

## ADDRESSING CANNABIS USE DISORDER IN PRIMARY CARE SETTINGS— A LIFESPAN APPROACH

Cannabis is the third-most used psychoactive substance in the United States, following alcohol and tobacco.<sup>1</sup> Cannabis use disorder (CUD) presents as a pattern of cannabis consumption that produces clinically meaningful impairment or distress. CUD has increased in prevalence over the past two decades, alongside increased product potency, expanded state-level legalization, and reduced public perception of potential harm resulting from cannabis use.<sup>2</sup> In 2024, an estimated 20.6 million people ages 12 and older reported past-year CUD—an increase from the 16.7 million reported in 2021.<sup>1</sup>

This *Advisory* offers guidance to healthcare providers, including pediatricians, adolescent medicine specialists, primary care providers, and geriatricians. It addresses cannabis use and CUD across the lifespan, including during adolescence (ages 12–17), young adulthood (ages 18–25), middle adulthood (ages 26–64), during pregnancy, and older adulthood (ages 65 and older). It also discusses CUD screening, patient education, referral to evidence-based treatments if needed, and current screening and treatment gaps. The *Advisory* differentiates the effects of psychoactive and nonpsychoactive cannabinoids, outlines potential short- and long-term harms of cannabis use, and identifies co-occurring psychiatric disorders, including cannabis-induced psychosis.

### Key Messages

- The prevalence of cannabis use and CUD is increasing in all age groups, in parallel with increasing product potency and public acceptance of use.<sup>2</sup>
- Cannabis use has also increased among pregnant women, despite evidence linking prenatal cannabis use to adverse neonatal and maternal health outcomes.<sup>3</sup>
- A lifespan approach to addressing CUD recognizes that risk factors, symptom presentation, treatment needs, and harm trajectories for CUD differ across developmental stages. Screening and interventions must be tailored to each stage, rather than universally applied.<sup>4</sup>
- Primary care settings—as well as emergency departments, trauma centers, and other outpatient settings—offer critical opportunities to engage people who are at risk before more severe consequences develop. Healthcare providers in these settings should routinely screen for cannabis use and CUD and offer appropriate education and intervention.<sup>5</sup>
- Psychological interventions for CUD—such as cognitive-behavioral therapy (CBT), motivational enhancement therapy (MET), and contingency management (CM)—have been shown to be effective, especially when used together.<sup>4</sup> Lifespan treatment approaches include the use of family-based interventions for adolescents, technology-based support for young adults, screening for co-occurring medical conditions and polysubstance use for patients in middle adulthood, and educating older adults about cannabis-related health risks.

The term “cannabis” is increasingly preferred in scientific and clinical contexts, even though “marijuana” is still commonly used in legacy research, educational, and regulatory materials. Accordingly, this *Advisory* uses the term marijuana only when reflecting legacy usage.

## Overview of Major and Minor Cannabinoids

The cannabis plant contains more than 500 chemical compounds, including more than 100 cannabinoids, which are substances that can influence both physical and mental processes.<sup>6,7</sup> Cannabinoids are classified as major or minor, based on their prevalence in the cannabis plant. The major cannabinoids, delta-9-tetrahydrocannabinol (THC) and cannabidiol (CBD), are the most researched and most abundant cannabinoids found in most cannabis products.<sup>8</sup> Both bind to cannabinoid type 1 (CB1) and cannabinoid type 2 (CB2) receptors in the brain and peripheral tissue but produce very different effects.<sup>6</sup>

THC produces psychoactive effects such as euphoria (feeling “high”), impairs cognitive and motor functions, and increases desire for repeated use, which may eventually lead to CUD.<sup>9</sup> Two minor cannabinoids, delta-8-THC and delta-10-THC, are structural isomers of delta-9-THC that also bind to CB1 receptors but are believed to produce milder psychoactive effects.<sup>10</sup> Cannabis contains trace amounts of delta-8-THC and delta-10-THC.<sup>8</sup> Typically, these minor cannabinoids are synthesized from hemp-derived CBD for use in products intended to produce psychoactive effects similar to the effects of delta-9-THC products.

CBD does not produce euphoric effects or the sensation of feeling high.<sup>8</sup> It is considered nonintoxicating and does not impair cognitive or motor functioning.<sup>8</sup> Other nonpsychoactive minor cannabinoids in the cannabis plant include cannabinol, cannabichromene, and cannabigerol. Because cannabis products containing only nonpsychoactive cannabinoids do not produce intoxicating effects, these products have low potential for misuse and subsequent CUD.<sup>11</sup> This *Advisory* focuses on adolescent and adult use of cannabis products that contain THC.

### Diagnostic Criteria for CUD

According to the *Diagnostic and Statistical Manual of Mental Disorders* (5th edition, Text Revision), CUD occurs when a person’s cannabis use leads to clinically significant impairment or distress, which is defined by demonstrating at least two of the following criteria within 12 months<sup>12</sup>:

- Cannabis is often taken in larger amounts or over a longer period than was intended.
- There is a persistent desire or unsuccessful efforts to cut down or control cannabis use.
- A great deal of time is spent in activities necessary to obtain cannabis, use cannabis, or recover from its effects.
- Craving, or a strong desire or urge to use cannabis.
- Recurrent cannabis use resulting in a failure to fulfill major role obligations at work, school, or home.
- Continued cannabis use despite having persistent or recurrent social or interpersonal problems caused or exacerbated by the effects of cannabis.
- Recurrent cannabis use in situations in which it is physically hazardous.

## Diagnostic Criteria for CUD (continued)

- Important social, occupational, or recreational activities are given up or reduced because of cannabis use. Recurrent cannabis use in situations in which it is physically hazardous.
- Cannabis use is continued despite knowledge of having a persistent or recurrent physical or psychological problem that is likely to have been caused or exacerbated by cannabis.
- Tolerance, as defined by either of the following:
  - A need for markedly increased amounts of cannabis to achieve intoxication or desired effect.
  - Markedly diminished effect with continued use of the same amount of cannabis.
- Withdrawal, as manifested by either of the following:
  - The characteristic withdrawal syndrome for cannabis.
  - Cannabis (or a closely related substance) is taken to relieve or avoid withdrawal symptoms.

### Severity classifications

- Two to three criteria = mild CUD
- Four to five criteria = moderate CUD
- Six or more criteria = severe CUD

## Prevalence of Cannabis Use and CUD

Between 2021 and 2024, past-month cannabis use among people ages 12 and older increased from 13.2 percent (37.0 million people) to 15.4 percent (44.3 million people), according to the 2024 National Survey on Drug Use and Health, which uses the term “marijuana” in its survey measures.<sup>1</sup> The prevalence of past-month cannabis use overall varied among age groups in 2024. It was 6.0 percent in adolescents (ages 12–17), 24.1 percent in young adults (ages 18–25), 15.4 percent in middle adulthood (ages 26–64), and 6.9 percent in older adults (ages 65 and older).<sup>13</sup>

Between 2021 and 2024, the prevalence of past-year CUD among people ages 12 and older increased from 6.0 percent (16.7 million) to 7.1 percent (20.6 million).<sup>1</sup> The prevalence of CUD varied across age groups. The prevalence was 4.6 percent in adolescents, 16.1 percent in young adults, 7.8 percent in middle adulthood, and 1.3 percent in older adults.<sup>14</sup> CUD severity level was categorized as mild in more than half of all people with CUD (54.4 percent), moderate in 27.9 percent, and severe in 17.7 percent.<sup>1</sup>

## Risk Factors for Developing CUD

Assessing each patient for specific risk factors linked to CUD should be considered part of routine screening for cannabis use. Patients at increased risk for developing CUD include those who use frequently,<sup>15,16</sup> those who use high-potency cannabis, those managing chronic pain with medicinal cannabis, and people with mental disorders, such as anxiety disorders,<sup>17</sup> mood disorders, post-traumatic stress disorder (PTSD), psychotic disorders, or personality disorders.<sup>18</sup> Using cannabis to cope, compared with other motives for cannabis use (e.g., social or mood/sensory enhancement motives), has been associated with greater psychological distress and cannabis-related problems.<sup>19</sup>

In addition, initiation of cannabis use at younger ages (i.e., before ages 14–16) has been associated with a greater risk of developing CUD,<sup>20</sup> as well as a greater risk of high-frequency substance use, symptoms of externalizing disorders (e.g., lying, inattention, impulsivity, bullying), and crime/violence-related behaviors (e.g., shoplifting, physical altercations, driving under the influence).<sup>21</sup>

### Clinical Considerations for Patients Using Cannabis for Medical Purposes

- Similar to medical opioid use, differentiating between medical and recreational use is important when assessing patterns of cannabis use and related consequences.<sup>22</sup>
- Patients who use cannabis for medical purposes often rely on dispensaries as primary sources of information; however, counseling on cannabis-related risks (e.g., CUD, withdrawal, motor vehicle accidents, psychosis, drug interactions, side effects) may be limited or inconsistent.<sup>23</sup>
- Routine clinical inquiry about cannabis use supports open, nonjudgmental discussion between patients and healthcare professionals and can support more accurate assessment.<sup>23</sup>
- People who use medical cannabis often report daily or near-daily use, which may lead to expected neuroadaptation (i.e., tolerance and withdrawal) within a therapeutic context and may be misclassified as CUD in the absence of careful clinical assessment.<sup>24</sup>
- Among patients using medical cannabis, tolerance and withdrawal alone should not be used to diagnose CUD.<sup>24,25</sup> Instead, clinical evaluation should prioritize indicators of clinically problematic use, including impaired control, risky use (e.g., driving while intoxicated), continued use despite harm, and excessive time spent using or recovering from cannabis.<sup>24</sup>
- Clinicians should engage patients in shared decision-making through evidence-based education on medical cannabis, including discussion of known risks, potential benefits, and established first-line treatment options for their condition.<sup>23</sup>
- Dual-use motives blur distinctions between medical and recreational cannabis use, as recreational motives (e.g., coping, boredom, enjoyment) are linked to disordered use among medical cannabis patients.<sup>18</sup> Some patients may claim medical use without authorization or therapeutic intent.

## Potential Harms of Cannabis Use

Cannabis products containing THC can alter emotional states, thought processes, and sensory perception.<sup>15</sup> Cannabis can have different effects depending on the amount consumed, potency (THC concentration), and route of administration. The route of cannabis administration influences the onset, intensity, and duration of psychoactive effects.<sup>26</sup> Intoxication occurs rapidly when cannabis is smoked (e.g., through joints, bongs, dabs, pipes) or vaped, but the duration of intoxication is shorter than when cannabis is consumed orally (e.g., through capsules, food, drinks). Less commonly used administration methods include topicals (e.g., lotions, balms) and suppositories. Other factors that can influence cannabis effects are concurrent use of alcohol or other drugs (including prescription and nonprescription medications), medical conditions, individual characteristics (e.g., age, sex, genetics), and previous experience using cannabis.<sup>15</sup>

In addition to the psychoactive and physiological effects of THC, cannabis products may contain contaminants—including microbes, heavy metals, and pesticides—that pose their own health risks. These contaminants can be introduced during cultivation, processing, or storage and have been associated with infections, carcinogenic exposures (e.g., aflatoxins, arsenic), and reproductive or developmental toxicity. Some contaminants may survive heating during smoking or vaping and can be absorbed efficiently into the body, representing an additional potential harm of cannabis use.<sup>27</sup>

Potential short-term harms of using cannabis products containing THC include:

- Negative mood symptoms: irritability, restlessness, anxiety, fear, distrust, and panic. These effects are more common with use of products containing high THC concentrations, after consuming large amounts of cannabis, and in people who have little previous experience with cannabis.<sup>15,16</sup>
- Physical symptoms: elevated heart rate, changes in blood pressure, and respiratory effects.<sup>15</sup>
- Physical injury: increased risk of car crashes<sup>28</sup> and workplace injuries<sup>29</sup> due to impaired reaction time, judgment, and coordination and distorted perception while performing complex tasks.
- Acute cannabis-induced mental disorders: temporary anxiety, sleep, or psychotic disorders. Cannabis-induced psychotic disorders, characterized by delusions or hallucinations soon after intoxication, are more likely to occur in patients who started using cannabis at a younger age, use frequently, use high-potency products, or have a personal or family history of psychosis.<sup>30</sup>

Potential long-term harms of using cannabis products containing THC include:

- Cognitive impairment: decreased function in learning, memory, attention, processing speed, psychomotor ability, and use of language.<sup>15,16</sup>
- Mental disorders: earlier onset (e.g., ages 25–28) of psychosis,<sup>31</sup> particularly in people with genetic risk factors for psychotic disorders such as schizophrenia; greater risks for those with existing psychotic disorders, including exacerbation of psychotic symptoms, increased risk of return to substance use, and longer hospital stays; increased risk of depression and suicidal thoughts and behaviors; and poor long-term treatment outcomes related to mood and anxiety disorders.<sup>16</sup>
- Respiratory symptoms: cough, wheezing, phlegm, and chronic bronchitis among people who smoke or vape cannabis products.<sup>15,16</sup>
- Cardiovascular conditions: increased risk of stroke, heart attack, and arrhythmia.<sup>15</sup>

- Gastrointestinal problems: cannabinoid hyperemesis syndrome (i.e., nausea, vomiting, and abdominal pain after chronic and frequent cannabis use), acid reflux, pancreatitis, and peptic ulcer disease.<sup>15</sup>
- Sexually transmitted infections and HIV: heightened risk due to increased engagement in risky sexual behaviors, such as having multiple partners or not using condoms.<sup>32</sup>
- Cancer: increased risk of head, neck, and throat cancers, especially in people who smoke cannabis.<sup>15</sup>
- CUD: a pattern of cannabis consumption that produces clinically meaningful impairment or distress.<sup>1</sup>
- Cannabis withdrawal symptoms: behavioral, emotional, and physical symptoms after abrupt reduction or cessation of long-term frequent cannabis use.<sup>33</sup> Patients with CUD may continue using cannabis to alleviate or prevent withdrawal symptoms. Common withdrawal symptoms include nervousness, anxiety, irritability, hostility, sleep disturbances, and depressed mood.





Potential harms of using cannabis products containing THC during pregnancy and parenting include:

- Prenatal exposure and developmental risks: adverse perinatal outcomes, including preterm birth, low birth weight, hospitalization, and infant death,<sup>15</sup> as well as increased risk of behavioral problems and cognitive deficits later in life<sup>34</sup> among children whose mothers used cannabis during pregnancy.
- Infant safety risks associated with caregiver impairment: caregiver impairment associated with cannabis use, including reduced attention, judgment, and cognitive functioning, which may compromise safe supervision and increase the risk of sudden infant death syndrome (SIDS) stemming from secondhand cannabis smoke exposure, as well as the risk of accidental suffocation from co-sleeping with a parent under the influence of cannabis.<sup>35</sup>
- Childhood cannabis exposure and associated health risks: health effects associated with secondhand cannabis smoke exposure, including THC-positive urine test results and respiratory infections, medical emergencies resulting from unintentional ingestion of THC-containing edibles (e.g., gummies),<sup>15</sup> and exposure to harmful chemicals, including THC and contaminants (e.g., pesticides, heavy metals, bacteria), through breast milk or secondhand smoke.<sup>36</sup>

## The Lifespan Approach to Evidence-Based Screening and Treatment for CUD

A lifespan approach recognizes that risk factors, symptom presentation, treatment needs, and harm trajectories for CUD differ across developmental stages. As a result, screening and interventions must be tailored to each stage, rather than universally applied.<sup>4</sup> The life stages presented in the figure Cannabis Use Across the Lifespan: Characteristics and Screening/Treatment Approaches on page 7 are based on classifications and age ranges used in prior research.<sup>4,37,38</sup> It is important to note that these age ranges are not standardized and vary across the literature.<sup>39</sup> Classifications and age ranges are intended as pragmatic groupings; developmental characteristics, symptom presentations, and optimal interventions may overlap between age groups. Healthcare providers should use age ranges as a starting point but prioritize each patient's developmental status, medical history, and social roles.

## Cannabis Use Across the Lifespan: Characteristics and Screening/Treatment Approaches

 <b>ADOLESCENCE</b> (Ages 12–17)	 <b>YOUNG ADULTHOOD</b> (Ages 18–25)	 <b>MIDDLE ADULTHOOD</b> (Ages 26–64)	 <b>OLDER ADULTHOOD</b> (Ages 65 and older)
<b>Characteristics:</b> <ul style="list-style-type: none"><li>• Cannabis use influenced by peers and experimentation</li><li>• Early cannabis use linked to increased risk of CUD, psychiatric symptoms, and behavioral and cognitive deficits</li></ul>	<b>Characteristics:</b> <ul style="list-style-type: none"><li>• Cannabis use influenced by peers and reduced parental monitoring</li><li>• Highest prevalence of cannabis use among age groups</li></ul>	<b>Characteristics:</b> <ul style="list-style-type: none"><li>• Cannabis use often for stress relief and coping with role demands</li><li>• Cannabis use and treatment needs influenced by work and family responsibilities</li></ul>	<b>Characteristics:</b> <ul style="list-style-type: none"><li>• Cannabis use often for pain relief, mental health issues, and sleep problems</li><li>• Age group least likely to be screened despite increased risk of CUD and other harm</li></ul>
<b>Approach:</b> <ul style="list-style-type: none"><li>• Implement psychosocial screenings</li><li>• Discuss confidentiality to encourage disclosure</li><li>• For treatment, emphasize family support and external rewards</li></ul>	<b>Approach:</b> <ul style="list-style-type: none"><li>• Implement psychosocial screenings and screen all women of reproductive age</li><li>• For treatment, leverage technology to strengthen resilience and positive peer support</li></ul>	<b>Approach:</b> <ul style="list-style-type: none"><li>• Screen for medical conditions and polysubstance use and screen all women of reproductive age</li><li>• Address interactions between cannabis and medications</li></ul>	<b>Approach:</b> <ul style="list-style-type: none"><li>• Routinely screen for CUD and educate patients on cannabis-related risks</li><li>• Encourage patients to build and maintain strong social support networks</li></ul>

### Screening, Brief Intervention, and Referral to Treatment

Routine screening for cannabis use and CUD, combined with appropriate education and intervention, can strengthen clinicians' ability to support their patients. Universal substance use screening is especially important for women of childbearing age, given the potential risks of substance use during pregnancy and the value of early detection and support. Screening, brief intervention, and referral to treatment (SBIRT) is a comprehensive, integrated public health strategy designed to identify and address substance use disorders (SUD) early and support people at risk.<sup>5</sup> For additional information on interventions for patients according to risk level, see the text box The SBIRT Process for CUD on page 8.

SBIRT techniques can help healthcare providers address substance use and identify the appropriate level of treatment by incorporating three key elements<sup>5</sup>:

- Screening: systematic, rapid assessment to identify risky use and determine severity of use.
- Brief intervention: short, structured conversation using motivational interviewing to increase insight, build motivation, and set goals for behavior change. The intervention may be conducted in the same setting as the screening or through referral to an offsite program.
- Referral to treatment: facilitated access to specialty treatment for people with more severe SUD or those needing more extensive care.

Primary care settings—as well as perinatal care specialists, emergency departments, trauma centers, and other community-based environments—offer critical opportunities to engage people at risk to prevent adverse health outcomes across the lifespan. Patients in all stages of life can benefit from early detection and timely intervention.

## The SBIRT Process for CUD

Primary care providers and community health providers can use the SBIRT approach to identify risky substance use behavior, reduce substance use, and prevent CUD and other SUD.<sup>40</sup>

### Screening for cannabis use and CUD

A validated, brief instrument is used to categorize a patient's cannabis use pattern and risk for developing CUD.<sup>40</sup> For examples, see the text box Examples of Validated Screening and Assessment Instruments. The healthcare provider starts a conversation with the patient about cannabis use. For a patient with no or low risk, no further intervention is needed. For a patient with moderate risk, a brief intervention is needed.

### Brief intervention

Healthcare providers can screen patients and conduct motivational interviewing in the same setting.<sup>40</sup> Motivational interviewing is a brief, patient-centered counseling method that helps enhance motivation to change by engaging patients in discussions about their substance use in a supportive manner. Education should also be provided to increase motivation to reduce or discontinue cannabis use.

Educational handouts for patients according to life stage include:

- Adolescents: [Cannabis: The Facts You Need To Know](#). Topics in this fact sheet from Scholastic and the National Institute on Drug Abuse (NIDA) include what cannabis is, THC and the teen brain, and short-term effects.
- Young adults: [Talking About Cannabis \(for Young Adults\): A Responsible Use and Prevention Toolkit](#). This publication from the Virginia Cannabis Control Authority offers information and resources to support informed decision-making about cannabis use.
- Middle adulthood: [Marijuana](#). This fact sheet from the Substance Abuse and Mental Health Services Administration (SAMHSA) Addiction Technology Transfer Center Network highlights the effects of marijuana on the body and offers tips for decreasing use.
- Pregnant women: [Marijuana Use and Pregnancy](#). This handout from the Centers for Disease Control and Prevention provides fast facts on the topic.
- Older adults: [Bud Talks: Cannabis & Older Adults](#). This resource from McMaster University highlights risks related to cannabis use and helps older adults prepare to discuss cannabis use with their healthcare provider.

### Brief treatment

Brief treatment is needed for a patient with moderate to high risk.<sup>40</sup> Brief treatment uses a systematic, structured approach that centers on assessment, engaging the patient, and implementing strategies for change. The patient addresses unhealthy cognitions and behaviors linked to their cannabis use and adopts change strategies with help from evidence-based brief therapies (e.g., solution-focused therapy, MET, CBT). The provider may offer brief treatment onsite or offer a referral.

### Referral to specialty treatment

A patient with severe risk needs referral to specialty treatment. The healthcare provider and patient identify a suitable treatment program, and the provider facilitates the patient's access to treatment. Clinicians should have a follow-up system in place to monitor patients with moderate to severe risk.

Note: Inclusion of an educational handout does not imply endorsement or recommendation by SAMHSA or the U.S. Department of Health and Human Services. These resources are provided for informational purposes only and should not replace clinical judgment.

## Examples of Validated Screening and Assessment Instruments

### Adolescents

- Screening to Brief Intervention (S2BI)<sup>41</sup>
- Brief Screener for Tobacco, Alcohol, and other Drugs (BSTAD)<sup>41</sup>
- Car, Relax, Alone, Forget, Family or Friends, Trouble (CRAFT)<sup>41</sup>
- Drug Abuse Screening Test–A (DAST-20: Adolescent version)<sup>41</sup>

### Adults

- Tobacco, Alcohol, Prescription medication, and other Substance use (TAPS)<sup>41</sup>
- Drug Abuse Screening Test–10 (DAST-10)<sup>41</sup>
- Cannabis Use Disorders Identification Test–Revised (CUDIT-R)<sup>42</sup>

Note: Inclusion of a screening tool or assessment does not imply endorsement or recommendation by SAMHSA or the U.S. Department of Health and Human Services. This list is provided for informational purposes only and should not replace clinical judgment.

## Evidence-Based Treatments for Patients With CUD

Based on the level of risk identified during screening, healthcare providers may offer evidence-based interventions onsite or refer patients to treatment for CUD.<sup>40</sup>

Patients at severe risk should be referred to specialty treatment, with providers helping identify appropriate programs and facilitating access to more intensive care. Currently, no medication to treat CUD has been approved by the U.S. Food and Drug Administration (FDA).<sup>43,44</sup> Evidence has demonstrated that the most effective approaches for treating CUD include the following psychological approaches, delivered individually or in combination:

- Cognitive–behavioral therapy (CBT): This approach focuses on identifying external cues for cannabis use and the unconstructive patterns of thought and behavior that sustain it, while promoting the development of healthier cognitive, behavioral, and emotional skills (e.g., coping strategies, problem solving, emotion regulation).<sup>43,44</sup>
- Motivational enhancement therapy (MET): This supportive, person-centered approach focuses on increasing a person’s motivation to quit or reduce cannabis use and building self-confidence through a mix of education, goal setting, and developing plans for change.<sup>43,44</sup>
- Contingency management (CM): This behavioral approach uses tangible incentives (e.g., restricted-use gift cards) to encourage positive behaviors like cannabis abstinence.<sup>43,44</sup>
- Family interventions: Especially in adolescents, therapies involving their families and communities have been shown to be effective. Examples of family-based interventions include<sup>45</sup>:
  - Multidimensional family therapy: This approach reduces cannabis use by addressing multiple risk factors across adolescent, parent, family, and social domains. It strengthens the adolescent’s coping skills and emotional regulation, improves parenting skills and family communication, and helps families navigate peer and community influences.
  - Brief strategic family therapy: This approach focuses on increasing adaptive family interactions and reducing maladaptive interaction patterns to reduce an adolescent’s substance use.
  - Multisystemic therapy: This intensive treatment focuses on identifying cannabis use risk factors and leveraging protective factors across the social structure surrounding the adolescent, including individual, family, peer, school, and community influences.

- Functional family therapy: This approach uses cognitive–behavioral techniques to identify and change maladaptive family patterns related to adolescent substance use.
- Integrated treatment for co-occurring disorders: This approach delivers mental health and substance use treatment together within one coordinated program or team.<sup>46</sup> This ensures that both conditions are addressed simultaneously, rather than separately or in sequence, acknowledging that both conditions are interconnected and influence one another.

## Screening for Co-Occurring Mental Disorders<sup>9</sup>

- Patients with CUD often present with co-occurring mental disorders, including other SUD (mainly alcohol or tobacco), depression, anxiety, psychotic disorders, PTSD, and bipolar disorder.
- People who use cannabis and have a co-occurring mental disorder are twice as likely to develop CUD as those who do not have a mental disorder.
- People with co-occurring CUD and mental disorders have worse CUD severity and response to CUD treatment compared with people without mental disorders, as well as poorer mental health outcomes.
- CUD screening and treatment should include components that identify and address any co-occurring disorders.
- Healthcare providers should carefully consider each patient’s circumstances and ask targeted screening questions to determine whether cannabis use may be masking or managing an underlying condition, including cannabis withdrawal symptoms.
- When other mental illnesses are identified, healthcare providers should initiate treatment for both CUD and any co-occurring condition as appropriate or provide referrals to specialized care.

## Screening and Treatment Considerations for Adolescents and Young Adults

Family and peer dynamics and ongoing brain development make adolescence and young adulthood distinctly vulnerable stages of the lifespan. Brain maturation continues into the mid-20s,<sup>47</sup> and emerging neuroimaging evidence suggests that important neural organization processes extend into the early 30s.<sup>39</sup> The brains of adolescents and young adults are especially susceptible to the long-term effects of cannabis products containing THC.<sup>47</sup> During these developmental stages, cannabis use may contribute to neurodevelopmental changes, including deficits in memory, attention, and learning, as well as poor academic performance.<sup>48</sup> Amid these developmental vulnerabilities, expanding state-level legalization has increased adolescents’ and young adults’ access to cannabis, including high-potency products, which may pose especially great risk to the developing brain.<sup>49</sup>

Among adolescent and young adult age groups, cannabis use is most often motivated by social pressure, experimentation, or seeking pleasurable effects.<sup>30</sup> Less frequent motives for use, such as coping with stress or trying to relax, have been associated with depression, anxiety, and PTSD. Early and chronic cannabis use is further linked to a range of developmental and psychosocial difficulties, including impairments in cognitive functioning, disruptions in psychosocial adjustment, and difficulties navigating key adult milestones such as completing education, establishing a vocational path, and forming stable intimate relationships.<sup>50</sup>

In addition to these developmental and psychosocial risks, frequent cannabis use at younger ages is a significant risk factor for developing psychotic disorders, especially among people who use

high-potency products or have other underlying risk factors for psychosis.<sup>51</sup> One study found that among patients who experienced a first episode of psychosis, daily users of high-potency cannabis experienced psychosis onset 6 years earlier than those who did not use cannabis.<sup>31</sup> Other factors that may compound psychosis risk in the context of cannabis use include childhood trauma, concurrent use of other substances, genetic predispositions, and childhood behavioral problems.<sup>51</sup>

Screening and treatment considerations for adolescents and young adults include:

- Adolescents may be more willing to disclose sensitive information like substance misuse and mental health history when healthcare providers clearly communicate the boundaries of confidentiality and emphasize which information will be kept confidential.<sup>52</sup>
- Routine healthcare visits should incorporate comprehensive psychosocial screening using brief, validated tools to identify substance use and co-occurring mental health concerns.<sup>53</sup>
- Healthcare providers working with adolescents can refer patients who need treatment to providers of evidence-based psychological treatment.<sup>4</sup>
- Evidence supports the use of integrated treatment approaches, especially family-based therapies and CM, to simultaneously address mental health issues and CUD.<sup>45</sup>
- For adolescents, therapies that involve their families and communities have been shown to be effective.<sup>45</sup> These approaches leverage protective factors, such as parental involvement, effective family communication, and positive peer influence.
- CM, which provides external, tangible incentives tied to abstaining from cannabis use, may be particularly effective in adolescents and young adults, who are susceptible to peer pressure and responsive to immediate reinforcement. Combining CM with CBT and/or MET helps boost decision-making skills at a stage in which adolescent and young adult brains are still developing.<sup>4,45</sup>
- In young adults, interventions that use technology-based platforms to help increase motivation and self-monitoring, build tolerance to distress, and increase exposure to positive peer influences show promise for decreasing cannabis use.<sup>4,45</sup> Examples of technology-based interventions include:
  - Personalized text messages focused on peer relationships and motivation to reduce use.
  - Computerized delivery of personalized feedback on risky cannabis use behavior, tips to reduce cannabis use, and distress tolerance training.<sup>4</sup>

## **Screening and Treatment Considerations for Middle Adulthood**

Although the overall rates of substance use tend to peak in early adulthood, substance use remains a major threat for morbidity and mortality in middle and later adulthood.<sup>38</sup> The multiple demands and challenges people may face in middle adulthood, including fulfilling roles across work, family, and social domains, may uniquely impact vulnerability to SUD.

Screening and treatment considerations for people in middle adulthood include:

- Co-occurring medical conditions: Screening for conditions such as heart disease, high blood pressure, or history of stroke is important, as cannabis can raise heart rate and blood pressure.<sup>54</sup>
- Polysubstance use: Combining cannabis with opioids, benzodiazepines, alcohol, or antihistamines can increase sedation, while pairing cannabis with stimulants or certain antidepressants may increase heart rate.<sup>54</sup> In addition, cannabis affects liver enzymes, which can alter levels of drugs such as blood thinners, antidepressants, anti-seizure medications, and pain relievers.<sup>54</sup>

- Functional and social factors: Parenting or caregiving responsibilities, employment concerns/ career pressures, and financial stressors may influence use and treatment needs.<sup>55</sup>
- Psychological therapies: Healthcare providers working with patients in middle adulthood can refer patients who need treatment to providers of evidence-based psychological treatment.<sup>4</sup> Evidence-based approaches, including CBT, MET, and CM—alone or in combination—have been shown to be effective treatments in middle adulthood for SUD.<sup>4</sup>

## Screening and Treatment Considerations for Pregnant Women

Cannabis use among pregnant women in the United States has risen, alongside expanding public acceptance and growing perceptions of safety.<sup>3</sup> The estimated prevalence of past-month cannabis use among pregnant women in 2024 was 5.0 percent.<sup>56</sup> Commonly reported motivations for cannabis use during pregnancy include treating symptoms of depression, stress, morning sickness, and pain.<sup>3</sup> However, evidence links prenatal cannabis exposure to a modestly increased risk of adverse fetal and neonatal outcomes, including low birth weight, preterm delivery, and increased admissions to neonatal intensive care units.<sup>57</sup> Cannabis use during pregnancy has also been linked to poor maternal health outcomes, including increased maternal hospital length of stay, poor antenatal care, postnatal depression and anxiety, and placental abruption.<sup>57</sup>

Screening and treatment considerations for pregnant women with CUD include:

- Women should be advised to not use cannabis during pregnancy or breastfeeding.<sup>34,57</sup>
- Healthcare providers who work with women during prenatal and postpartum periods should conduct universal screening for cannabis use and offer brief motivational interventions.<sup>58</sup> Pregnant women should receive nonjudgmental support, clear education on the potential risks of cannabis use during pregnancy, and referral to treatment services when appropriate.<sup>3</sup>
- Women should receive education on the risks associated with continued cannabis use while parenting, particularly in the context of newborn health and safety.<sup>36</sup> Infants may be exposed to harmful chemicals, including THC and other contaminants, through breast milk or secondhand smoke. Cannabis use may also impair caregiver judgment and caregiving capacity, potentially affecting the ability to meet an infant's needs and maintain a safe environment. Such impairments may increase the risk of SIDS associated with secondhand cannabis smoke exposure, as well as the risk of accidental suffocation related to co-sleeping with a parent under the influence of cannabis.<sup>35</sup>
- Inaccurate or incomplete reporting of cannabis use during pregnancy can occur for several reasons, including guilt, fear of legal or child welfare consequences, social stigma, poor recall, or limitations in screening tools or interviewer training.<sup>59</sup>
- Brief electronic or text messaging interventions for reducing cannabis use during pregnancy and the postpartum period may further promote maternal and newborn health.<sup>58</sup>
- Healthcare providers who work with pregnant women should be aware of specific mandated reporting requirements for their state and the potential legal and social consequences of identifying substance use in their patients. Providers should counsel patients about the boundaries of confidentiality and emphasize that the purpose of screening is to facilitate treatment for substance use.<sup>60</sup>

## Screening and Treatment Considerations for Older Adults

Healthcare providers working with older adults should be aware that this population is susceptible to several risk factors for development of CUD, including experiencing chronic pain, bereavement, social isolation, and loneliness.<sup>61</sup> This population commonly has complex medical needs, often involving multiple medications to treat ongoing physical conditions and mental disorders. This complexity can heighten the risk of drug–drug interactions when cannabis is used. Older adults may be more likely than other age groups to use cannabis for medical purposes, including pain relief, managing symptoms related to mental health issues, and improving sleep.<sup>62</sup>

Few studies have been conducted on CUD in this population, but research suggests that SUD, including CUD, are underdiagnosed and undertreated in older adults.<sup>4</sup> This lack of treatment further amplifies the already elevated risks older adults face from cannabis use, including vehicular accidents, falls, mental issues, cardiovascular events (e.g., stroke, heart attack), pulmonary adverse events, and drug–drug interactions with commonly used medications.<sup>61</sup> Research has also shown that older adults have greater substance use treatment adherence and better treatment outcomes than younger people.<sup>4</sup>

Screening and treatment considerations for older adults with CUD include:

- Healthcare providers working with older adults should routinely screen for CUD and provide education on the risks associated with cannabis use, as harms in this population can be significant.<sup>62</sup> Acute medical episodes linked to cannabis are increasing among older adults, underscoring the need for systematic assessment.<sup>63</sup> Clinicians should incorporate brief counseling on cannabis-related health risks into routine care, including following up on emergency department encounters in which cannabis use may have contributed.
- Healthcare providers working with older adults can refer people who need treatment to evidence-based psychological treatment providers of motivational interviewing, CBT, and CM.<sup>4</sup>
- Older adults may develop physical and cognitive limitations as they age. Therapy should be tailored to address individual patient needs. For example, healthcare providers may consider repeating key points at a slower pace, offering shorter sessions, and presenting information in varied formats when appropriate.<sup>61</sup> Healthcare providers can also ask structured, nonconfrontational questions and encourage patients to bolster their social support networks.

## Screening and Treatment Gaps: Future Directions

Screening for and treating CUD is made difficult by challenges related to accurately assessing how much cannabis patients use.<sup>64</sup> While information on amount used (e.g., number of puffs or joints, number of milligrams of THC), product potency, route of administration, and frequency of use is critical, collecting these details requires more numerous and detailed questions during screening.<sup>22</sup> Consequently, developing a standardized measure of cannabis consumption is important for evaluating health risks, informing public health and prevention efforts, and measuring outcomes in clinical trials for CUD.

However, standardized measurement alone may be insufficient. As with opioids, distinguishing between medical and recreational cannabis use is important when evaluating patterns of use and associated consequences.<sup>22</sup> The presence of dual-use motives may complicate distinguishing between medical and recreational cannabis use.<sup>18</sup> Recreational motives (e.g., coping, boredom, enjoyment) have been linked to disordered cannabis use among medical cannabis patients.

Additionally, some patients may claim medical use without formal clinical authorization or have underlying motives that do not align with therapeutic use. Future research should prioritize brief, clinically feasible questionnaires that capture key cannabis use patterns, motives for use, and high-risk behaviors (e.g., daily or near-daily use, consumption of high-potency products, or use in unsafe contexts).

Currently, there is no FDA-approved medication to treat CUD.<sup>4</sup> Psychological interventions, such as CBT, MET, and CM, are the most effective treatment approaches, particularly when used together. Given age-specific differences in patterns and contexts of disordered cannabis use, tailoring interventions within a personalized, developmental framework may improve treatment outcomes. However, because optimal treatment strategies for each population remain poorly defined, additional comparative effectiveness studies are needed that examine various therapeutic approaches such as CBT, MET, CM, and peer and technology-based supports.

## Resources and Tools

- [988 Suicide & Crisis Lifeline](#) (SAMHSA). Connects people to trained counselors via call, text, or chat 24 hours a day, 7 days a week.
- [Addiction Technology Transfer Center Network](#) (SAMHSA). Develops and strengthens the SUD treatment and recovery workforce.
- [Advisory: Cannabidiol \(CBD\)—Potential Harms, Side Effects, and Unknowns](#) (SAMHSA). Presents an overview of CBD, how it is derived, and its risks and harms.
- [Advisory: Digital Therapeutics for Management and Treatment in Behavioral Health](#) (SAMHSA). Reviews digital therapeutic research, policy implications, and key implementation considerations.
- [Advisory: Substance Use Disorder Treatment for People with Co-occurring Disorders](#) (SAMHSA). Presents effective strategies for counselors and administrators to manage screening, assessment, and treatment of patients with co-occurring substance use and mental disorders.
- [Advisory: Using Motivational Interviewing in Substance Use Disorder Treatment](#) (SAMHSA). Describes strategies healthcare providers can use to promote positive client outcomes.
- [Advisory: Using SAMHSA Funds to Implement Evidence-Based Contingency Management Services](#) (SAMHSA). Explores CM for SUD and key treatment models, clinical impacts, and guardrails.
- [Brief Counseling for Marijuana Dependence: A Manual for Treating Adults](#) (SAMHSA). Offers guidance on common treatment issues, assessment, and motivational interventions.
- [Brief Interventions and Brief Therapies for Substance Abuse](#) (SAMHSA). Describes brief interventions and therapy techniques for the treatment of alcohol and drug misuse.
- [Center of Excellence for Integrated Health Solutions](#) (SAMHSA). Offers evidence-based resources, tools, training, and technical assistance to help organizations improve collaborative care.
- [Center for Mental Health Implementation Support](#) (SAMHSA). Supports health systems in implementing effective mental health and SUD treatment.
- [FindTreatment.gov](#) (SAMHSA). Connects people to mental health and SUD treatment resources.
- [Know the Effects, Risks and Side Effects of Marijuana](#) (SAMHSA). Provides statistics, videos, and other resources to address marijuana use.
- [Marijuana and Pregnancy](#) (SAMHSA). Discusses harms of marijuana use during pregnancy.
- [Marijuana: The Risks Are Real](#) (SAMHSA). Highlights the risks associated with marijuana use.
- [Prevention Technology Transfer Center Network](#) (SAMHSA). Provides training and technical assistance for the substance use prevention field.
- [Screening, Brief Intervention, and Referral to Treatment \(SBIRT\)](#) (SAMHSA). Provides an overview of SBIRT, testimonials, and reimbursement coding for screening and brief intervention.

# **SAMHSA**ADVISORY

- [TIP 35: \*Enhancing Motivation for Change in Substance Use Disorder Treatment\*](#) (SAMHSA). Offers guidance on person-centered, motivation-enhancing approaches in SUD treatment.
- [Alcohol and Substance Abuse Branch](#) (Indian Health Service). Supports the planning and implementation of mental health and SUD services for tribal communities.
- [For Your Patients](#) (NIDA). Features SUD educational materials for patients and families.
- [NIDAMED: Clinical Resources](#) (NIDA). Offers substance use and addiction publications, tools, courses, and more.
- [Screening Tools and Prevention](#) (NIDA). Offers evidence-based screening and assessment tools, organized by patient age and substance type.
- [Vaping, Marijuana, and Other Drugs](#) (NIDA). Provides information on medical marijuana, use during pregnancy, and drug use statistics.

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