



The dangers of codeine addiction

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Codeine is a medicine classified as an opioid and is one of the most widely available and consumed medicines in its class. It is available on its own or in combination with other active ingredients, such as paracetamol and/or ibuprofen. Codeine is often an ingredient in cough preparations as a cough suppressant. Codeine-containing medicines that are available over-the-counter (OTC) can be used safely under the supervision of pharmacists and pharmacist's assistants when used to treat minor pain or to suppress non-productive coughs.

However, the misuse and abuse of codeine across the world is an ongoing concern. In South Africa, it has been reported that more than half a million people are addicted to codeine.

Since OTC medicines are generally regarded as 'safe', the availability and accessibility of codeine-containing medicines OTC is a concern because of their habit-forming potential. The reality is that codeine carries a risk of tolerance, dependence and other health hazards related to excessive or long-term use.

The misuse of opioid medicines like codeine occurs when these medicines are used for recreational purposes and/or when used at excessive doses. This problem does not only stem from accessibility of these products OTC but also with the inappropriate prescribing of codeine-containing prescription medicines.

The "highs" of codeine use

An opioid is a narcotic that produces analgesia (pain relief), can induce narcosis (state of stupor or sleep), and has the potential for addiction (physical dependence on the drug).

Opioids work by changing the chemistry of the brain which can lead to tolerance. This means that over time the prescribed dose may no longer achieve its desired effect, and the dose needs to be increased to achieve the same effect. Taking an opioid like codeine over a long period of time produces dependence, such that when people stop taking the drug, physical and psychological symptoms of withdrawal are experienced.

Euphoria can be described as an "extreme, unrealistic feeling of physical and emotional well-being", a feeling often described as "high". Codeine and other opioids can cause these euphoriant effects and therefore pose a risk of dependence. Although many people begin using codeine to relieve a legitimate condition, it frequently becomes an abused medicine as tolerance develops. Additionally, once dependence occurs, the feeling of the "high" becomes a risk factor that may lead to codeine dependence.

Dependence versus addiction

While dependence and addiction both cause withdrawal symptoms when the drug is stopped, they are not the same. Physical dependence following prescribed use is a normal response to treatment with codeine and should be managed by a doctor. Once a dependence on codeine develops, the brain cannot function normally without it. Addiction, on the other hand, may follow dependence and involves drug craving and loss of control over usage. It often requires more support such as rehabilitation programmes, in order for the person to work through the addiction.

Codeine withdrawal

Codeine-dependent people who abruptly stop taking codeine can experience the following withdrawal symptoms:

- Flu-like symptoms are common. Additionally, patients can also experience nausea, stomach cramps, diarrhoea, vomiting, fever, chills, profuse sweating, runny nose,

sneezing, headaches, jitteriness, shakiness, muscle aches, and trembling in the extremities.

- Changes in blood pressure, breathing, and irregular heartbeat are common.
- Psychological and cognitive symptoms may include anxiety (can range from mild to severe and may even include panic attacks in some individuals), mood swings, irritability, depression, confusion, issues with memory, issues with concentration, an inability to sleep, and poor appetite.
- Extreme cravings to use codeine are common during the withdrawal process. Individuals who give in to these cravings often find that any withdrawal symptoms they are experiencing disappear rapidly once they start using the drug again.

Side effects of codeine use and the dangers of addiction

In general, people who use codeine may experience light-headedness, shortness of breath or vomiting. Some other side-effects experienced include dizziness, drowsiness, constipation and sweating. More serious side-effects associated with codeine use include respiratory depression, hypersensitivity reaction and lowering of blood pressure.

Codeine addiction, however, can cause life-threatening health problems, including the risk of overdose. Overdose occurs when high doses of opioids cause breathing to slow or stop, leading to unconsciousness and death if the overdose is not treated immediately. The addiction to an opioid such as codeine is a long-lasting (chronic) disease that can cause health, social and financial problems. Opioids act in the nervous system to produce feelings of pleasure and pain relief. Opioid addiction is characterised by a powerful, compulsive urge to use codeine or other opioid drugs, even when no longer medically required. In severe instances, heart rate is reduced, breathing can become shallow, patients may become confused and some may even have seizures.

Some people addicted to codeine may develop symptoms such as agitation, hallucinations, shivering, twitching, fast heart rate, muscle stiffness and loss of coordination. These symptoms are indicative of a condition called serotonin syndrome and require urgent medical intervention.

Another danger of being addicted to codeine is that many addicts may try mixing it with other substances, such as alcohol, to try and improve their “high”. Both codeine and alcohol act as central nervous system (CNS) depressants. This combination can lead to dangerous levels of depression in the brain and can cause respiratory failure. Codeine-

containing cough syrups are often mixed with energy or soft drinks, a concoction known as “purple drink”. This combines the risk of codeine abuse with high levels of sugar and caffeine – all of which have a negative health impact. Codeine-addicted patients have also reported combining their OTC codeine use with recreational drugs such as marijuana or even with schedule 5 benzodiazepines.

For some people, codeine may only be the beginning to their addiction. Sometimes, it is the “gateway drug” to addiction to other substances, especially other opiates like oxycodone, morphine or even street drugs like heroin.

The most dangerous aspect of codeine addiction is the accessibility of codeine without a doctor’s prescription. While the role of the pharmacist’s assistant is not one of involvement in managing codeine addiction, it is important to understand the risks associated with medicines containing codeine that are sold OTC. Interestingly, it has been reported that many codeine addicted patients were not aware of the potential habit-forming profile of codeine. This identifies a major gap in patient-centred care in the pharmacy. Even though OTC medicines are generally safe to use, OTC medicines containing codeine should be prescribed responsibly and used only when required. Patients who are suspected to have codeine dependence should be managed by a doctor and, in cases of addiction, it is essential that these patients are identified, managed and supported appropriately.

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