

An Overview of Drug Abuse and Dependence

Psychological dependence/addiction

- ♦ When the individual reaches a point in his/her use of the substance that they feel uncomfortable if the substance is not available, it is possible that they have developed psychological dependence or addiction.

Physical dependence/addiction

- ♦ Physical dependence is documented when a high enough dose of a substance has been taken for a long enough period of time that reduction of intake or cessation of substance use produces the predictable withdrawal or abstinence syndrome.

Tolerance

- ♦ The individual takes enough of the drug on a regular basis so that he or she can tolerate higher and higher doses of the substance without showing a marked increase in effects.

The Dependence Syndrome

- ♦ Achieved when an individual demonstrates a series of problems that indicate loss of control over use of the substance.

The elements of the syndrome include repeated intake of the substance despite associated adverse consequences, aspects of tolerance, evidence of a withdrawal or abstinence syndrome, and a general indication that the pattern of use of the substance has become somewhat rigid in its character and is a central focus of the individual's life.

Depressants

- ◆ The depressants are drugs that have as their prominent effects at the usual dose:
 - a decrease in central nervous system (CNS) activity
 - feelings of sleepiness
 - a decrease in the perception of some feelings of anxiety
 - no preeminent painkilling effects

Stimulants

- ◆ The stimulants are drugs that have as their prominent effects at the usual dose:
 - an enhancement of CNS activity with an associated decreased appetite,
 - decreased need for sleep
 - increased levels of energy
 - increased abilities to concentrate
- These drugs are also associated with a feeling of euphoria.

Opiates

- ◆ The opiates are drugs that have as their prominent effects at the usual dose:
 - a decrease in the perception of pain
- ◆ These drugs are also somewhat sedating and associated with a floating sensation type of euphoria.

Cannabinols

- ◆ At the usual doses, the cannabinols are drugs that produce:
 - an increase in appetite
 - a floating type of euphoria
 - a marked change in the perception of time

Hallucinogens

- ♦ The hallucinogens are a group of substances that produce at the usual dose a marked enhancement of sensory perceptions and misperceptions.

Phencyclidine (PCP)

- ♦ Phencyclidine (PCP), when taken at the usual doses, produces effects similar to those produced by the hallucinogens. However, PCP is markedly different in structure from the hallucinogens, and even at moderate doses is capable of producing a severe agitated confusion, an effect which also distinguishes this drug from the hallucinogens.

Inhalants/Solvents

- ♦ The inhalants or solvents are a group of substances capable of dissolving fats, that have as their usual effect a mild excited confusion.

Others

Clinical Considerations

Overdose / Toxic Reaction

An overdose or toxic reaction involves such a marked decrease in vital signs that the patient is likely to die without immediate medical attention.

Treatment involves offering general life supports, using medications and procedures to counteract the major effects of the drugs, and usually allowing the body to metabolize the drug.

Abstinence Syndrome / State of Withdrawal

Abstinence syndrome or state of withdrawal is to be diagnosed when a patient's vital signs are not to the critical point (i.e., who does not have an overdose), demonstrates one of the three classical withdrawal syndromes mentioned before.

Abstinence syndrome is different for different substances:

- ♦ Depressants: insomnia, agitation, an increase in pulse/respiratory/blood pressure/body temperature, a tremor, and, in less than 5% of cases, convulsions or delirium.
- ♦ Opiates: agitation, insomnia, a runny nose and cough, diarrhea, and pain in muscles/joints/skin, etc.
- ♦ Stimulants: sleeping too much, eating too much, and depression.

Organic Brain Syndrome (OBS)

A state of confusion or an organic brain syndrome (OBS) is diagnosed in association with a drug when there is no evidence of an overdose or withdrawal syndrome but the individual is demonstrating a decrease in cognitive or thinking abilities and an interference with memory.

Psychosis

Psychosis is diagnosed when an individual develops hallucinations (unreal sensory perceptions) and/or delusions (psychotic, crazy thoughts) without insight, but is not:

- in an overdose
- in obvious withdrawal
- not terribly confused

Depression / Anxiety

Patients who demonstrate a significant level of depression (often seen with depressant intoxication and stimulant withdrawal) or severe states of anxiety (often seen with depressant withdrawal or stimulant intoxication) are demonstrating these syndromes in the absence of any of the additional syndromes described before.

Clinically Significant Drug Problems by Category

	Panic	Flashbacks	Overdose	Psychosis	OBS	Withdrawal
Depressants	-	-	++	++	++	++
Stimulants	+	-	+	++	+	++
Opiates	-	-	++	-	+	++
Cannabinols	+	+	+	-	+	-
Hallucinogens	++	++	+	-	+	-
Solvents	+	-	+	-	++	-
PCP	+	?	++	a	a	?
OTC	-	-	+	-	++	-

+ = the syndrome (eg., panic) is likely to be seen with the drug

++ = the syndrome can be very intense

a = absence of syndrome

SUGGESTED READINGS

American Psychiatric Association (1994). Diagnostic and statistical manual of mental disorders (4 ed., pp.175-272). Washington, DC: Author.

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