

Synthetic Cannabinoids Health Care Provider Fact Sheet

Question: What are synthetic cannabinoids?

Answer:

Synthetic cannabinoids are a large family of chemically unrelated structures that are synthesized and marketed to mimic the action of Δ^9 -tetrahydrocannabinol (THC), the primary psychoactive constituent of marijuana. Marijuana is listed as a Schedule I controlled substances in New York State. Schedule I controlled drugs are the most highly restricted drugs in New York. Other examples of Schedule I controlled substances include heroin and LSD.

The emergence of synthetic cannabinoids represents a recent phenomenon in the U.S. designer drug market. The substances are often labeled “not intended for human consumption,” but there has been a rapid and significant increase in abuse of these substances in the United States. The most common route of administration is by smoking (using a pipe, a water pipe or rolling the drug-spiked plant material in cigarette papers).

Below are structural classes that contain synthetic cannabinoids, and a non-exhaustive list of drugs within each structural class.

- i. Naphthoylindoles**, including but not limited to JWH 015, JWH 018, JWH 019, JWH 073, JWH 081, JWH 122, JWH 200, JWH 210, JWH 398, AM 2201, and WIN 55 212.
- ii. Naphthylmethylindoles**, including but not limited to JWH-175, and JWH-184.
- iii. Naphthoylpyrroles**, including but not limited to JWH 307.
- iv. Naphthylmethylindenes**, including but not limited to JWH-176.
- v. Phenylacetylindoles**, including but not limited to RCS-8 (SR-18), JWH 250, JWH 203, JWH-251, and JWH-302.
- vi. Cyclohexylphenols**, including but not limited to CP 47,497 (and homologues (analogues)), cannabicyclohexanol, and CP 55,940.
- vii. Benzoylindoles**, including but not limited to AM 694, Pravadoline (WIN 48,098), RCS 4, and AM-679.

viii. **[2,3-Dihydro-5-methyl-3-(4-morpholinylmethyl)pyrrolo [1,2,3-de]-1, 4-benzoxazin-6-yl]-1-napthalenylmethanone**, including but not limited to WIN 55,212-2.

ix. **(6aR,10aR)-9-(hydroxymethyl)-6, 6-dimethyl-3-(2-methyloctan-2-yl)-6a,7,10, 10a- tetrahydrobenzo[c]chromen-1-ol 7370**, including but not limited to HU-210.

x. **Adamantoylindoles**, including but not limited to AM-1248.

xi. Any other synthetic chemical compound that is a cannabinoid receptor agonist that is not listed in Schedule I through V of Public Health Law section 3306 or is not an FDA approved drug.

Question: How are these substances marketed?

Answer:

Poison control centers throughout the country are reporting that products containing these chemicals, marketed as incense, herbal mixtures or potpourri, have become drugs of abuse. They are sold under a variety of names including, but not limited to:

K2
Spice
Chronic Spice
Spice Gold
Spice Silver
Skunk
Black Mamba
Zohai
Mr. Nice Guy
K3
K3 Legal
Genie
Sence
Smoke
Chill X
Earth Impact
Galaxy Gold
Space Truckin
Solar Flare
Moon Rocks
Aroma
Scope
Sky High

Question: Is this an emerging drug abuse issue?

Answer:

Nationwide, calls to Poison Control Centers regarding instances of poisoning from products containing synthetic cannabinoids increased more than 200 percent from 2010 to 2011. Calls received by poison control centers generally reflect only a small percentage of actual instances of poisoning.

Question: What are the patterns of abuse?

Answer:

Reports to New York Poison Control Centers indicate use in the teen and young adult population. The products are used to mimic the effects of marijuana.

Question: What are the signs and symptoms of use?

Answer:

The most common adverse effects that have been reported include tachycardia, paranoid behavior, agitation, irritability, nausea and vomiting, confusion, drowsiness, headache, hypertension, electrolyte abnormalities, seizures and syncope. Severe side effects may include acute renal failure and significant negative effects to the cardiovascular and central nervous systems. Case reports describe psychotic episodes, withdrawal, and dependence associated with use of these products, similar to syndromes observed in marijuana abuse. Use of synthetic cannabinoids has also been linked to death. It is important to note that these products do not show up on a urine drug screen as THC.

Question: What should be done with a patient that appears to have acute intoxication from synthetic cannabinoids?

Answer:

Patients exhibiting acute intoxication from synthetic cannabinoids should be referred to the Emergency Department.

Question: What is the legal status of these compounds in NYS?

Answer:

Effective March 28, 2012, these compounds are prohibited from sale and distribution pursuant to an Order for Summary Action signed by the Commissioner of Health.

Question: How may I contact the Poison Control Center?

The Poison Control Center can be reached at (800)222-1222.