- Premature delivery

Withdrawal symptoms of Heroin Addiction

Heroin addiction withdrawal symptoms occur within a few hours of the last use and can include:

- Restlessness
- Muscle and bone pain
- Insomnia
- Diarrhea
- Vomiting
- Cold flashes
- Involuntary leg movement

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These heroin addiction withdrawal symptoms subside after about a week. Although not normally fatal, withdrawal from heroin addiction is extremely uncomfortable and very difficult to tolerate without medical help. It is suggested that heroin addicts withdraw from their addiction to heroin in licensed and medically supervised heroin addiction treatment centers and enroll in heroin addiction treatment programs that are capable of providing safe and comfortable detox services.

Consequences of Heroin Use

Street heroin is often diluted or "cut" with substances such as sugar, starch, powdered milk or much more dangerous products such as, strychnine. In many cases, these additives do not dissolve when injected they can clog the blood vessels that lead to the lungs, liver, kidneys, or brain. This can result in the infection of cells and destruction of vital organs. In addition, many users do not know the actual strength of the heroin they are using which can lead to overdose or death.

Heroin Addiction Treatment

Heroin addiction treatment has involved Methadone used to treat opiate addiction for more than 30 years. Methadone suppresses heroin withdrawal symptoms for 24 to 36 hours. Although the patient remains physically dependent on the opiate, the craving from heroin use is reduced and the highs and lows are blocked. This heroin addiction treatment permits the patient to be free from the uncontrolled, compulsive, and disruptive behavior associated with heroin addiction. While many methadone maintenance clinics (long term methadone use) are available, we believe the most effective use of methadone in heroin addiction treatment is found in utilizing the drug to assist in the gradual withdrawal from heroin addiction.

Other pharmaceutical approaches to heroin addiction treatment and assistance in the withdrawal and detox process include naloxone, naltrexone, and buprenorphine. Detoxification relieves the withdrawal symptoms experienced when substance use is discontinued. Detoxification is not a treatment for addiction, but the first step in the treatment process, which usually includes participation in a treatment program specializing in the treatment of opiate and heroin addiction.

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Alcohol Addiction Treatment

Alcoholism, also known as “alcohol dependence and alcohol addiction,” is a disease that has four definitive symptoms as its base:

- **Craving:** An intense desire or compulsion to drink alcohol
- **Loss of Control:** The inability to manage one’s drinking alcohol on any given occasion
- **Physical Dependence:** Alcohol withdrawal symptoms such as nausea, sweating, shakiness, and anxiety occur when alcohol use is stopped after a period of heavy drinking
- **Tolerance:** The need to drink greater amounts of alcohol in order to experience the same effect

This has been established by the American Medical Association. The craving that an alcoholic feels for alcohol can be as strong as the need for food or water. An alcoholic will continue to drink despite serious family, health, financial or legal consequences.

Like many other diseases, alcoholism is chronic, meaning that it lasts a person's lifetime; it usually follows a predictable course; and it has symptoms. The risk for developing alcoholism, alcohol dependence or alcohol addiction is influenced by genetics, environment and lifestyle.

Alcoholism, alcohol addiction and alcohol dependence are basically the same type of alcohol problem. Alcohol abuse, however, is different than these three. Alcohol abuse can be just as harmful. A person can abuse alcohol without actually being an alcoholic – that is, he or she may drink too much and too often but still not be dependent on alcohol. Some of the problems linked to alcohol abuse include not being able to meet work, school, or family responsibilities, drunk-driving arrests and car crashes, and drinking-related medical conditions. Under some circumstances, even social or moderate drinking is dangerous – for example, when driving, during pregnancy, or when taking certain medications.

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Alcohol abuse differs from alcoholism in that it does not include an extremely intense craving for alcohol, loss of control over drinking, or physical dependence. Alcohol abuse is defined as a pattern of drinking that results in one or more of the following situations within a 12-month period:

- Failure to fulfill major work, school, or home responsibilities
- Drinking alcohol in situations that are physically dangerous, such as while driving a car or operating machinery
- Having recurring alcohol-related legal problems, such as being arrested for driving under the influence of alcohol or for physically hurting someone while drunk
- Continued drinking despite having ongoing relationship problems that are caused or worsened by the drinking.

An alcohol detox program is an integral component of any alcohol treatment. Many factors must be considered when developing an alcohol detox protocol. Issues such as your age, medical issues, amount and frequency of alcohol use are all considered. The alcohol detox treatment protocol developed is the key in managing any symptoms associated with alcohol withdrawal. An alcohol detox program should be a medically monitored unit, complete with 24-hour nursing and a physician credentialed in addiction medicine. Due to the health concerns associated with alcoholism or alcohol abuse, an alcohol detox and treatment program must be able to address the medical needs of each patient

When you begin the process of alcohol detox, you will most likely experience alcohol withdrawal symptoms. These physical alcohol withdrawal symptoms are different for everyone, but can include, sweats, nausea, vomiting, tremors, anxiety and the possibility of convulsions and seizures. With the medications that are available today, an effective alcohol detox and alcohol treatment program can minimize and in some cases, almost eliminate the symptoms associated with alcohol withdrawal. STOP, it is not that simple. Before choosing an alcohol detox and treatment program understand that not every alcohol detox program is the same. Each has its own philosophy on alcohol detox, and one alcohol detox may not be as effective and safe as the next alcohol detox.

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Alcohol detox is only the first step towards recovery from alcoholism. In an alcohol detox program, all that has been accomplished is the elimination of alcohol from the body, the management of alcohol withdrawal symptoms and the development of a foundation for your future recovery. The real work must follow and comes in resolving the core issues surrounding why you continue to drink, despite all of the negative consequences. Research shows, that people who only attend alcohol detox, instead of also following through with an alcohol rehab program, will most likely end up in relapse.

The average length of time you spend in an alcohol detox program is between three to seven days. Alcohol detox can be completed safely and effectively in any residential alcohol treatment program. If you are using drugs in conjunction with alcohol, it is imperative that this information is shared with the treating physician. These additional drugs can drastically alter the alcohol detox protocol designed for you, which is the tool used to manage your alcohol withdrawal symptoms.

Alcohol Rehab Programs

The type of alcohol treatment you receive depends upon the severity of your alcoholism and your resources. Generally speaking most people who are alcohol dependant will require a medically monitored alcohol detox program and a stay in an alcohol rehab program.

- Alcohol Detox**:** Detox usually takes place within an alcohol rehab center in a medically monitored alcohol detox unit. Alcohol detox, is the process by which all alcohol withdrawal symptoms are medically managed as alcohol use is discontinued. During alcohol detox, medications are prescribed to make you more comfortable during the alcohol withdrawal phase. It can take between five and seven days depending upon the extent of your alcoholism. If you are using drugs in conjunction with alcohol, alcohol detox may take a little longer and can be a bit more complicated. This being the case, it is imperative that you provide the alcohol rehab program with exact information upon entering alcohol detox.
- Alcohol Rehab**:** Alcohol rehab or the alcohol rehab program, generally follows alcohol detox and is a combination of group, individual, educational

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and family therapy. Most people remain in an alcohol rehab program for several weeks in an attempt to resolve many of the feelings they drank over. While in alcohol rehab, each patient is generally seen by a psychiatrist to rule out or address the possibility of any mental illness. The combination of alcohol addiction and a mental illness is termed dual diagnosis.

- Outpatient Alcohol Treatment**:** For those persons not in need of an alcohol rehab program, such as those who may suffer from alcohol abuse rather than alcohol dependence, outpatient alcohol treatment programs are available. Understand that not everyone is appropriate for an outpatient alcohol treatment program and looking to take the "easier, softer way", can result in repeated relapse and a chronic alcoholic condition, called alcoholism. A professional alcohol assessment should be sought before choosing a particular level of an alcohol treatment program.

When choosing an alcohol rehab program or inpatient alcoholism treatment program you would be wise to make sure the program includes:

- An alcohol detox program within its own facility
- A medically monitored alcohol detox program that has 24-hour nursing
- A physician trained in addiction medicine
- A comprehensive family component
- An intensive relapse prevention program
- A dual diagnosis treatment program to attend
- A license by the state and its JCAHO accreditation

Cocaine Addiction Treatment

Cocaine, the most potent stimulant of natural origin, is extracted from the leaves of the coca plant (Erythroxylon). It was originally used in South America in the mid-19th century to relieve fatigue. Before anything was known about cocaine addiction, pure cocaine (cocaine hydrochloride) was first used as a local anesthetic for surgeries in the 1880s. In the early 1900s cocaine became the main stimulant drug used in tonics and elixirs for treatment of various illnesses.

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Crack, crack addiction the freebase form of cocaine, derives its name from the crackling sound made when heating the sodium bicarbonate (baking soda) or ammonia used during production. Crack cocaine addiction was on the rise as its popularity increased in the mid-1980s. Crack cocaine use was rampant because of its immediate high and inexpensive production cost.

Cocaine most often appears as a white crystal like powder or an off-white chunky material. Powder cocaine is commonly diluted or "cut" with other substances such as lactose, inositol, or mannitol to increase the amount of the substance and the profits associated with the sale of the drug. Powder cocaine is usually snorted or dissolved in water and injected. Crack, or "rock", is most often smoked. All forms can lead to cocaine addiction and users need immediate treatment.

Effects of Cocaine That Can Lead to Cocaine Addiction:

- Builds up dopamine in the brain producing euphoric effects
- Users become energetic, talkative and mentally alert
- Decreases appetite
- Lessens the need for sleep
- Constricts blood vessels
- Dilates pupils
- Increases temperature, heart rate and blood pressure
- May produce tremors, vertigo, muscle twitches, paranoia, irritability and restlessness

The effects of cocaine normally occur immediately after ingestion and can last from a few minutes to a few hours. Snorting cocaine produces a slow onset of effects lasting 15 to 30 minutes. Smoking cocaine produces a more intense high lasting 5 to 10 minutes. Cocaine addicts build a tolerance to the drug with continued use. Cocaine addiction occurs because users need to increase the dosage in order to continually recapture the intense high they first experienced.

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Consequences of Cocaine Addiction include:

- Cardiovascular problems including disturbances in heart rhythm, heart attacks
- Respiratory failure
- Neurological effects including stroke, seizure, headaches
- Gastrointestinal complications
- Blurred vision
- Fever
- Muscle spasms
- Convulsions
- Coma

Other medical complications of cocaine use are related to the method of ingestion. For example, users who snort cocaine may lose their sense of smell, have nose bleeds, have problems swallowing, and have an overall irritation of their nasal septum that leads to a chronic runny nose or eventual surgery.

Combined cocaine and alcohol use converts in the body to coca-ethylene and causes a longer duration of effects in the brain that is more toxic than each drug used alone. This mixture results in more drug-related deaths than any other combination of drugs.

Cocaine Use and Addiction and its Effects on the Unborn

Although the effects of prenatal cocaine exposure are not completely understood, research has shown that such afflicted babies are often born prematurely and have low birth weights. Originally thought to suffer irreversible neurological damage, "crack babies" now appear to recover from the exposure to cocaine. This is not to underestimate the subtle effects cocaine can have on these babies as they continue to age such as lack of concentration, emotional struggles or even an increased curiosity relating to the drug later on in years.

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Cocaine Addiction Treatment

There is no drug available for cocaine addiction treatment. Antidepressants are sometimes prescribed to assist a person who is having difficulty dealing with some of the more severe mood changes associated cocaine addiction withdrawal.

Generally speaking when addicts enter cocaine addiction treatment centers, they are assessed medically and psychiatrically. Along with prescribed medications for mood swings and anxiety, rest is usually in order for a few days.

When the addict's condition stabilizes, they participate in various therapies including education of the disease process, the development of more effective coping skills, and finding forgiveness for their actions and behavior. All effective cocaine addiction treatments include the family or those who are significant in the addict's life. They too must seek treatment in order to resolve feelings of anger, resentment, fear or disappointment, while taking steps to restore the trust and intimacy they once experienced.

Due to the intense cravings and high relapse rate associated with crack or cocaine addiction, recovery in a supportive environment, such as residential treatment centers, provide the recovering addict much more support than private or outpatient therapy. In most cases, the cocaine addict will attend outpatient therapy after completing residential cocaine addiction treatment for continued support. In conjunction with outpatient therapy, most addicts are urged to attend 12 step support groups to augment their commitment to recovery.

Marijuana Addition Treatment

Marijuana addiction has its roots in a plant named Cannabis. Marijuana is a mixture of the dried, shredded leaves, stems, seeds, and flowers of the hemp plant, cannabis sativa. It is typically smoked in hand-rolled cigarettes (joints), cigars (blunts), pipes, or water pipes (bongs). The active ingredient in marijuana is THC, which is responsible for the potency and effects of marijuana. Over the past two decades, THC levels of marijuana in the United States have increased dramatically, leading to more marijuana addictions than ever before.

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Commercial-grade marijuana contains parts of the marijuana plant such as stems and seeds that are not of high quality. "Sinsemilla," higher potency marijuana, contains only the leaves and buds of the cannabis plant, where THC is most concentrated.

Effects and Consequences of Marijuana Addiction

Marijuana's effects begin as soon as the drug enters the brain and can last from 1 to 3 hours. As THC enters the brain, it causes the user to feel high by stimulating brain cells to release the chemical dopamine. When the euphoria passes, the user may feel sleepy or depressed and may also get feelings of panic, anxiety, paranoia or distrust. Continued use, in an attempt to regain that feeling of euphoria can lead to *marijuana addiction.*

Acute Effects of Marijuana (present during intoxication)

- Impairs short-term memory
- Impairs attention, judgment, and other cognitive functions
- Impairs coordination, balance, and reaction time
- Increases heart rate

Persistent Effects of Marijuana Use (lasting longer than intoxication, but may not be permanent)

- Impairs memory
- Impairs learning skills
- Increases risk of chronic cough, bronchitis, and emphysema
- Long-term (cumulative, potentially permanent effects of chronic abuse)
- Can lead to marijuana addiction
- Increases risk of cancer of the head, neck, and lungs

Marijuana and Pregnancy

Research has shown that fetal exposure to marijuana can cause affected infants to experience altered responses to visual stimuli and increased tremulousness,

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which may indicate problems with neurological development. Other studies have shown that during infancy and preschool years, marijuana-exposed children have more behavioral problems than non-exposed children. Research also indicates that marijuana-exposed children may experience problems regarding visual perception, language comprehension, sustained attention, and memory tasks.

Detrimental Health Effects of Marijuana Addiction

Marijuana addiction is associated with numerous detrimental health effects, including:

- Frequent respiratory infections
- Impaired memory and learning
- Increased heart rate
- Anxiety
- Panic attacks
- Disrupted coordination and balance
- Reaction time changes

Results of a study released in 2001 indicate that a person's risk of heart attack within the first hour of smoking marijuana is four times the usual risk.

Marijuana Addiction and School/Work Performance

Studies have shown lower grade point averages, less satisfaction with school, negative attitudes, and increased rates of school absenteeism among marijuana users.

In another study, researchers compared marijuana smoking and nonsmoking 12th graders' scores on standardized tests of verbal and mathematical skills. Although all of the students had scored equally well when tested in the 4th grade, heavy marijuana smokers (those who used marijuana seven or more times per week) scored significantly lower in 12th grade than nonsmokers.

Workers who smoke marijuana have been shown to have more problems on the job than their nonsmoking coworkers. Several studies have associated workers'

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marijuana use with increased tardiness, absences, accidents, workers' compensation claims, and job turnover.

Marijuana Addiction Withdrawal

Individuals addicted to marijuana or who have been abusing the drug for long periods of time may experience cravings and other marijuana addiction withdrawal symptoms when trying to quit. These marijuana addiction withdrawal symptoms may include irritability, difficulty sleeping, anxiety and an increase in any feelings of aggression.

Marijuana Addiction Treatment

There is no medication that is used to treat marijuana addiction. A person experiencing withdrawal from marijuana will usually experience mood swings, agitation, aggressiveness, insomnia, and a craving for the drug. Medication can be prescribed to reduce these symptoms, but rest and talk therapy is usually the best marijuana treatment. After about three to five days the actual cravings for the drug will diminish, although the addict will still experience thoughts about using the drug. Generally speaking, a person should enroll themselves in outpatient programs to assist them in developing more effective coping skills rather than turning to marijuana use. If the individual continues to return to the use of marijuana or other drugs, they should seek admission for marijuana treatment to one of many inpatient addiction programs.

A study, funded by the National Institute on Drug Abuse (NIDA), National Institutes of Health, has provided us with evidence that a withdrawal syndrome is associated with abstinence from long-term marijuana use. The study went on to say that aggressive behavior is part of the marijuana detox and marijuana withdrawal syndrome.

Marijuana detox and withdrawal is characterized by insomnia, restlessness, loss of appetite, and irritability. Although less dramatic than the withdrawal syndrome associated with cocaine or crystal meth - it is significant enough to recognize and treat.

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Long Term Marijuana Use Has Its Consequences

Marijuana is the most widely used illicit drug in the United States and long-term marijuana use can lead to addiction and demand *marijuana detox*. These marijuana-addicted individuals use the drug compulsively which often interferes with family relationships, school attendance and grades, work performance, and recreational activities. Individuals with cannabis dependence may also persist in using the drug despite knowing that it can cause them problems associated with their heart or lungs and psychological problems, such as excessive sedation due to high doses. Marijuana detox, as with detox from crack cocaine, can be managed through certain medications to help with the psychological symptoms associated with withdrawal. The average length of time for marijuana detox and marijuana withdrawal is between three and five days. Continued thoughts or cravings may persist for a short period of time, but gradually diminish.

Ecstasy Addiction Treatment

"Ecstasy" is a name for the designer drug MDMA (3, 4-methylenedioxymethamphetamine). This is a synthetic drug with both psychedelic and stimulant effects. In the past, some therapists in the United States used the drug to facilitate psychotherapy. In 1988, however, Ecstasy became a designer drug Schedule I substance under the Controlled Substances Act.

Currently, Ecstasy is predominantly a "club drug" and is commonly used at all-night dance parties known as "raves". However, recent research indicates that the use of Ecstasy drugs is moving to settings other than nightclubs, such as private homes, high schools or college dorms. Ecstasy is a stimulant whose psychedelic effects can last between 4 and 6 hours and is usually taken orally in pill form. The term designer drug is used to describe psychoactive drugs whose molecular structure has been changed to get around existing drug laws. In the 1980’s various heroin-like synthetic substances appeared on the “scene.” Soon after, new laws were instituted to ban all designer drugs by making it illegal to possess, sell or manufacture chemicals that were substantially similar in pharmacology and chemistry to Schedule 1 or Schedule II drugs.

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Effects of Ecstasy Drug Use and Other Designer Drug Use

- Confusion
- Depression
- Anxiety
- Sleeplessness
- Drug Craving
- Paranoia

Harmful Medical Implications of Ecstasy Drug Use and Other Designer Drug Use

- Muscle tension
- Involuntary teeth clenching
- Nausea
- Blurred vision
- Feeling faint
- Tremors
- Rapid eye movement
- Sweating or chills

Because of Ecstasy's ability to increase heart rate and blood pressure, circulatory problems or cardiovascular disease can occur.

Research shows that Ecstasy drug use causes damage to the parts of the brain that are critical to thought and memory. Ecstasy increases the activity levels of neurotransmitters such as serotonin, dopamine, and norepinephrine. This designer drug causes the release of the neurotransmitters from their storage sites, which increases brain activity and also interferes with neurotransmitter synthesis. Ecstasy drug use causes a significant depletion in the neurotransmitters. It takes the brain a significant length of time to rebuild the amount of serotonin and other neurotransmitters needed to perform important functions.

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In addition to the dangers associated with the Ecstasy drug itself, users are also at risk of taking a drug that is not approved by the FDA and that a person has no knowledge of what substances are actually in the drug.

Ecstasy, Designer Drugs and Raves

Ecstasy and other designer drugs are often found at nightclubs and raves. Raves are characterized by high entrance fees, extensive drug use, and overcrowded dance floors. Club owners often seem to promote the use of Ecstasy drugs at their clubs. They sell overpriced bottled water and sports drinks to try to manage the hyperthermia and dehydration effects of Ecstasy drug use; pacifiers to prevent involuntary teeth clenching; menthol nasal inhalers and neon glow-sticks to enhance some of the other effects of Ecstasy drug use.

Raves often are promoted as alcohol-free events, which gives parents a false sense of security that their children will be safe attending these parties. In reality, raves are often an environment suited for the sale and abuse of designer drugs and other addictive substances.

Rave party attendees who take Ecstasy are at risk of dehydration, hyperthermia and heart or kidney failure. These risks are due to a combination of the drug's stimulant effect, which allows the person taking Ecstasy to dance for long periods of time in an atmosphere that is hot and crowded. This is the typical landscape of a rave party. The combination of crowded all night dance parties and Ecstasy has resulted in numerous fatalities.

Ecstasy drugs are synthetic, psychoactive, neuro-toxic drugs, which produces many negative side effects. These unpleasant side effects include: insomnia, anxiety, paranoia, confusion, nausea, blurred vision, aggressiveness, mood swings and depression. Ecstasy drugs detox is necessary to eliminate these uncomfortable side effects.

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Ecstasy Drugs Detox

Similar in structure to hallucinogens like LSD and stimulants like cocaine and amphetamines, ecstasy drugs and/or club drugs are not physically addictive, but do create an emotional or psychological dependence. The essential elements utilized to manage the withdrawal symptoms of ecstasy drug detox are medication and rest. The length of time required for ecstasy drugs detox is approximately three days, although reports of mood swings and irritability may last up to ten days.

One important note is that ecstasy can create a reduction in serotonin and dopamine in the brain. This can disrupt normal brain activity and cause emotional problems and even learning disorders. That is why ecstasy drugs detox is important, and should be entered into as soon as an addiction occurs.

Methamphetamine Addiction Treatment

Methamphetamine or crystal methamphetamine is the most potent type of amphetamine available today. Almost all of today's crystal methamphetamine or "crystal meth" is homemade and has stimulant properties similar to that of adrenaline. Like adrenaline, methamphetamine stimulates the central nervous system and works directly on the brain and spinal cord by interfering with healthy neurotransmission.

A synthetic drug, methamphetamine is extremely addictive. All drugs that are addictive share two common elements: the drug produces a pleasant effect or feeling, which is then followed by an unpleasant effect or feeling. This process takes place through a suppression of the normal production of dopamine, which creates a chemical imbalance. To return to normal, the person needs more of the drug and the cycle of methamphetamine addiction begins. Street names for crystal methamphetamine are crank, glass, speed, ice, meth, or zip.

Achieving a Methamphetamine High

Most people tend to snort or inject methamphetamine although a more concentrated form of "crystal meth" can also be smoked. It seems *ice* or *glass* are to

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"crystal meth", what crack is to cocaine. With most of the crystal methamphetamine being produced at home, the main ingredients used to process it are found in over the counter medications such as cold and asthma medicines, which include ephedrine or pseudo-ephedrine.

Because amphetamines are available by prescription, many people feel they are not as likely to become physically dependent or addicted to this drug. The denial associated with this medication is no different than the denial that accompanies other prescription medications such as; Xanax, Vicodin, Hydrocodone, Valium, OxyContin or Percocet.

Methamphetamines are addicting and produce an artificial feeling of pleasure. The person's initial use of amphetamine or methamphetamine is stored in the subconscious. The subconscious learns through association that the use of amphetamine provides immediate pleasure. The person's subconscious memory actually remembers that initial "high" and continually enforces the desire to recapture and experience that feeling.

It is rare that a person using amphetamine or methamphetamine ever experiences that same "high" or "rush." This is a result of the drug's ability to suppress and deplete the brain's production of the normal chemical messengers on which the brain relies to generate positive feelings. The brain adapts to the presence of amphetamine by decreasing production of the normal chemical messenger. The addict then begins to increase the amount they use in an effort to recapture that pleasurable feeling. At some point, the methamphetamine addict cannot use anymore and "crashes" (their body and mind has had enough.

Methamphetamine Use for Weight Loss

Many people have used methamphetamines to lose weight because the drug reduces and sometimes eliminates the desire to eat. Unfortunately, when a person discontinues consuming food, the body begins to feed off itself for continued nutrition. Several things will occur at this point:

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- The person will begin to experience adverse medical complications
- The person will have to discontinue amphetamine use and in most cases experience the symptoms associated with amphetamine withdrawal
- The person will experience rebound effects with regard to their eating and gain their weight back and more

Effects of Amphetamine or Methamphetamine Addiction

Methamphetamine or amphetamine, regardless of its form, greatly stimulates the person's central nervous system and lasts anywhere from a few hours to as long as twenty four. This addictive drug has short and long term adverse physical and mental effects which may include:

- Accelerated heart beat
- Elevated blood pressure
- Hypertension
- Chest pain
- Irreversible damage to blood vessels in the brain
- Heart attack
- Stroke
- Decrease in appetite
- Increase in alertness
- Increased physical activity
- Increased irritability
- Insomnia
- Aggressive behavior
- Jerky movements
- Paranoia
- Incessant conversations
- Convulsions
- Hypothermia
- Brain damage
- Malnutrition
- Kidney disorders

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- Impaired immune system
- Blood clots
- Liver damage

Additional Physical Effects of Methamphetamine Abuse and Addiction

- Slurred speech
- Dilated pupils
- Grinding of the teeth
- Dizziness
- Confusion
- Respiratory distress
- Sweats
- Numbness
- Loss of coordination

Methamphetamine Addiction - Psychological Effects

Methamphetamine addiction (the use and abuse of amphetamine, methamphetamine or crystal methamphetamine) can create symptoms that resemble several types of mental illness including:

- Visual and auditory hallucinations
- Depression
- Obsessive behaviors
- Panic attacks
- Intense anger and paranoia

Consequences of Amphetamine and Methamphetamine Addiction

Methamphetamine has recently experienced a revival in its use. If a person abruptly discontinues their use of methamphetamine or amphetamines they will experience symptoms associated with withdrawal.

Withdrawal Symptoms of Methamphetamine Addiction

Withdrawal is extremely uncomfortable and in some cases life threatening. Symptoms may include:

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- Drug cravings
- Nausea
- Irritability
- Depression
- Loss of energy
- Insomnia
- Sweats
- Hyperventilation
- Convulsions
- Irregular heart beat

Because of the severity of this withdrawal, many people choose to enter detox or methamphetamine addiction treatment programs to assist them in coping with these symptoms. In addition to withdrawal, crystal methamphetamine affects many other areas of a person's life. Amphetamine addicts tend to spend most of their finances on obtaining the drug, have difficulty maintaining employment due to their loss of concentration, motivation and depression and experience deterioration in their personal relationships as their paranoia, and need for isolation increases.

Treatment for Crystal Meth, Amphetamine and Methamphetamine Addictions In almost every case, addiction treatments or drug rehabs for crystal meth or amphetamine addiction begins with an admission to one of many detox centers for the management of withdrawal symptoms. The symptoms associated with withdrawal from methamphetamine addiction or amphetamine addiction are manageable, but are certainly best dealt with by an addictionologist (a physician trained and certified in addiction medicine) in a medically supervised setting located within licensed and JCAHO accredited drug rehab centers.

Although the patient will have dealt with and resolved many of the initial symptoms associated with methamphetamine and crystal meth withdrawal, thoughts and feelings of continued use may stay with them for weeks to come. As the brain

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continues to heal from the damage created by the abuse of crystal meth and methamphetamine, these cravings and thoughts will begin to diminish as well. Due to this phenomenon and the medical problems created by the abuse of this drug, most people transition into rehab or drug rehab centers, directly from detox.

Behavior-based programs

Some self-help programs, while maintaining the group-support structure, prefer what they call a scientific approach to recovery from addiction rather than a spiritual foundation, with its belief in a "higher power." Behavior-based programs view addiction as maladaptive behavior rather than a disease. Their goal is to use cognitive-behavioral techniques to give participants specific tools they can use to fight the destructive behavior of addiction. Programs based on this general approach include:

-SMART Recovery® – This program, which offers about 300 weekly meetings worldwide plus online help, is based on a four-point method that involves enhancing members' motivations to abstain, their ability to cope with cravings, their capacity to rational problem solving, and their judgment in balancing momentary and long-term satisfactions.

-Secular Organizations for Sobriety/Save Our Selves (SOS) – SOS embraces the group dynamic of the 12-step approach, calling the support of other addicts "a vital adjunct to recovery." However, it explicitly positions itself as a recovery method for addicts who are uncomfortable with the quasi-religious 12-step program and views getting straight and staying off drugs as an individual responsibility.

-LifeRing – Similarly to SOS, this Northern California-based organization rejects the spiritual 12-step model but depends on group discussion, claiming simply that "LifeRing works through positive social reinforcement." Typically, group participants share their experiences of the week and encourage one another to remain clean.

-Women for Sobriety (WFS) – This program was founded in 1976 to meet the needs of women alcoholics after research showed that their recovery rate through AA was significantly lower than that of men. It now includes women

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addicted to drugs. Participants hold weekly meetings in small groups of 6-10 women, with a structured format for confidential discussion. The core of the WFS philosophy is a set of 13 affirmations, the "New Life" Acceptance Program. WFS also promotes behavioral changes through positive thinking, positive reinforcement, relaxation techniques, and healthy physical habits.

-Rational Recovery – Once associated with SMART Recovery, this is the "rugged individualist" approach to drug abuse recovery, created by a clinical social worker and former alcoholic who not only rejects the idea of addiction as a disease but also claims no use for meetings or other group-support models, challenging drug and alcohol users to think of the addiction as a beast to be vanquished in themselves, by themselves.

Some behavioral programs are geared toward people who have made a commitment to staying off drugs and are looking for a way to stay straight rather than get clean, so not every program is suitable for every drug abuser. If you're looking for the self-help program that's right for you, you'll want to try different approaches and see which fits your needs, personality, and personal philosophy.

Hospital-Based

Few controlled research studies have assessed the efficacy of hospital-based inpatient services for homeless individuals. Given the current managed care climate of health care in the U.S., it is not surprising that many studies in this area have tended to focus on variables which affect use of hospital or psychiatric emergency rooms, costs, or retention rates. One pilot program devised to increase the access of the homeless mentally ill to short-term hospital-based treatment within a resource-poor public mental health system concluded that such treatment was valuable for this population, and that it was "currently underutilized." (Bennett et.al. 1988) A few studies have used hospital-based treatment programs as "control" groups for studies of residential programs. An example of this is a long-term study assessing the effectiveness of case-managed residential care for homeless veterans when compared with a customary control condition of a 21-day hospital program with referral to community services. The experimental group averaged 3.4 months in

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transitional residential care with ongoing and follow-up case management for up to one year following treatment; this group showed significant improvement on medical, alcohol, employment, and housing measures during a two-year period. However, the study found the group differences tended to occur during the treatment year and diminish during the follow-up year. And, both groups exhibited significant improvements on the four outcome areas. The authors discovered that veterans had access to and used other services even without the case-managed residential care program, which they suggest accounts for some of the improvements in the control group. (Conrad et.al., 1998)

Day Treatment

One of the 14 NIAAA Cooperative Agreement grantees randomly assigned dually diagnosed cocaine (primarily crack-cocaine) abusing homeless clients into one of two treatments: "usual care" or "enhanced" day treatment, and followed-up with them at 2 months, 6 months, and 12 months. The project is summarized here because it is one of the first demonstrations that homeless cocaine abusers can be retained and effectively treated, because it illustrates an attempt to incorporate substance abuse treatment with housing and work needs, and because it raises relevant research questions. The "*usual care*" intervention – clients are seen 2 times/week for individual and group counseling by trained substance abuse counselors who also function as case managers. The "multi-faceted enhanced treatment program" is based on two phases: day-treatment, and work and housing components.

-During the first phase (2-months in duration), participants are involved in active programming throughout the day (approx. 7:45 am - 2:00pm) every day and reside in shelters or other temporary living arrangements. This 2-month phase includes: therapeutic community meetings; psychoeducational groups (e.g. relapse prevention, assertiveness training, AIDS awareness, relaxation therapy, 12-step, and vocational training); individualized contract development; individual treatment planning and counseling; and process group therapy.

-Once clients have completed the two-month day treatment phase, and a minimum of two weeks of drug-free test results, clients are eligible to participate in

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abstinence-contingent work and housing components. (Work components include on-the-job vocational skill development and paid work experience.)

-Once clients have completed both phases of the treatment, they may remain in the drug free housing on a permanent basis, and program-based work experiences are phased out and clients are assisted in obtaining jobs in the community. Clients are encouraged to attend weekly after-care groups which focus on relapse prevention and work maintenance issues. (Raczynski et.al., 1993)

Clients in the enhanced treatment program showed slightly better results on the outcomes examined, including employment, housing, substance use, self-esteem, and depression. Results of a 12-month follow-up revealed that the major therapeutic impact of the enhanced treatment program was on drug abuse outcomes (abstinence). The study was not able to separate the impacts of program-provided housing from those of abstinence contingent housing. The question of the necessity of abstinence contingent housing and work therapy in making behavioral day treatment effective remains unanswered.

A later study on clients participating in this enhanced day treatment program found that clients with dual diagnoses showed more improvement in most of the treatment outcomes than did those with substance abuse disorders only. (McNamara et.al., 2001)

Family Involvement in Treatment

Families clearly play a crucially important role in the lives of most adolescents, and institutions such as juvenile drug courts are increasingly realizing the importance of addressing family problems as well as the specific needs of the young offender (Drug Court Clearinghouse, 1997). Important family indicators that influence juvenile substance abuse include: parents with a history of substance abuse; favorable family attitudes toward substance abuse and deviant behavior; and lack of parental involvement or appropriate supervision (Nissen et al., 1999). While peer influence is often cited as a major reason to initiate drug use or delinquency, parental

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disapproval is also a major reason not to engage in delinquent acts or to use drugs (Kumpfer & Alvarado, 1998).

It is often difficult to get families of young offenders involved in their treatment, and states differ on whether family participation in court proceedings is required (Drug Court Clearinghouse, 1997). In a study of over 1,800 juvenile detainees in an Illinois detention center, Abram et al. (2003) found that despite repeated attempts to contact a parent or guardian for consent to participate in the study, none could be found for 43.8% of participants. Thus, when family participation is required, strategies for dealing with a noncompliant parent need to be further explored (Drug Court Clearinghouse, 1997).

Since the family can be a positive or a negative influence on juvenile delinquents, experts are split as to whether families should be required to participate in the substance abuse treatment process. Nissen et al. (1999) argue that family involvement is a critical component of effective adolescent treatment, and programs should implement family-based treatment if relatives are abusing substances. Furthermore, Kumpfer & Alvarado (1998) describe comprehensive family programs as having a greater impact on a broader range of family risk and protective factors than programs that ignore context and work only with youth. Dembo & Schmeidler (2002) believe that court-ordered participation in intervention services can increase family engagement in the treatment process as well as the period of time that families receive services. Kumpfer and Alvarado (1998) point out that family conflict and reduced family involvement significantly predict associations with deviant peers, which can promote delinquent behavior. On the other hand, since not all dysfunctional families will change sufficiently to support the child's needs, some experts argue that the youth must also be equipped with skills to get along apart from their family (Drug Court Clearinghouse, 1997). Since the family's impact on the youth can vary widely, Nissen et al. (1999) argue that it is important to have a variety of options in terms of the intensity at which the family participates in the young offender's treatment.

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Another important and often difficult issue is how to define the child's "family" (Drug Court Clearinghouse, 1997). The traditional definition of a family is not necessarily applicable to every juvenile, so alternative and functional family arrangements should be considered during intervention efforts, as well as attempts to have problematic families enter treatment.

Programs for families of drug abusers

Family members and friends are crucial to the success of a drug abuser's treatment. They can be obstacles to successful drug treatment if they deny that a problem exists or play a role in enabling the addict to get and use drugs, such as giving the drug abuser money or failing to look for or recognize evidence of illicit drug use. Some family members and friends can even encourage drug use by enjoying addicts' company when they're using, viewing their behavior when using as easier to handle than their straight behavior, or even experiencing the drug use as somehow empowering to themselves. Education and self-help groups for family and friends of drug abusers can help them gain understanding of the dynamics of their relationships with the users and the psychological roots of the users' addictions. For family members and friends who want to be active partners in fighting loved ones' addictions or who are suffering the effects of living with a drug addict, self-help groups can teach valuable insights and coping skills.

The 12-step approach is noted for its attention to the families and friends of drug addicts, whether they are enablers of the addictions or simply have to live with the effects of addiction on the family. Nar-Anon is a 12-Step program formed for families of individuals addicted to drugs. Nar-Anon groups are patterned after Al-Anon groups and help family members learn to recognize and avoid enabling behaviors, take better care of themselves (regardless of the behavior of the addicted person), and improve the interpersonal dynamics within the family that contribute to and/or are impacted by the problem of drug abuse. Similarly, Cocaine Anonymous sponsors Co-Anon Family Groups, while Crystal Meth Anonymous refers family and friends to Nar-Anon or Al-Anon. Behavior-based programs don't generally offer parallel meetings for families, but several welcome family members and friends at regular meetings.

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Prevention of drug abuse and addiction

The most effective treatments against illicit drug use and drug addiction, of course, are the ones that keep them from occurring at all, and the best times to implement such preventive measures are before remedial interventions become necessary. Accordingly, the most effective prevention efforts are those aimed at reducing risk factors among children and adolescents. In its booklet *Preventing Drug Use among Children and Adolescents*, the National Institute on Drug Abuse (NIDA) outlines risk factors and protective factors concerning early drug use along with principles to help parents, educators, and community leaders develop and implement effective drug prevention programs. Some of the key concepts the NIDA's research pointed to include:

- **Risk factors change with age.** Risk factors within the family have greater impact on a younger child, while association with drug-abusing peers may be a more significant risk factor for an adolescent.
- **Early intervention with risk factors** such as aggressiveness and poor self-control often has a greater impact than later intervention.
- **A strong, positive bond between parents and children is a protective factor against drug use**. Not everyone enters parenthood with bonding skills, but they can be learned.
- **Parental monitoring and supervision are critical for drug abuse prevention.** These skills can be enhanced with training on rule-setting; techniques for monitoring activities; praise for appropriate behavior; and moderate, consistent discipline that enforces defined family rules.
- **Programs that help children form attachments to their schools and communities** can help counteract the negative influences of poverty and ready availability of drugs.
- **Parents are powerful role models for their children,** and kids will follow their parents' example. This includes using tobacco, which is a common gateway to use of illicit drugs.

Some of the most promising trends in prevention aim at school-based programs that integrate social and life skills training to teach kids how to resist drugs, rather than merely giving them facts about drug abuse and the consequent health risks.

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For example, the Life Skills Training program, developed at Cornell University and used in middle schools, teaches students to develop skills in resisting social pressures to use drugs and encourages anti-drug attitudes in them. The program has shown it can reduce use of tobacco, alcohol, and marijuana among teenagers by as much as 75 percent. Likewise, the messages that parents send to their kids about drug use, either by word or through example, greatly influences their behavior. Karol Kumpfer, Ph.D., president of the Society for Prevention Research, says it is important for parents to set rules and stay connected to their children. “Teens actually listen to their parents. Setting rules about substance abuse has a major effect.”

2.3 Drug Addiction Treatment in the United States

Drug addiction is a complex disorder that can involve virtually every aspect of an individual's functioning the family, at work, and in the community. Because of addiction's complexity and pervasive consequences, drug addiction treatment typically must involve many components. Some of those components focus directly on the individual's drug use. Others, like employment training, focus on restoring the addicted individual to productive membership in the family and society. Treatment for drug abuse and addiction is delivered in many different settings, using a variety of behavioral and pharmacological approaches. In the United States, more than 11,000 specialized drug treatment facilities provide rehabilitation, counseling, behavioral therapy, medication, case management, and other types of services to persons with drug use disorders. Because drug abuse and addiction are major public health problems, a large portion of drug treatment is funded by local, State, and Federal governments. Private and employer-subsidized health plans also may provide coverage for treatment of drug addiction and its medical consequences. Drug abuse and addiction are treated in specialized treatment facilities and mental health clinics by a variety of providers, including certified drug abuse counselors, physicians, psychologists, nurses, and social workers. Treatment is delivered in outpatient, inpatient, and residential settings. Although specific treatment approaches often are associated with particular treatment settings, a variety of therapeutic interventions or services can be included in any given setting.

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General Categories of Treatment Programs

1) **Agonist Maintenance Treatment** for opiate addicts usually is conducted in outpatient settings, often called methadone treatment programs. These programs use a long-acting synthetic opiate medication, usually methadone or LAAM, administered orally for a sustained period at a dosage sufficient to prevent opiate withdrawal, block the effects of illicit opiate use, and decrease opiate craving. Patients stabilized on adequate, sustained dosages of methadone or LAAM can function normally. They can hold jobs, avoid the crime and violence of the street culture, and reduce their exposure to HIV by stopping or decreasing injection drug use and drug-related high-risk sexual behavior. Patients stabilized on opiate agonists can engage more readily in counseling and other behavioral interventions essential to recovery and rehabilitation. The best, most effective opiate agonist maintenance programs include individual and/or group counseling, as well as provision of, or referral to, other needed medical, psychological, and social services.

2) **Narcotic Antagonist Treatment Using Naltrexone** for opiate addicts usually is conducted in outpatient settings although initiation of the medication often begins after medical detoxification in a residential setting. Naltrexone is a ling-acting synthetic opiate antagonist with few side effects that is taken orally either daily or three times a week for a sustained period of time. Individuals must be medically detoxified and opiate-fee for several days before naltrexone can be taken to prevent precipitating an opiate abstinence syndrome. When used this way, all the effects of self-administered opiates, including euphoria, are completely blocked. The theory behind this treatment is that the repeated lack of the desired opiate effects, as well as the perceived futility of using the opiate, will gradually over time result in breaking the habit of opiate addiction. Naltrexone itself has no subjective effects of potential for abuse and is not addicting. Patient noncompliance is a common problem. Therefore, a favorable treatment outcome requires that there also be a positive therapeutic relationship, effective counseling or therapy, and careful monitoring of medication compliance. Many experienced clinicians have found naltrexone most useful for highly motivated, recently detoxified patients who desire total abstinence because of external circumstances, including

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impaired professionals, parolees, probationers, and prisoners in work-release status. Patients stabilized on naltrexone can function normally. They can hold jobs, avoid the crime and violence of the street culture, and reduce their exposure to HIV by stopping injection drug use and drug-related high-risk sexual behavior.

3) **Outpatient Drug-Free Treatment** in the types and intensity of services offered. Such treatment costs less than residential or inpatient treatment and often is more suitable for individuals who are employed or who have extensive social supports. Low-intensity programs may offer little more than drug education and admonition. Other outpatient models, such as intensive day treatment, can be comparable to residential programs in services and effectiveness, depending on the individual patient's characteristics and needs. In many outpatient programs, group counseling is emphasized. Some outpatient programs are designed to treat patients who have medical or mental health problems in addition to their drug disorder.

4) **Long-Term Residential Treatment** provides care 24 hours per day, generally in non hospital settings. The best-known residential treatment model is the therapeutic community (TC), but residential treatment may also employ other models, such as cognitive-behavioral therapy. TCs are residential programs with planned lengths of stay of 6 to 12 months. TCs focus on the "resocialization" of the individual and use the program's entire "community," including other residents, staff, and the social context, as active components of treatment. Addiction is viewed in the context of and individual's social and psychological deficits and treatment focuses on developing personal accountability and responsibility and socially productive lives. Treatment is highly structured and can at times be confrontational, with activities designed to help residents examine damaging beliefs, self-concepts, and patterns of behavior and to adopt new, more harmonious and constructive ways to interact with others. Many TCs are quite comprehensive and can include employment training and other support services on site.

5) **Short-Term Residential Programs** provide intensive but relatively brief residential treatment based on a modified 12-step approach. These programs

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were originally designed to treat alcohol problems, but during the cocaine epidemic of the mid-1980's, many began to treat illicit drug abuse and addiction. The original residential treatment model consisted of a 3 to 6 week hospital-based inpatient treatment phase followed by extended outpatient therapy and participation in a self-help group, such as Alcoholics Anonymous. Reduced health care coverage for substance abuse treatment has resulted in a diminished number of these programs, and the average length of stay under managed care review is much shorter than in early programs.

6) **Medical Detoxification** is a process whereby individuals are systematically withdrawn from addicting drugs in an inpatient or outpatient setting, typically under the care of a physician. Detoxification is sometimes called a distinct treatment modality but is more appropriately considered a precursor of treatment, because it is designed to treat the acute physiological effects of stopping drug use. Medications are available for detoxification from opiates, nicotine, benzodiazepines, alcohol, barbiturates, and other sedatives. In some cases, particularly for the last three types of drugs, detoxification may be a medical necessity, and untreated withdrawal may be medically dangerous or even fatal.

2.4 Chiang Mai Drug Dependent Treatment Center

Chiang Mai Drug Dependent Treatment Center belongs to department of medical service, Ministry of Public Health, which has 5 centers in Thailand including Chiang Mai, Maehongson, Songkhla, Pattani and Konkean. Chiang Mai Drug Dependent Treatment Center has purpose for addict treatment of Northern people properly which has duty as following;

2.4.1 Out-patient service

1) Having a physical examination service, giving a prescription for self-treatment at home, Officers give counsel to patient and their relative about drug abuse and behaving while treatment at home. Afterwards, the medical will appointment to diagnostic again depending on symptoms.

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2) Matrix Program is treatment procedure emphasized taking information to patient with activities of rehabilitation group for adjusting behavior of patient. The rehabilitation activities including individual/family consulting, practice to anti drug, the primary of anti drug, giving knowledge to family and prevention to relapse. Period of rehabilitation is four months, three time/week and two hours/time.

3) Methadone Detoxification is treatment method for people addict heroin with methadone using replace detoxify and long term. Patients have medicine in the morning and/or evening.

4) Providing to patient and their relative at Out-patient department and telephone.

5) Providing to addictive substance investigation for students, officer in several organization.

2.4.2 In-patient service

1) Medical Detoxification is service are systematically withdrawn from addicting drugs such as marijuana and heroin for 1 – 3 week. Patients, who are nervous system or mental syndrome such as alcoholism or methamphetamine, could treat with activities continually for 42 days. Medical treatment, would separate patients depend on kind of addictive.

2) Group activities is service for patient who treated with medical detoxification or patient who are not necessary treated with medical detoxification such as patient addicting methamphetamine. Group activities including adjust behavior, self-development (physical, thinking, mental, emotion, social), assisting to back way of life without drug dependent, this process has 42 days.

3) Therapeutic Community approach as one which considers substance abuse a disorder of the whole person – reflecting problems in conduct, attitudes, moods, emotional management and values.

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2.5 Theoretical of drug rehabilitation

2.5.1 Behavioral Therapy

The principle, unwanted behavior can be changed by clear demonstration of the desired behavior and consistent reward of incremental steps toward achieving it. Therapeutic activities include fulfilling specific assignments, rehearsing desired behavior, and recording and reviewing progress, with praise and privileges given for meeting assigned goals. Urine samples are collected regularly to monitor drug use. The therapy aims to equip the patient to gain three types of control:

- Stimulus Control helps patients avoid situations associated with drug use and learn to spend more time in activities incompatible with drug use.

- Urge control helps patients recognize and change thoughts, feelings, and plans that lead to drug use.

- Social Control involves family members and other people important in helping patients avoid drugs. A parent or significant other attends treatment sessions when possible and assists with therapy assignments and reinforcing desired behavior.

It helps adolescents become drug fee and increases their ability to remain drug free after treatment ends. Adolescents also show improvement in several other areas – employment/school attendance, family relationships, depression, institutionalization, and alcohol use. Such favorable results are attributed largely to including family members in therapy and rewarding drug abstinence as verified by urinalysis.

2.5.2 Self-Esteem Theory

Most people's feelings and thoughts about themselves fluctuate somewhat based on their daily experiences. The grade you get on an exam, how your friends treat you, ups and downs in a romantic relationship-all can have a temporary impact on your wellbeing. Your self-esteem, however, is something more fundamental than the normal "ups and downs" associated with situational changes. For people with good basic self-esteem, normal "ups and downs" may lead to temporary fluctuations in how they feel about themselves, but only to a limited extent. In contrast, for people

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with poor basic self-esteem, these "ups and downs" may make all the difference in the world.

People with poor self-esteem often rely on how they are doing in the present to determine how they feel about themselves. They need positive external experiences to counteract the negative feelings and thoughts that constantly plague them. Even then, the good feeling (from a good grade, etc.) can be temporary.

Healthy self-esteem is based on our ability to assess ourselves accurately (know ourselves) and still be able to accept and to value ourselves unconditionally. This means being able to realistically acknowledge our strengths and limitations (which is part of being human) and at the same time accepting ourselves as worthy and worthwhile without conditions or reservations.

Table 2-4 : Healthy self-esteem VS Low Self-Esteem

Healthy Self-Esteem	**Low Self-Esteem**
Childhood experiences that lead to healthy self-esteem include- being praised being listened to being spoken to respectfully getting attention and hugs experiencing success in sports or school having trustworthy friends	**Childhood experiences that lead to low self-esteem include-** being harshly criticized being yelled at, or beaten being ignored, ridiculed or teased being expected to be "perfect" all the time Experiencing failures in sports or school. People with low self-esteem were often given messages that failed experiences (losing a game, getting a poor grade, etc.) were failures of their whole self.

Three Steps to Better Self-Esteem

Before you can begin to improve your self-esteem you must first believe that you can change it. Change doesn't necessarily happen quickly or easily, but it can happen. You are not powerless! Once you have accepted, or are at least willing to entertain the possibility that you are not powerless, there are three steps you can take to begin to change your self-esteem:

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- Step 1: Rebut the Inner Critic
- Step 2: Practice Self-Nurturing
- Step 3: Get Help from Others

Step 1: Rebut the Inner Critic

The first important step in improving self-esteem is to begin to challenge the negative messages of the critical inner voice. Here are some typical examples of the inner critic's voice and how you can "rebut" that voice.

Step 2: Practice Self-Nurturing

Rebutting your critical inner voice is an important first step, but it is not enough. Since our self-esteem is in part due to how others have treated us in the past, the second step to more healthy self-esteem is to begin to treat yourself as a worthwhile person. Start to challenge past negative experiences or messages by nurturing and caring for yourself in ways that show that you are valuable, competent, deserving and lovable. There are several components to self-nurturing:

Practice Basic Self-Care

Get enough sleep, eat in a healthy fashion, get regular exercise, practice good hygiene, and so forth.

Plan Fun & Relaxing Things For Yourself

You could go to a movie, take a nap, get a massage, plant a garden, buy a pet, learn to meditate-whatever you enjoy.

Reward Yourself For Your Accomplishments

You could take the night off to celebrate good grades, spend time with a friend, or compliment yourself for making that hard phone call.

Remind Yourself of Your Strengths & Achievements

One way is to make a list of things you like about yourself. Or keep a 'success' file of awards, certificates and positive letters or citations. Keep momentos of accomplishments you are proud of where you can see them.

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Forgive Yourself When You Don't Do All You'd Hoped

Self-nurturing can be surprisingly hard if you are not used to doing it. Don't be critical of yourself-remember that inner voice!-when you don't do it just right.

Self-Nurture Even When You Don't Feel You Deserve It

"Fake it" until you can "make it." When you treat yourself like you deserve to feel good and be nurtured, slowly you'll come to believe it.

Step 3: Get Help from Others

Getting help from others is often the most important step a person can take to improve his or her self-esteem, but it can also be the most difficult. People with low self-esteem often don't ask for help because they feel they don't deserve it. But since low self-esteem is often caused by how other people treated you in the past, you may need the help of other people in the present to challenge the critical messages that come from negative past experiences. Here are some ways to get help from others:

Ask for Support from Friends

- Ask friends to tell you what they like about you or think you do well.
- Ask someone who cares about you to just listen to you "vent" for a little while without trying to "fix" things.
- Ask for a hug.
- Ask someone who loves you to remind you that they do.
- Get Help from Teachers & Other Helpers
- Go to professors or advisors or tutors to ask for help in classes if this is a problem for you. Remember: They are there to help you learn!
- If you lack self-confidence in certain areas, take classes or try out new activities to increase your sense of competence (for example, take a math class, join a dance club, take swimming lessons, etc.)

Low Self-Esteem May Lead to Drug Abuse in Boys

Melissa Conrad Stoppler, MD (2006) Eleven year-old boys who displayed evidence of low self-esteem were more likely to be dependent upon drugs at age 20

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than boys who didn't have low self-esteem, according to a study conducted at Florida State University.

Sociology professors studied a sample of over 870 boys from diverse racial and ethnic groups for a period of nine years to try to identify potential early warning signs for drug dependence. They asked the boys to rate the truthfulness of statements such as “I feel like I am a failure” and other measures of low self-esteem. The researchers also asked the boys to rate the level of approval their close friends had for people who smoked cigarettes, used marijuana or cocaine, or drank alcohol.

Boys were first interviewed when they were in either sixth or seventh grade, and the participants were subsequently interviewed three more times over a nine-year period. The final follow-up interview took place when most of the boys were between 19 and 21 years old.

The researchers classified “drug dependency” according to the American Psychiatric Association's Diagnostic and Statistical Manual of Mental Disorders. Essentially, the APA defines someone as drug-dependent if he or she exhibits three or more symptoms of dependence, such as using larger and larger amounts of a drug over time, has failed at attempts to stop the drug use, or withdraws from family and friends because of drug use.

Boys who had very low self-esteem in the sixth or seventh grade were 1.6 times more likely to meet the criteria for drug dependence nine years later than other children. Those who believed that their peers approved of alcohol, tobacco, or drug use were also more likely to be drug-dependent later in life. Overall, 10% of those in the study were found to be drug-dependent.

While it is already known that low self-esteem is correlated with drug use in adolescents, this study is important because it suggests that early, measurable factors (low self esteem and belief that their peers approve of drug use) can identify boys at future risk for drug dependence as early as age 11. Early intervention and

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prevention efforts could target potential at-risk boys before they reach their teens, when experimentation with drugs is most likely to begin. Both parents and teachers can be on the lookout for signs of low-self esteem and can even use a simple questionnaire to identify feelings of low self-esteem.

2.6 Related Research

Suzanne Zerger (2002) the validity of self-reported drug use has been an issue examined among populations at high-risk for substance use, but relatively few have focused on homeless substance abusers. Following are two studies which have explored self-reporting validity specifically among homeless cocaine-abusers in substance abuse treatment programs.

For a sample of 179 homeless/transient adults in New York state, self-reports of “current” cocaine use (past 30 days) were compared with results of radioimmunoassay of hair (RIAH). The authors found only 26% of those persons whose hair tested positive for cocaine (n=115) admitted to having used cocaine in the past 30 days. Subjects eligible for treatment, as indicated by a DSM-III-R diagnosis of cocaine dependency, were nearly four times as likely to admit current cocaine use as those who were not dependent. (Appel et.al. 2001)

The validity of self-reported crack cocaine use among 131 homeless persons participating in an outpatient substance abuse treatment research demonstration project was assessed by comparing the concordance of self-report and urinalysis results. The subjects were participants in either a Usual Care outpatient program or an Enhanced Care day treatment program that included drug free contingent work therapy and housing. For all subjects across four evaluation points, the false negative classification by self-report (i.e., denied verified use) rate for crack cocaine use was 32.0%. Denied verified use was greater in Usual Care (34.9%) than in Enhanced Care clients (23.7%) and greater at follow-up as compared to treatment entry for all clients. The findings are explained in terms of social desirability and the influence of treatment contingencies and greater accountability specific to the

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Enhanced Care program. (Schumacher et.al. 1995) These data have implications both for program and research designs for this population.

Bernadette Pelissier et.al. (2000) the results of this 3-year follow-up of residential drug abuse treatment programs suggest important and exciting possibilities for the treatment of inmates with substance abuse problems. Male inmates who entered, received, and completed residential drug abuse treatment were 16 percent less likely to be re-arrested or have their supervision revoked (and be returned to prison) than inmates who did not receive such treatment; the comparable figure for female inmates is 18 percent. This reduction in recidivism is coupled with the 15 percent reduction in drug use for male treated subjects and the 18 percent reduction in drug use for female treated subjects. We also found improved employment among women after release. Women who completed residential drug abuse treatment were employed 68.6 percent of their post-release period and untreated women were employed 59.1 percent of the time. Although the results for recidivism and drug use are not statistically significant for women the sample size of women was smaller, their overall failure rate was lower and there is evidence in the research literature that there are gender differences in treatment needs, treatment processes and relapse. Specifically, it appears that women's drug abuse or dependence is caused by substantially different factors than those for men. Our findings of a lower percentage of women who use drugs and are arrested or revoked after release, despite the greater number of life problems among women, is consistent with results of previous studies.13 The Bureau of Prisons is now modifying our drug treatment programs for females based upon best practices for treatment of females in public and private sector programs. We will continue to monitor progress around the country in enhancing drug abuse treatment paradigms for female offenders and modify our programs accordingly. These results strongly suggest that the Bureau of Prisons' residential drug abuse treatment programs make a significant difference in the lives of inmates following their release from custody and return to the community. This evaluation has been methodologically rigorous and has revealed significant positive effects on recidivism, drug use, and employment in post-release outcomes for a 3-year follow-up period.

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CHAPTER III
RESEARCH METHODOLOGY

This study is qualitative study which done by using In-depth Interview to collect the data from officers of Chiang Mai Drug Dependent Treatment, which is order to a research methodology as following:

3.1 Population and Sampling

3.1.1 Sample group

Researcher specifies the target group, to study from officers of Chiang Mai Drug Dependent Treatment Center including doctors, nurses, psychologists, social workers and activity facilitators 35 persons

The total of 35 officer's commissions took part in in-depth interview. In addition, a case study sample will purposively be chosen from officer's commissions who work in field of drug rehabilitation.

3.2 Research Instrument

Qualitative Data is collected by an in-depth interview from a random sub-sample (n = 35) of subjects identified as the officers who work in field of drug addition treatment. The process of creating the interview question as follow:

3.2.1 Study and review literature related.

3.2.2 Study to social research methodology and finding the reason for questionnaire making.

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3.2.3 Create the interview question to cover following the conceptual framework, for the sample group could response correctly.

3.2.4 Content Validity: taking to the expert who has proved the appropriation and language's instrument, afterward, refine the questions congruently according to the suggestions of the experts to apply in the study.

Interview questions contained

Part I: Personal Background

Part II: Work Experience in the process of drug rehabilitation

Part III: Comprehension of drug abuse and addicted people

Part IV: achievement of drug rehabilitation and related field works

3.3 Data Collection

In this study, the researcher conducted the collection with hand carrying structure of interview; the instrument and the collection of data were built as follows:

3.3.1 Request recommendation letter from Mahidol University and submitted to Chiang Mai Drug Dependent Treatment to ask for collaboration and consent to give an interview.

3.3.2 The researcher explained the objective of the research, including the details of the questionnaire before the collection process.

3.3.3 The researcher interview followed by the main point of structures of interview.

3.3.4 After 50 responses have been collected, the structures of interview were analyzed.

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3.4 Data Analysis

They are divided in two parts as follows:

3.4.1 The personal background: age, responsibility, income, education and training, period of working time, special skills, and alternative activities were analyzed by descriptive data analysis for each subject.

3.4.2 The working experience in drug addition treatment, comprehension of drug abuse, and achievement of drug rehabilitation and related field works were analyzed by the content analysis with integration concept and theories.

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CHAPTER IV
RESULT

From this study with qualitative research, result is presented as follow:

4.1 Background Information

There are 35 respondents, 7 males and 28 females, from officers of Chiang Mai Drug Dependent Treatment Center. The respondents were 27 – 54 years old. The majority of respondents graduated with bachelor degree. Most of graduated field was bachelor of nursing science, doctor of medicine and the other related fields. Most of them were nurse, doctor and the officers of medicine/educational/special nurse, psychologist and sociologist. All were hometown in the North of Thailand, having income per month from 15,000 to 35,000 baths and special income was 2,500 baths per month. Most of them were 5 – 20 years of work period and 10 – 20 years of working at Chiang Mai Drug Dependent Treatment Center. The majority of respondents were married. They lived in the government resident for 29 respondents and lived in the other for 6 respondents.

4.2 Work experience for drug rehabilitation

4.2.1 The opinion of drug dissemination

The respondents described most of drug dissemination groups are labors and night workers. There are rapid spreading of drug in juveniles with persuading and directing from their peers. Drug abuse is famous in the lower-class are methamphetamine, volatile, ICE and others.

4.2.2 Cause of drug addictive

There are several causes such as problem of family, personality, deviance behavior, wrong fostering, family interaction, impetuous and curiosity. There are

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physical causes such as using drug for curing. Drug abuse treated psychological symptom such as stress and poor.

4.2.3 Method of addict's rehabilitation

Chiang Mai Drug Dependent Treatment Center has 2 phases of drug rehabilitation as follow:

(1) Withdrawal symptoms: taking drug for curing, look after patience to safe from withdrawal symptom and closely patience to self-care.

(2) Efficiency rehabilitation: group treating, activities joining, caring the physical and psychological of patient to cooperate with interdisciplinary.

4.2.4 Drug treatment with medical science equipments

The equipment of medical science is taken for the patience in withdrawal phase such as Vital Sign Patient Monitor and Operation process. Patients in efficiency rehabilitation phase were treated with psychological more than physical, which is the behavioral treatment, not use the equipments but patients who have physical symptoms would be investigated by doctor such as lung X-ray for drug toxic protecting, blood and urine for level examination and inform patient to know the danger of drug abuse.

4.2.5 Drug control and compound medicine for drug rehabilitation

Chiang Mai Drug Dependent Treatment Center uses

(1) Tr. Opium treats Methadone' patient and Heroin' patient

(2) Love Program treats alcoholism

(3) Anti-depressant treats patient who has mental symptoms interfere.

4.2.6 Method of treatment

Chiang Mai Drug Dependent Treatment Center uses TC method with In-patient, which is social model adapt to behavior for patient back to live in community pleasantly without drug dependence.

Matrix Program is a treatment of physical, mental and social style, which is behavioral adaptation. It is taken to treat out-patient.

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Fast Model is pattern and method same as TC method and Matrix Program, reduce the period of treatment for 4 months.

4.2.7 Strengthen and weakness of treatment

TC method is treatment for a long time, effecting to patient who have duty and working cannot to treat with this program thoroughly including government has ineffectual cost for activities. Fast model is similarity; it is rapidly program effect to patient cannot adapt their behavior. However, Fast model is effectively for someone because it proper for individual.

4.2.8 Patient information from people related

It is important to receive the information of patient from their cousin, village chief or village headman to cooperate for treatment, influence to Chiang Mai Drug Dependent Treatment Center operates correctly and sequence method is efficiency.

4.2.9 The other method

It is nothing other method for Chiang Mai Drug Dependent Treatment Center and officers because the present method is most efficiency.

4.2.10 The treated repetitive patient

Chiang Mai Drug Dependent Treatment Center and officers found that some patients were treated repetitively because

(1) The first time of treatment is not voluntary, may be forced by their cousin or inebriant affecting the patient against.

(2) Patient back to the community spread out drug abuse and persuaded by their peer because of the weakness patient.

(3) Patient's family and intimate person cannot care them closely.

(4) Patient needs to avoid drug abuse.

4.3 Knowledge of drug abuse and narcotics information

4.3.1 Drug abuse comprehension

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Most of respondents describe “drug abuse” is cigarette, alcohol, coffee, hypnotics or volatile substances including substance was consumed continuously, affect to have withdrawal symptoms when deprived of drug.

Drug abuse is substance effect to nervous and physical severely such as Heroin, methamphetamine, ICE, Ecstasy.

However, the center officers have a lot of knowledge and comprehension related with drug abuse, which’s differ from patient not rather understand about drug abuse, then necessary the related officers have to take correct information increasingly.

4.3.2 Distinctiveness between drug abuse and addictive substance

Most patients cannot distinguish drug abuse and addictive substance exactly because they have knowledge and experience about drug abuse differently. They view both is addictive, effecting not know danger of drug abuse. Officials related should highlight, distinguish and demonstrate the danger and spreading of drug abuse, so that restrain this problem and relieve the violent problem. Otherwise, Chiang Mai Drug Dependent Treatment Center has more tasks to treat patient.

4.3.3 Kind of drug abuse is most important affecting to drug abuse was found in patient

Cigarette is gate way affect to most patient access drug abuse process because it’s learning, testing, satisfactory, easy to access and non-illegal. Moreover, alcohol is addicted substance to supplement general people relate with drug abuse because norm and opinion of some people regard alcohol reduce stressful, although, alcohol effect to loss conscious, and reduce perceivable.

4.3.4 The early priority of drug abuse in Chiang Mai Drug Dependent Treatment Center

There are methamphetamine, heroin, alcohol, volatile, marijuana, ICE and ecstasy

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4.3.5 Prevention, Suppression, Solve problem and rehabilitation

Most officers of Chiang Mai Drug Dependent Treatment Center think about the prevention is best solving problem, but the other method such as suppression, solving problem and rehabilitation have to join together. In addition, government has to create the strengthen operation in some section to proper for severely spreading of drug abuse.

4.3.6 Tendency and alternative of drug abuse

Most officers of Chiang Mai Drug Dependent Treatment Center think about tend of drug abuse changing from the present kind to the re-compound kind but there are changing about method such as change from liquid to grain. Southern of Thailand uses Kra-tom mix with mosquito-repellent. North of Thailand is not change method because location close source of procedure.

4.3.7 Drug abuse in Northern and Chiang Mai

Most officers of Chiang Mai Drug Dependent Treatment Center think about problem of drug abuse cannot get rid of absolutely but enable controlling not severity for social overabundant. The continually suppression and rehabilitation have to operate together. If government is not decisive to suppress, it would spread out increasingly.

4.3.8 Norm, attitude, custom, traditional and way of life of the mountain Thais related with drug abuse

It was found that which's found in the previous time, the mountain Thais believe that opium is medicine which's eat and suck for curing disease, later, they distribute and trade, including the geography of area is properly and there are capitalists from Thai people support to distribution and drug agency. Therefore, it become the way of life and not entirely.

4.3.9 Reason of addictive people

There are several reason to be addictive such as mental weakness, family, stressful, poverty, lack of dependence, curiosity, these are beginning reason. The

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other reasonable are needs to rich and powerful. Someone consume severity until back to addict repetitive.

4.3.10 Kind of alcohol which's patient drink

Rice whisky, beer and other drink with drug abuse affect to be good taste and emotion well.

4.4 Evaluate the whole of treatment successful

4.4.1 Knowledge, skill and experience of officers of Chiang Mai Drug Dependent Treatment Center

There should develop the potential increasing become outstanding in local area. Organization related should support the academic, specialist and budget, affecting enhance the center to operate successful in the high level. Chiang Mai Drug Dependent Treatment Center should be raised in Asian.

4.4.2 Needs of patient

It was found that Chiang Mai Drug Dependent Treatment Center is dependence and was accepted from patient and their cousin although someone consumes drug abuse repetitively because of surrounding and community.

4.4.3 Level of knowledge, competency and experience of officers

From study, it was found that most officers have knowledge competency and work experience for a long time. They are intimate, proficiently and a good perception in rehabilitation. Executive and administrators have policy for personal development affect to officers have equal opportunity to development. Moreover, there are many experts in multidisciplinary to take knowledge and consulting. Overall, most of them have knowledge, ability and experience in high level when recognize in successful of rehabilitation.

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4.4.4 Academic, training and knowledge of officers relate Addictionology

From study, it was found that most officers need to add knowledge involve Addictionology with several method such as education, observe training and further study because this field is changing and developing all time according with amount of patient to increase.

4.4.5 Satisfactory of officer's task

From study, it was found that most officers' work in a good level, which's view from patient's satisfactory and patients are better health both physical and mental. In addition, Officers and Chiang Mai Drug Dependent Treatment Center are received skill, experience and reliability from patient, people and the other organization increasingly.

4.4.6 Evaluate patient to rehabilitation and stop drug abuse

From study, it was found that officers treat patient intimately affect to know patient stop drug or addict drug continually. In addition, patients who were supported from family and community affect to stop drug rapidly. Particularly, patient become good quality of life but if they were ignore affect to the same surrounding and cannot avoid the cycle of drug abuse.

4.4.7 Management with drug abuse problem

Most officers of Chiang Mai Drug Dependent Treatment Center think that should solve problem with based on prevention and suppression as well as rehabilitation together affect to problem of drug abuse are controlled in the proper level.

4.4.8 War of narcotic with working of Chiang Mai Drug Dependent Treatment Center

From study, it was found that declaration of narcotic war affected to increase the duty of Chiang Mai Drug Dependent Treatment Center. It a good solution because separate between drug agent and addictive people into the criminal

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justice and rehabilitation process, which help patient to avoid the dangerous situation, withdrawal symptom and treatment process. Some patients can stop drug or reduce amount of drug and give opportunity for addictive people.

4.4.9 Amount of patient to increase with result of rehabilitation

From study, it was found that amount of patients are not effect to treat of Chiang Mai Drug Dependent Treatment Center because the treatment process is guarantee, standardization and distinctiveness procedure. However, if amount of patients are more increasing, the center will find the officers proper for patient.

4.4.10 The Balance between patient and officers/ equipment/ budget of center

From study, it was found that the balance between patient, officers and equipment is sufficient for working but there's less budget particularly, supporting develop patient monitoring and budget for further study to officers.

4.5 Problem and Obstacle to operate, Needs, Solving problem and recommendation

4.5.1 Need academic both Thailand and aboard related with Addictionology

From study, it was found that foreigner interest to access the treatment program, educating and observing activities increasingly. At the same time, knowledge of addictionology is diversity including the process of treatment early was developed and sharing information with seminar, conferences, educating and observing activities, so it's most necessary because personnel can take the information to adapt with tasks of Chiang Mai Drug Dependent Treatment Center effectively.

4.5.2 Need budget, administrator, office, academic and technology, special compensation, progression and profession stability

Its necessary the budget to work for convenient, instantly and harmonization. Chiang Mai Drug Dependent Treatment Center needs budget for support to work in center including the special compensation, progressive, the stable in profession and courage

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4.5.3 Solving problem and obstacle

Solving problem of these are officers in Chiang Mai Drug Dependent Treatment Center plan to work together, strategic determination, conferential cooperation to solving problem, find to way for solving problem, adapting some process which's obstacle, as well as present the executive for finding the method to solve problem.

4.5.4 Problem of law enforcement with working

It's not appear the problem of low enforcement because officers of Chiang Mai Drug Dependent Treatment Center serve patient under vision of helping person, not suppress or arrest. There are some problem is related such as patient was not have document or identity-card, medical fee and secret of patient.

4.5.5 Reducing duty of officers of Chiang Mai Drug Dependent Treatment Center

It was found that there is several privacy centers working to help addictive patient including these centers are positive working. However, working of privacy center has to be controlled by government intimately.

4.5.6 Recommendation about Public Heath Department

Sometimes Chiang Mai Drug Dependent Treatment Center should work with patient closely. Public Health Department should support the several convenient such as budget, specialist and other for working comfortable and rapidly including create the network of patient cared effect to working efficiency.

4.5.7 Element of rehabilitation process

Most officers of Chiang Mai Drug Dependent Treatment Center think about the elements of rehabilitation process such as knowledge, ability, carefully and intention of patient. In addition, there should make a network for careful continually affect to increase effectiveness including family cooperation.

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4.5.8 Social and family with rehabilitation

From study, Social and family should cooperate to treat patient but in practice, social and family are not interest because they think it is duty of center, so it's problem. In addition, part of social and family reject to help especially the low class people including social lack of potential and preparation to support.

4.5.9 Procedure, drug agent with Chiang Mai Drug Dependent Treatment Center

It was found that producer and drug agent related with patient such as visiting patient and as patient's cousin but it's not appear about drug merchant or threaten the officers of Chiang Mai Drug Dependent Treatment Center.

4.5.10 Needs of officers to treatment successful

Needs of officers to treatment successful are primary needs to live, position, idealistic rehabilitation as well as someone need working courage and claim compensation increasing follow the economic condition.

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CHAPTER V
DISCUSSION

This study is determined to find out cause “Achievement of drug rehabilitation at Chiang Mai drug dependent treatment center”, the discussion as follow:

5.1 Background information

From study, it was found that most respondents are female, graduated with bachelor of nurse and take special course related with rehabilitation because officers who work at Chiang Mai Drug Dependent Treatment Center should have competency, experience and sacrifice for working including team header is doctor who has knowledge related with physical, mental and rehabilitation fields. In addition, the others officers are psychologist, sociologist and other, these are necessary elements for working successful of Chiang Mai Drug Dependent Treatment Center. There are someone is senior officers, which’s they have more knowledge, experience and skill affect to useful extremely for organization. As well as there are nurse who’re junior reducing affect to success development of organization in the future. Moreover, the portion between officers and patient are not balance, officers is less than patients.

5.2 Work experience for drug rehabilitation

The officers think about most of drug dissemination groups are labors, night workers and rapid spreading in juvenile. The spreading of drug abuse will increase severity because officers related lack of careful and suppress seriously

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including patient is weakness to drug abuse affect to drug spreading is movement following social mobility.

Cause of patient addicted drug abuse is family problem, poverty, stressful, parenting problem, aggressive, curiosity, need to rich, peer persuade and the mountain Thais has traditional related with drug consumer, these are reasonable which officers found as operation matching with the research of academicians.

Chiang Mai Drug Dependent Treatment Center has 2 phases of drug rehabilitation, first, withdrawal symptoms; look after patience to safe from withdrawal symptom and closely patience to self-care, second, efficiency rehabilitation; group treating, activities joining, caring the physical and psychological of patient to cooperate with interdisciplinary

Drug treatment with medical science equipments, it was found that there are equipments of medical science are taken for the patience in withdrawal symptom. However, the operations of Chiang Mai Drug Dependent Treatment Center is a rehabilitation process, then knowledge, skill, and carefully are necessary more than equipments of medical science affect to the center success in rehabilitation process with administrators who have knowledge and skill for treatment in the early priority.

Drug control and compound medicine for drug rehabilitation, it was found that Chiang Mai Drug Dependent Treatment Center uses Tr. Opium treats Methadone' patient and Heroin' patient, Love Program treats alcoholism and Anti-depressant treats patient who has mental symptoms interfere. In addition, Chiang Mai Drug Dependent Treatment Center uses TC method with In-patient, which is social model adapt to behavior for patient back to live in community. Matrix Program is a treatment of physical, mental and social style, which is behavioral adaptation. It is taken to treat out-patient. Fast Model is pattern and method same as TC method and Matrix Program, reduce the period of treatment for 4 months.

Strengthen of center are full of administrators who have knowledge, skill and experience. Weakness of center are TC method is treatment for a long time, effecting to patient who have duty and working cannot to treat with this program thoroughly including government has ineffectual cost for activities. Fast model is similarity; it is rapidly program effect to patient cannot adapt their behavior. However, Fast model is effectively for someone because it proper for individual

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It is important to receive the information of patient from their cousin, village chief or village headman to cooperate for treatment, influence to Chiang Mai Drug Dependent Treatment Center operates correctly and sequence method is efficiency.

It is nothing other method for Chiang Mai Drug Dependent Treatment Center and officers because the present method is most efficiency. In addition, it was found that some patients were treated repetitively because the first time of treatment is not voluntary, may be forced by their cousin or inebriant affecting the patient against. Patient back to the community spread out drug abuse and persuaded by their peer because of the weakness patient. Patient's family and intimate person cannot care them closely. Patient needs to avoid drug abuse.

5.3 Knowledge and comprehension related with drug abuse and addictive substance

Addictive substance and drug abuse is differential but general people assume both are same. The researcher needs to test the correct knowledge and comprehension of officers of Chiang Mai Drug Dependent Treatment Center. It was found that officers described "addictive substance" is substance was consumed affect to negative effective to physical and mental, including are gate way to drug abuse affect to consumer has addictive symptoms. Drug abuse is substance was consumed affect to brain, nervous and physical extremely including negative effective. Officers of Chiang Mai Drug Dependent Treatment Center have more notice that all organization related should inform knowledge to social for distinguish and identify the result or danger of drug abuse and prevention and suppression exactly.

Result of understanding distortion affect to patient cannot distinguish violent of addictive substance correctly such as cigarette and alcohol, these were viewed usual in lifestyle, volatile and drug abuse are way out of life. Therefore, officers of prevention and suppression should recognize and solving problem.

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Kind of drug abuse is most important affecting to drug abuse was found in patient such as cigarette because it is gate way to test, learn, satisfy, easy to access, non-illegal and less limitation. Alcohol is allurement non-severely, is way to drug abuse cycle, so the official related should restrain cigarette and alcohol. The early priority of drug abuse in Chiang Mai Drug Dependent Treatment Center is methamphetamine, heroin, alcohol, volatile, marijuana, ICE and ecstasy.

Most of officers of Chiang Mai Drug Dependent Treatment Center think about the prevention is best solving problem, but the other method such as suppression, solving problem and rehabilitation have to join together. In addition, government has to create the strengthen operation without scare to blame about violate right because the serious suppression affect to useful for public more than severity spreading.

Most of officers of Chiang Mai Drug Dependent Treatment Center think that it's nothing about tend of drug abuse changing from the present kind to the re-compound kind but there are changing about method such as change from liquid to grain.

The mountain Thais have norm, attitude, traditional and custom related with drug abuse, which's found that in the previous time, they believe that opium is medicine which's eat and suck for curing disease, later, they distribute and trade, and then it's adapted from raw marijuana to powder, grain or liquid become to trade illegal. However, some mountain Thais affirm the old believe affect to plant, procedure, distribution and addiction not entirely.

Most reasonable of drug addiction are mental weakness of patient, family, social, stressful, poverty, lack of dependent and curiosity, these are beginning reason. The other reasonable are needs to rich and powerful. Someone consume severity and cannot treat and relieve until ruining.

Kind of alcohol which's patient drink and tend to danger for physical and social such as rice whisky, beer, sake etc., something drink with drug abuse affect to be good taste and emotion well.

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5.4 Evaluate the whole of treatment successful

From study, it was found that knowledge, skill and experience of officers of Chiang Mai Drug Dependent Treatment Center is a good level because operation, accomplishment and honors were accepted from organization related and others. There should develop the potential increasing become outstanding in local area. Organization related should support the academic, specialist and budget, affecting to enhance the center to operate successful in the high level.

From the interviewing respondents, found that Chiang Mai Drug Dependent Treatment Center is dependence of patient and their cousin, especially to help in treatment well. Most patients access voluntary treatment.

The level of knowledge, ability and experience of officers in Chiang Mai Drug Dependent Treatment Center, found that most of them have knowledge, ability and experience in high level, including intimately, skill and a good of careful attitude. Executive and administrators have policy for personal development. Moreover, there are many experts in multidisciplinary to take knowledge and consulting.

Most of officers in Chiang Mai Drug Dependent Treatment Center need knowledge about addictionology, rehabilitation, solving problem and treatment from international level such as further study and observe activities because now academic in this field change and develop all time.

Most of officers in Chiang Mai Drug Dependent Treatment Center satisfy in their tasks, especially successful of treatment, rehabilitation of patient both physical and mental to change well. Officers and Chiang Mai Drug Dependent Treatment Center are received skill, experience and reliability from patient, people and the other organization increasingly.

Chiang Mai Drug Dependent Treatment Center evaluates and follows up the result of working with patient intimately, affecting to know most patient stop drug. In addition, patients who were supported from family and community, helping

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stop drug rapidly, particularly, become well quality of life but if they were ignore affect to the same surrounding and cannot avoid the cycle of drug abuse.

Most officers of Chiang Mai Drug Dependent Treatment Center think that should solve problem with based on prevention and suppression as well as rehabilitation together affect to problem of drug abuse are controlled in the proper level.

From study, it was found that amount of patients are not effect to treat of Chiang Mai Drug Dependent Treatment Center because the treatment process is guarantee, standardization and distinctiveness procedure. The more patients are controlled in a good level, and balance between amount of patients and officers but there are problem of budget and education development related with treatment and rehabilitation.

5.5 Problem and Obstacle to operate, Needs

From study, it was found that foreigner interest to access the treatment program, educating and observing activities increasingly. At the same time, knowledge of addictionology is diversity including the process of treatment early was developed and sharing information with seminar, conferences, educating and observing activities, so it's most necessary because personnel can take the information to adapt with tasks of Chiang Mai Drug Dependent Treatment Center effectively.

Chiang Mai Drug Dependent Treatment Center needs budget for support to work in center including the special compensation, progressive, the stable in profession and courage.

There are several task problems such as loaded task, lack of specialist, lack of budget and confliction of bureaucracy system. Solving problem of these are officers in Chiang Mai Drug Dependent Treatment Center plan to work together, strategic determination, conferential cooperation to solving problem, find to way for

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solving problem, adapting some process which's obstacle, as well as present the executive for finding the method to solve problem.

It's not appear the problem of low enforcement because officers of Chiang Mai Drug Dependent Treatment Center serve patient under vision of helping person, not suppress or arrest. There are some problem is related such as patient was not have document or identity-card, medical fee and secret of patient.

Chiang Mai Drug Dependent Treatment Center can relieve tasks of the privacy center, which's found that there is several privacy centers working to help addictive patient including these centers are positive working. However, working of privacy center has to be controlled by government intimately.

Chiang Mai Drug Dependent Treatment Center should work with patient closely. Ministry of Public Health should support the several convenient such as budget, specialist and other for working comfortable and rapidly including create the network of patient cared effect to working efficiency.

Social and family should cooperate to treat patient but in practice, social and family are not interest because it regards to center, so it's problem. In addition, it was found that producer and drug agent related with patient such as visiting patient and as patient's cousin but it's not appear about drug merchant or threaten the officers of Chiang Mai Drug Dependent Treatment Center.

Needs of officers to treatment successful are primary needs to live, position, idealistic rehabilitation as well as someone need working courage and claim compensation increasing following the economic condition.

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CHAPTER VI
CONCLUSION

The study of “Achievement of drug rehabilitation at Chiang Mai drug Dependent treatment center” Concluding the result of study as follow;

The objectives of this research were to study the pattern of addictive rehabilitation and achievement rehabilitation in Chiang Mai Drug Dependent Treatment Center.

From study, it was found that there are 35 respondents, 7 males and 28 females. The respondents were 27 – 54 years old. The majority of respondents graduated with bachelor degree. Most graduation was bachelor of nursing science and doctor of medicine. Most duty of officers is medicine personnel. Most work experiences of officers are 8 – 15 years.

Drug dissemination in down town of Chiang Mai are juvenile, labors and night working. Most causes is not forced or threatened but they are curiosity, persuade and hard working. Popular drugs are volatile, methamphetamine and marijuana including drug is experience and rare to fine such as ICE and ecstasy. Drug dissemination in suburb of Chiang Mai and neighboring town is the mountain Thais, they use drug for relieve disease and relaxation.

Causes of drug addictive are family problem, personality problem, impetuously, peer persuade and illness of physical and mental.

The method of rehabilitation is 2 phases such as withdrawal symptom and efficiency rehabilitation. Officers uses TC method with in-patient for along time and

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waste of time and cost including some patients are not prepare to treat. In addition, they treat out-patient with Fast Model.

It is important to receive the information of patient from their cousin, village chief or village headman to cooperate for treatment, influence to Chiang Mai Drug Dependent Treatment Center operates correctly and sequence method is efficiency.

There are some repetitive patient because the first time of treatment is not voluntary, may be forced by their cousin or inebriant affecting the patient against.

Officers of Chiang Mai Drug Dependent Treatment Center have a good level of knowledge and comprehension related with drug abuse and addictive substance but general people, community and social not understand affecting to increase drug dissemination such as cigarette which's gate way of drug abuse. Most patient think cigarette is illegal but the academician think about someone smoking is risk group to drug addictive.

Most of officers of Chiang Mai Drug Dependent Treatment Center think about the prevention is best solving problem, but the other method such as suppression, solving problem and rehabilitation have to join together.

Most of officers of Chiang Mai Drug Dependent Treatment Center think that it's nothing about tend of drug abuse changing from the present kind to the re-compound kind but there are changing about method such as change from liquid to grain.

The mountain Thais have norm, attitude, traditional and custom related with drug abuse affect to drug addictive not entirely but controlled in the proper level. Cause of patient addicted drug abuse is family problem, poverty, stressful, parenting problem, aggressive, curiosity, need to rich and peer persuade.

Kind of alcohol which's patient drink and tend to danger for physical and social such as rice whisky, beer, sake etc., something drink with drug abuse affect to be good taste, emotion well and not expensive. Therefore, the related organization has to campaign the danger of drug abuse increasingly.

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Overall, Chiang Mai Drug Dependent Treatment Center success to rehabilitation process including mission, knowledge and experiences of officers, working of center and was accepted in Asian.

It was found that Chiang Mai Drug Dependent Treatment Center is dependence of patient and their cousin, especially to help in treatment well. Most patients access voluntary treatment.

The level of knowledge, ability and experience of officers in Chiang Mai Drug Dependent Treatment Center, found that most of them have knowledge, ability and experience in high level, including intimately, skill and a good of careful attitude.

It was found that most officers need to add knowledge involve Addictionology with several method such as education, observe training and further study because this field is changing and developing all time according with amount of patient to increase.

The amount of patients increasing is not problem to rehabilitation process because it is standard and process exactly. Therefore, both quantitative and qualitative are controlled by medical team.

6.1 Problem and Obstacle to operate, Needs

Knowledge of addictionology is diversity including the process of treatment early was developed and sharing information with seminar, conferences, educating and observing activities, so it’s most necessary because personnel can take the information to adapt with tasks of Chiang Mai Drug Dependent Treatment Center effectively.

It’s necessary the budget to work for convenient, instantly and harmonization. Chiang Mai Drug Dependent Treatment Center needs budget for

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support to work in center including the special compensation, progressive, the stable in profession and courage

Executive and administrators have policy for solving problem including there are many experts in multidisciplinary to take knowledge and consulting. It's not appear the problem of low enforcement because officers of Chiang Mai Drug Dependent Treatment Center serve patient under vision of helping person, not suppress or arrest. There are some problem is related such as patient was not have document or identity-card, medical fee and secret of patient.

6.2 Recommendation

There should support further knowledge for administrators with observe activities, further study, training and sharing information from the intuited both local and aboard.

Ministry of Public Health should give precedence to Chiang Mai Drug Dependent Treatment Center because here is both theoretical working and practical working. Therefore, successful of work depend on proliferate of rehabilitation process that enable stop drug abuse cycle exactly.

In additional, Ministry of Public Health should considers special compensation, progressive of administrators, stable of profession and working courage because these working have to use high potential such as knowledge, skill, patience, risk to work and experiences.

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http://www.nida.nih.gov/PODAT/PODATindex.html

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APPENDIX

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Part 1: Background information

1. Gender
- ❑ 1. Male
- ❑ 2. Female

2. Age……..Years

3. Education
- ❑ 1. Vocational
- ❑ 2. Bachelor degree
- ❑ 3. Master degree
- ❑ 4. Doctor degree

4. Graduated with……

5. Position/Operation work…….

6. Training/special education……..

7. Hometown
- ❑ 1. Bangkok
- ❑ 2. North
- ❑ 3. Central
- ❑ 4. South
- ❑ 5. East
- ❑ 6. West
- ❑ 7. Northeastern

8. Income/month
- ❑ 1. 5,000 – 15,000 bath
- ❑ 2. 15,000 – 25,000 bath
- ❑ 3. 25,000 – 35,000 bath
- ❑ 4. Higher 35,000 bath

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9. Special income/month
- ❑ 1. No
- ❑ 2. 3,000 – 5,000 bath
- ❑ 3. 5,000 – 10,000 bath
- ❑ 4. Higher 10,000 bath

10. Period of work
- ❑ 1. 1-5 years
- ❑ 2. 5-10 years
- ❑ 3. 10-15 years
- ❑ 4. 15-20 years
- ❑ 5. Higher 20 years

11. Period of work at the center
- ❑ 1. 1-6 months
- ❑ 2. 6-12 months
- ❑ 3. 12-24 months
- ❑ 4. Higher 24 months

12. Marital Status
- ❑ 1. Single
- ❑ 2. Marriage and together
- ❑ 3. Marriage and separate
- ❑ 4. Divorce

13. Resident
- ❑ 1. Governmental resident
- ❑ 2. Other

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Part 2 : Work experience with drug rehabilitation

1. Opinion about drug dissemination such as addictive people, drug agency and other

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2. What do you think about causes of drug addictive?

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Describing about your work with drug rehabilitation

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3. How do you use equipment of medical science for rehabilitation?

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Describing about medicine and compounding medicine for rehabilitation of the center

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4. What about method do you treat? (TC, Matrix etc.)

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5. What strengthen and weakness about the method do you treat?

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6. What do you think about receiving the patient's information from their cousin, head of village, police or organization of local for drug rehabilitation?

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7. Do you use the other method except the above mention? (For example)

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8. How many the repetitive patient have you ever seen? And what's reason?

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Part 3 : Knowledge and Comprehension of drug abuse and addictive substance

1. How do you mean drug abuse such as definition, addictive substance, and attitude to drug abuse?

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2. Can patient of the center distinguish between drug abuse and addictive substance?

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3. What drug abuse do you think it’s most important and affecting to patient?

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4. What drug abuse do you found in the early priority of the center? (ordering follow the level of danger)

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5. What do you think the government should manage and solving problem to drug abuse? (prevention, suppression, solving problem, rehabilitation)

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6. What do you think drug abuse tend to adapt or change into a new kind of drug? (new methamphetamine)

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7. Chiang Mai is a central of Northern affecting cannot solve problem drug abuse absolutely, what do you think of causes?

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8. What do you think about the mountain Thais who hold norm, traditional and attitude which's related with drug abuse affecting to most patients are the mountain Thais more than the general Thai?

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9. What do you think about causes of addictive people? (Social, curiosity, force to consume, drug agency or procedure)

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10. What kind of alcohol which's most patient access to treat? (Whisky, rice whisky, beer, sake, etc.) and tent to danger increasing

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Part 4 : Evaluate the whole of treatment successful

1. What do you think about administrators of center should develop involve knowledge, skill and experiences of drug rehabilitation same as Malaysia, Singapore, Indonesia?

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2. What do you think about opinion of patient that the serving of center cannot treat absolutely?

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3. What do you think about the quality of administrators related with knowledge, ability, experiences? (good, moderate)

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4. What do you think about adding knowledge involves Addictionology with several method such as education, observe training and further study?

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5. Do you satisfy about your work with rehabilitation?

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6. Can do you evaluate about patient stop or relieve drug abuse?

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7. What do you think about working of the center is solving the end problem?

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8. What do you think about war of drug abuse affecting to work of the center increasing?

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9. What do you think about if patients are increasing affect to reduce the success of rehabilitation?

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10. What do you think amount of patient proper for administrators, equipment, budget which's most success of rehabilitation?

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Part 5 : Problem and Obstacle to operate, Needs, Recommendation

1. Do you want to addition knowledge from local and foreign about Addictionology and rehabilitation?

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2. What do you think about need to budget, special compensation, progressive, the stable in profession and courage?

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3. What do you think about problem and Obstacle to operate, Needs, Solving problem and recommendation?

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4. Do you think about the center has problem of law enforcement?

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5. What do you think about private rehabilitation?

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6. What do you think about related organization?

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7. What do you think about most elements effect rehabilitation successful?

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8. What do you think family and social support with rehabilitation and their potential?

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9. What do you think about drug agent relate patient or administrators?

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10. What do you need for rehabilitation successful?

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BIOGRAPHY

NAME	Mr. Rattapoom Chairangsi
DATE OF BIRTH	15 January 1976
PLACE OF BIRTH	Chonburi Province
INSTITUTES ATTENDED	Ramkhamheang University Bachelor of Art (Mass Media) Mahidol University Master of Arts (Addictionology)
POSITION AND OFFICE	Business
RESEARCH GRANT	This thesis is partially supported by Graduate Studies of Mahidol University Alumni Association

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