

Seeking the Chill: Cannabis and Mental Health

Pediatric Health Network





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Pediatrician & Adolescent Addiction
Medicine Physician



Objectives

Why
cannabis?
And why
now?

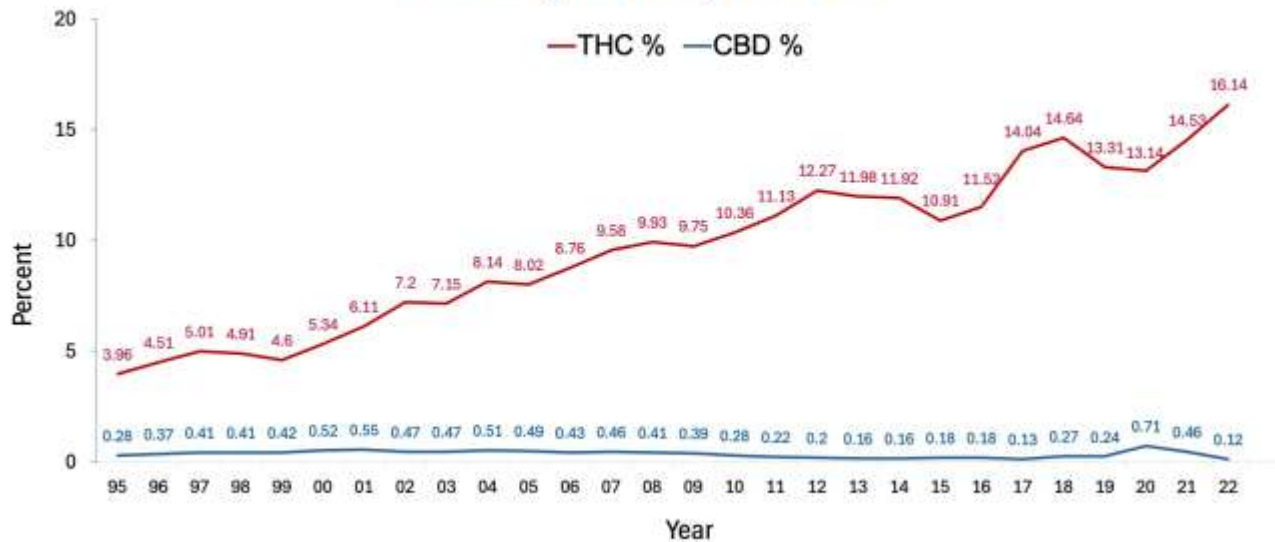
Seeking
the Chill

What
pediatric
clinicians
can do?



Why cannabis? Why now?

Percentage of THC and CBD in Cannabis Samples Seized by the DEA, 1995-2022



SOURCE: U Miss, Potency Monitoring Project



Why cannabis? Why now?

Explore Premium Cannabis Products at Doobie District

Brands Specials Search OPEN MENU Medical Login

< All Flower Sort: Popular List

	Doobie District-Flower-Melonade-Hybrid Doobie District Hybrid THC: 19.10%	3.5g \$24.91
	Molecular Farms-Flower-North Star-Sativa Molecular Farms Sativa THC: 17.6%	3.5g \$49.84
	Blossomz-Flower-Illuminate OG-Indica Hybrid Blossomz Indica THC: 18.54% Hot Pick	3.5g \$34.59 Save \$2.00 off
	Khalifa Kush-Flower-Point Breeze-Hybrid Thatta Kush Hybrid THC: 15.30%	3.5g \$44.56 Save \$2.00 off



Why cannabis? Why now?

Explore Premium Cannabis Products at Doobie District

The screenshot shows a website interface for 'Doobie District' with a navigation bar at the top containing 'Brands', 'Specials', 'Search', 'OPEN', 'MENU Medical', 'Login', and a shopping cart icon. Below the navigation bar, the page title is '< All Vaporizers' with a 'Sort: Popular' dropdown and a 'List' view toggle. The main content area displays four product listings, each with a small image, a title, a brand name, a category, and a price tag with a green plus sign indicating availability.

Product Name	Brand	Category	Price
Dampen-Disposable Vape-Pineapple Orange Guava-Sativa	Dampen	Sativa	\$69.75
Alt Sol-Cartridge-Blue Cheese-Hybrid	Alt	Hybrid	\$64.79
Alt Sol-Cartridge-Permanent Marker-Hybrid	Alt	Hybrid	\$64.79
Molecular Farms-Disposable Vape-Pineapple Express-Hybrid	Molecular Farms	Hybrid	\$69.75



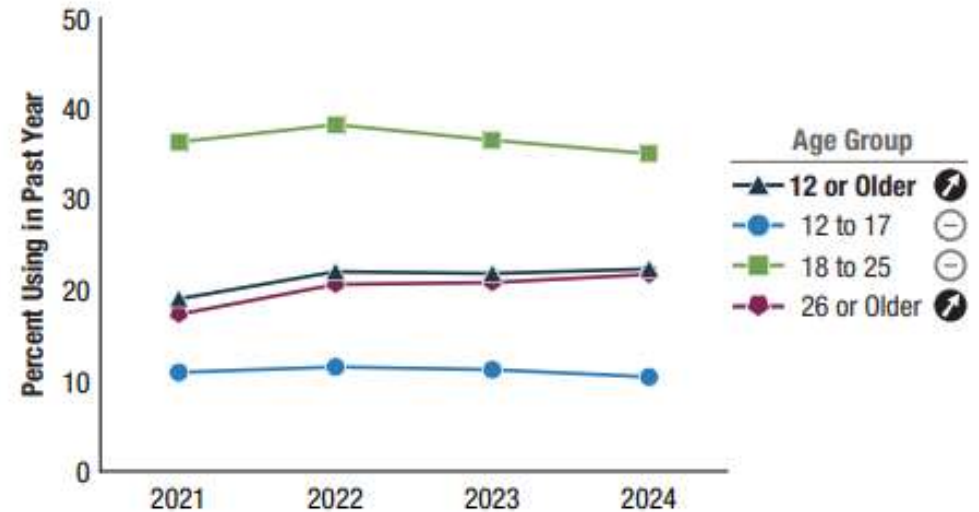
Rates of Cannabis Use

Figure 15 Table. Past Year Marijuana Use: Among People Aged 12 or Older; Percentages, 2021-2024

Age Group	2021	2022	2023	2024	Trend
12 or Older	19.0	22.0	21.8	22.3	⬆️ Increased
12 to 17	10.9	11.5	11.2	10.4	⊖ No Change
18 to 25	36.3	38.2	36.5	35.0	⊖ No Change
26 or Older	17.3	20.6	20.8	21.7	⬆️ Increased

Key Substance Use and Mental Health Indicators in the United States: Results from the 2024 National Survey on Drug Use and Health.

Figure 15. Past Year Marijuana Use: Among People Aged 12 or Older; 2021-2024





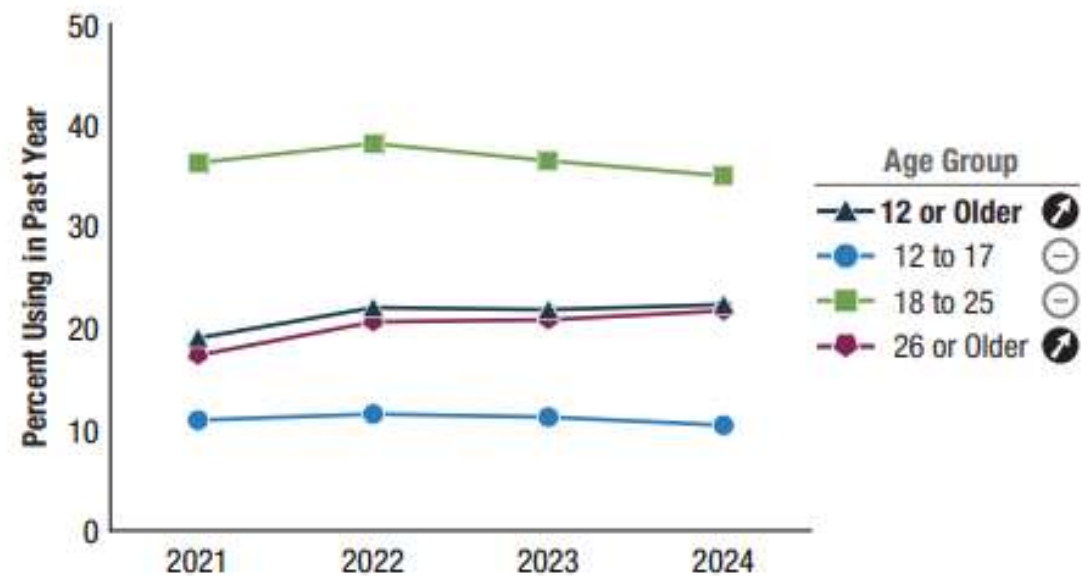
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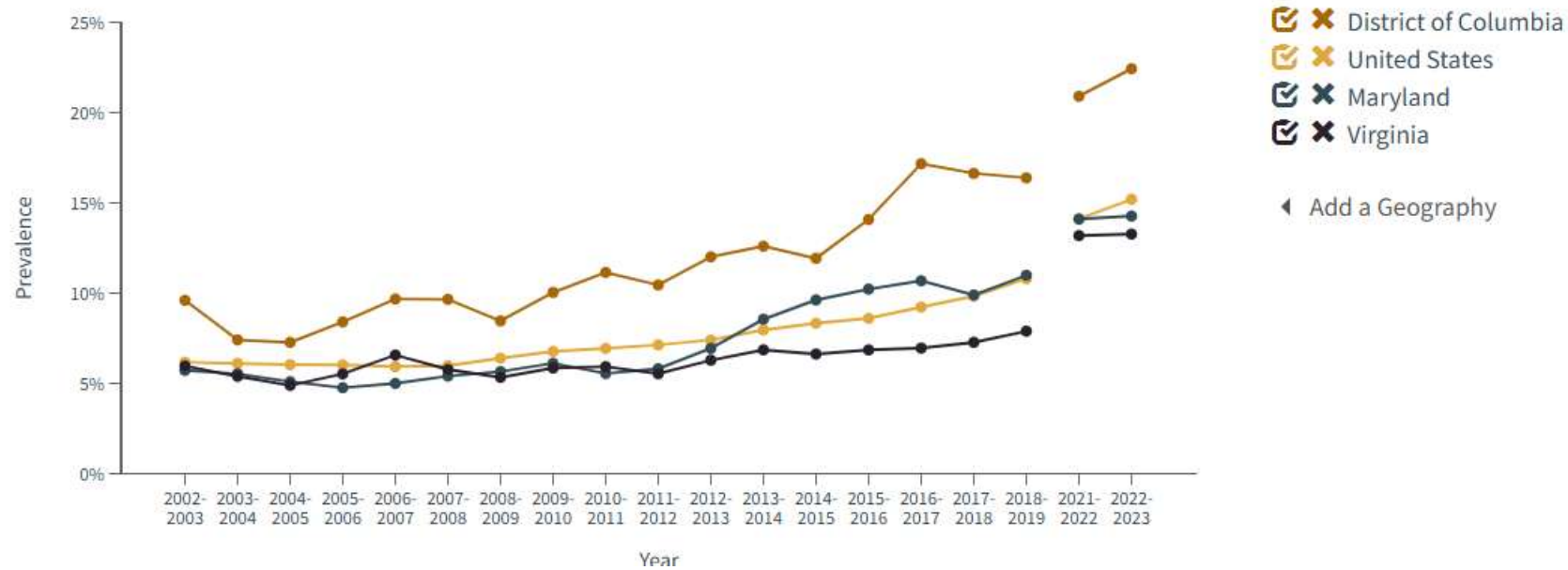
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Cannabis use in the DMV area

Marijuana Use in Past Month Among Individuals Aged 12 or Older, by Geographic Area

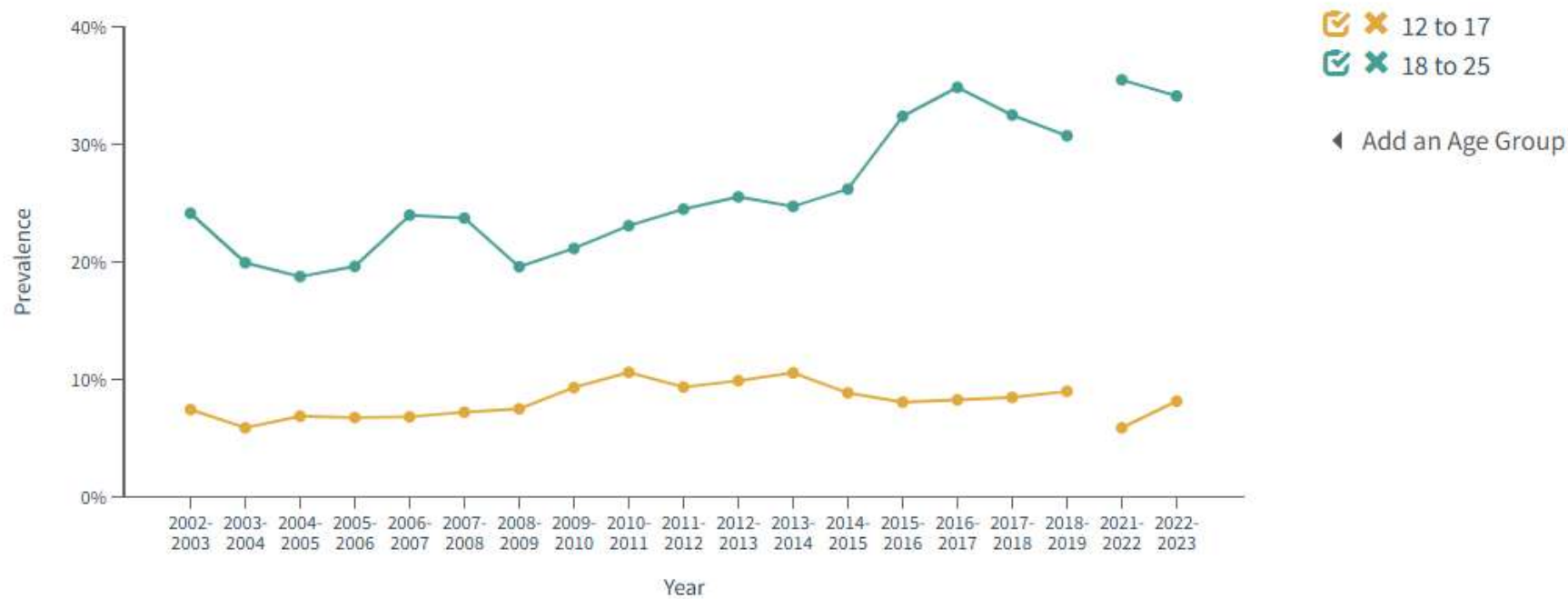


Substance Abuse and Mental Health Services Administration. (2023). NSDUH state estimates. <https://datatools.samhsa.gov/>



Cannabis use in DC

Marijuana Use in Past Month in the District of Columbia, by Age Group



Substance Abuse and Mental Health Services Administration. (2023). NSDUH state estimates. <https://datatools.samhsa.gov/>



Cannabis Use in DC

Month	2026	2025	2024	2023	2022
January	-	\$4,597,995	\$4,002,493	\$5,045,858	\$4,159,680
February	-	\$4,611,846	\$4,129,430	\$4,775,081	\$4,217,644
March	-	\$5,913,109	\$4,171,422	\$5,824,991	\$5,271,255
April	-	\$8,955,050	\$5,048,497	\$5,869,022	\$4,931,305
May	-	\$8,982,688	\$4,566,379	\$5,486,093	\$4,387,603
June	-	\$8,432,503	\$4,394,417	\$5,066,665	\$4,743,468
July	-	\$8,837,848	\$4,492,439	\$4,667,151	\$4,572,797
August	-	\$8,245,291	\$4,520,332	\$4,732,772	\$4,813,614
September	-	\$7,821,780	\$3,884,222	\$4,409,929	\$4,483,376
October	-	\$8,960,855	\$4,525,250	\$4,761,615	\$4,706,819
November	-	\$8,474,852	\$4,026,120	\$4,615,669	\$5,066,430
December	-	\$9,087,476	\$4,076,657	\$4,773,798	\$5,292,115
Total	\$0	\$92,921,293	\$51,837,658	\$60,028,644	\$56,646,106

Last updated: May 5, 2026

Source: Washington DC Alcoholic Beverage and Cannabis Administration



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“Seeking the Chill”

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Yes. I used it sparingly at 14, knowing it was wise to not get stoned every day, but just using it twice a month or so at the start i would progressively and subconsciously get more comfortable with using it more frequently until i was ripping bongos at least 3 times a day in college and skipping classes and homework until i failed out. It never made me dumb, but i do think it has affected my memory a bit and my motivation.

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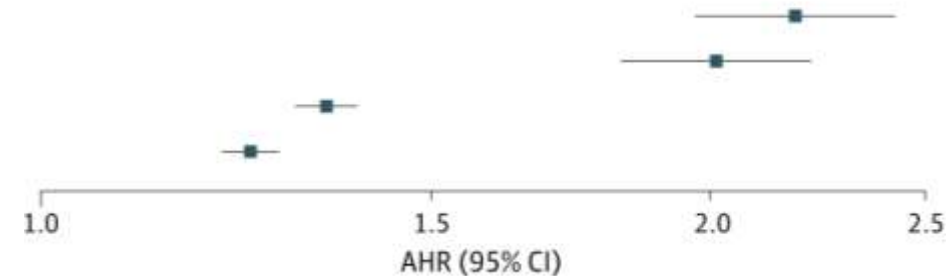


Can cannabis improve mental health?

Figure. Forest Plot of Associations of Self-Reported Past-Year Cannabis Use Among 463 396 Adolescents Aged 13 to 17 Years and Incident Psychiatric Disorders Up to Age 26 Years

Young-Wolff KC, Cortez CA, Alexeeff SE, et al. Adolescent Cannabis Use and Risk of Psychotic, Bipolar, Depressive, and Anxiety Disorders. *JAMA Health Forum*. 2026;7(2):e256839. doi:10.1001/jamahealthforum.2025.6839

Outcome	Diagnoses, No.	AHR (95% CI)
Psychotic disorder	4105	2.19 (1.97-2.42)
Bipolar disorder	4061	2.01 (1.82-2.22)
Depressive disorder	62 137	1.34 (1.30-1.39)
Anxiety disorder	73 096	1.24 (1.21-1.28)

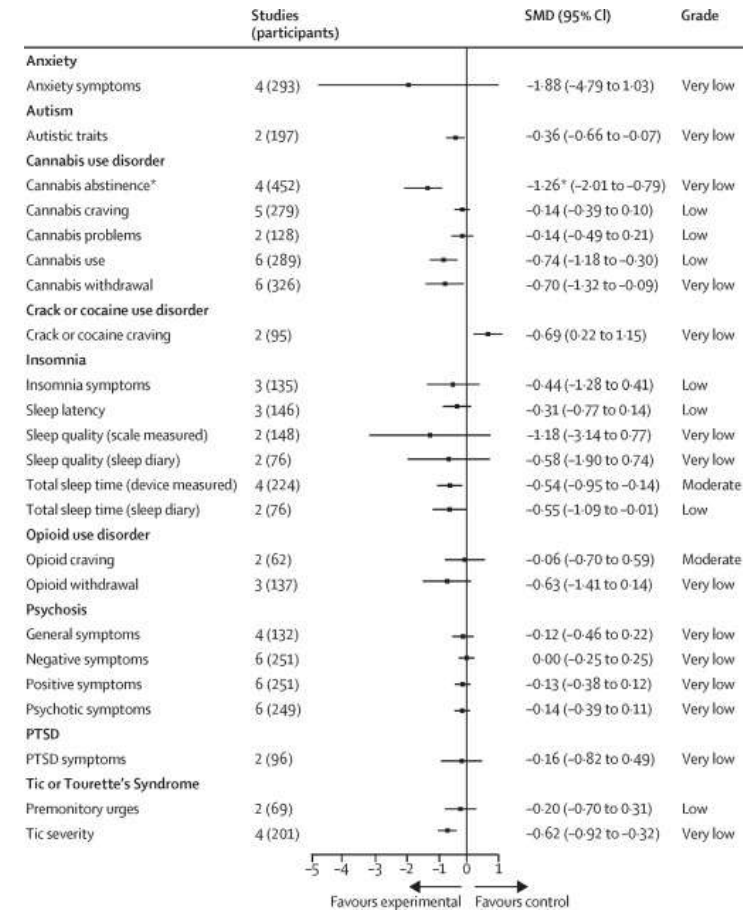




Can cannabis improve mental health?

Summary of meta-analyses on the efficacy of cannabinoids for the treatment of mental disorder and substance use disorder primary outcomes.

Wilson J, Dobson O, Langcake A et al. The efficacy and safety of cannabinoids for the treatment of mental disorders and substance use disorders: a systematic review and meta-analysis. *The Lancet Psychiatry*, 2026; 13, 304-315





Can cannabis improve mental health?

Kansagara D, Terry GE, Ayers CK, D'Souza DC. Cannabis and Mental Health: A Review. *JAMA Intern Med.* 2026;186(5):618–628. doi:10.1001/jamainternmed.2025.8215

Table 2. Summary of Mental Health Effects of Cannabis and Cannabinoids

Condition	Cannabinoid(s) studied	Summary of evidence	Source
PTSD	THC, CBD, and nabilone	Cannabis did not reduce PTSD symptom severity or improve other mental health symptoms in patients with PTSD (low-certainty evidence)	Cannabis for the Management of Symptoms of PTSD ¹⁶
Anxiety	• THC • CBD, 150-300 mg	• THC: Very uncertain • CBD: May reduce anxiety symptoms (low-certainty evidence)	Cannabis for Anxiety and Mood Disorders ¹⁷
Depression	Unspecified	Very uncertain	Cannabis for Anxiety and Mood Disorders ¹⁷
Bipolar disorder	• THC • CBD	• THC: Cannabis associated with worsened mania and decreased likelihood of recovery and remission (low-certainty evidence) • CBD: Very uncertain	Cannabis for Anxiety and Mood Disorders ¹⁷
Psychosis	THC	• Heavy cannabis use (especially in adolescence) increased the risk of developing chronic psychotic disorders • Experiencing cannabis-induced psychosis also worsened this risk • Those with first-degree relatives with psychotic spectrum disorder were at higher risk • In those with established psychotic disorders, cannabis was associated with worse disease outcomes	• Petrilli et al, ¹⁸ 2022 • Marconi et al, ¹⁹ 2016 • Murrie et al, ²⁰ 2020 • Schoeler et al, ²¹ 2016
ADHD	Balanced THC and CBD	1 Small trial showed no significant effects on ADHD symptoms	Francisco et al, ²² 2023
CUD	THC	• CUD prevalence of approximately 30% among people who use cannabis; higher risk for younger age, male sex, and those with SUD history • Cannabis withdrawal syndrome possible with cessation • Treatment options limited; some evidence for CBT, MET, and CM; no pharmacological options	• Prevalence and Risk of Developing Cannabis Use Disorder in Adults Who Use Cannabis ²³ • VA/DoD Clinical Practice Guideline for the Management of Substance Use Disorders ²⁴ • Pharmacotherapy for the Treatment of Cannabis Use Disorder ²⁵
Cognition	THC	• Acute intoxication is associated with mild to moderate deficits in verbal learning, working memory, executive functioning, and processing speed (depending on dose) • Adolescents with heavy or chronic use may experience slight declines in IQ; for adults, cognitive effects are likely to resolve with extended abstinence, although the effect of duration of use and abstinence on these improvements are not well understood	• Brody et al, ²⁶ 2016 • Dellazizzo et al, ²⁷ 2022 • Power et al, ²⁸ 2021



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PTSD **THC, CBD, and nabilone** **Cannabis did not reduce PTSD symptom severity or improve other mental health symptoms in patients with PTSD (low-certainty evidence)** **Cannabis for the Management of Symptoms of PTSD¹⁶**

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Cannabis for Anxiety and Mood Disorders¹⁷

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Cannabis for Anxiety and Mood Disorders¹⁷

Depression Unspecified Very uncertain

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Psychosis	THC	• Heavy cannabis use (especially in adolescence) increased the risk of developing chronic psychotic disorders • Experiencing cannabis-induced psychosis also worsened their risk	• Petrilli et al, ¹⁸ 2022 • Marconi et al, ¹⁹ 2016 • Murrie et al, ²⁰ 2020 • Schoeter et al, ²¹ 2016
CUD	THC	• CUD prevalence of approximately 30% among people who use cannabis; higher risk for younger age, male sex, and those with SUD history • Cannabis withdrawal syndrome possible with cessation • Treatment options limited; some evidence for CBT, MET, and CM; no pharmacological options	• Prevalence and Risk of Developing Cannabis Use Disorder in Adults Who Use Cannabis ²³ • VA/DoD Clinical Practice Guideline for the Management of Substance Use Disorders ²⁴ • Pharmacotherapy for the Treatment of Cannabis Use Disorder ²⁵
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Bipolar disorder

- THC
- CBD

• THC: Cannabis associated with worsened mania and decreased likelihood of recovery and remission

Cannabis for Anxiety and Mood Disorders¹⁷

Kansagara D, Terry GE, Ayers CK, D'Souza DC. Cannabis and Mental Health: A Review. *JAMA Intern Med.* 2026;186(5):618-628. doi:10.1001/jamainternmed.2025.8215



Can cannabis improve mental health?

Table 2. Summary of Mental Health Effects of Cannabis and Cannabinoids

Condition	Cannabinoid(s) studied	Summary of evidence	Source
PTSD	THC, CBD, and nabilone	Cannabis did not reduce PTSD symptom severity or improve other mental health symptoms in patients with PTSD (low-certainty evidence)	Cannabis for the Management of Symptoms of PTSD ¹⁶
Anxiety	• THC • CBD, 150-300 mg	• THC: Very uncertain • CBD: May reduce anxiety symptoms (low-certainty evidence)	Cannabis for Anxiety and Mood Disorders ¹⁷
Depression	Unspecified	Very uncertain	Cannabis for Anxiety and Mood Disorders ¹⁷
Bipolar disorder	• THC • CBD	• THC: Cannabis associated with worsened mania and decreased likelihood of recovery and remission (low-certainty evidence) • CBD: Very uncertain	Cannabis for Anxiety and Mood Disorders ¹⁷
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Psychosis **THC**

- Heavy cannabis use (especially in adolescence) increased the risk of developing chronic psychotic disorders
- Petrilli et al,¹⁸ 2022
- Marconi et al,¹⁹ 2016
- Murrie et al,²⁰ 2020

	CBD		
CUD	THC	<ul style="list-style-type: none"> • CUD prevalence of approximately 30% among people who use cannabis; higher risk for younger age, male sex, and those with SUD history • Cannabis withdrawal syndrome possible with cessation • Treatment options limited; some evidence for CBT, MET, and CM; no pharmacological options 	<ul style="list-style-type: none"> • Prevalence and Risk of Developing Cannabis Use Disorder in Adults Who Use Cannabis²¹ • VA/DoD Clinical Practice Guideline for the Management of Substance Use Disorders²⁴ • Pharmacotherapy for the Treatment of Cannabis Use Disorder²⁵
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Kansagara D, Terry GE, Ayers CK, D'Souza DC. Cannabis and Mental Health: A Review. *JAMA Intern Med.* 2026;186(5):618–628. doi:10.1001/jamainternmed.2025.8215



Can cannabis improve mental health?

ADHD **Balanced THC and CBD** **1 Small trial showed no significant effects on ADHD symptoms** **Francisco et al,²² 2023**

Kansagara D, Terry GE, Ayers CK, D'Souza DC. Cannabis and Mental Health: A Review. *JAMA Intern Med.* 2026;186(5):618–628. doi:10.1001/jamainternmed.2025.8215

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Can cannabis improve mental health?

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CUD

THC

- CUD prevalence of approximately 30% among people who use cannabis; higher risk for younger age, male sex, and those with SUD history

Prevalence and Risk of Developing Cannabis Use Disorder in Adults Who Use

THC and CBD symptoms

CUD	THC	<ul style="list-style-type: none"> • CUD prevalence of approximately 30% among people who use cannabis; higher risk for younger age, male sex, and those with SUD history • Cannabis withdrawal syndrome possible with cessation • Treatment options limited; some evidence for CBT, MET, and EM; no pharmacological options 	<ul style="list-style-type: none"> • Prevalence and Risk of Developing Cannabis Use Disorder in Adults Who Use Cannabis²¹ • VA/DoD Clinical Practice Guideline for the Management of Substance Use Disorders²⁴ • Pharmacotherapy for the Treatment of Cannabis Use Disorder²⁵
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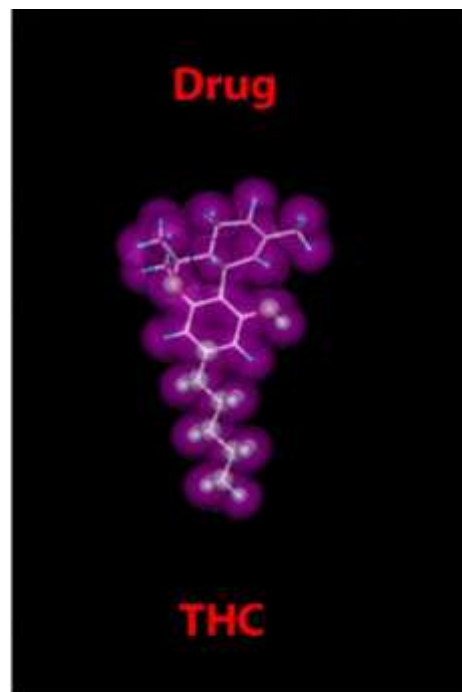
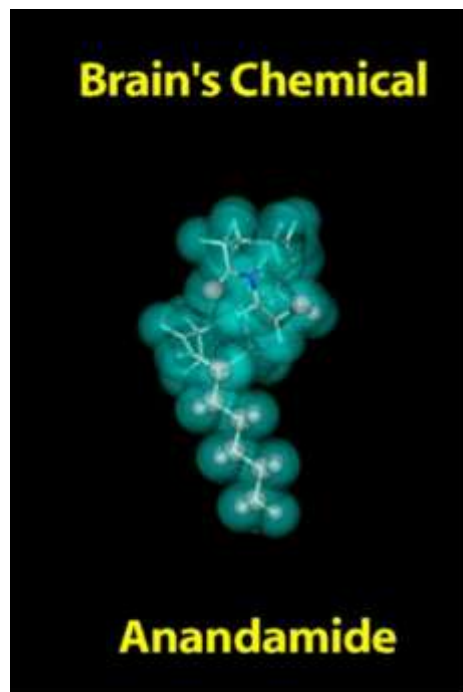
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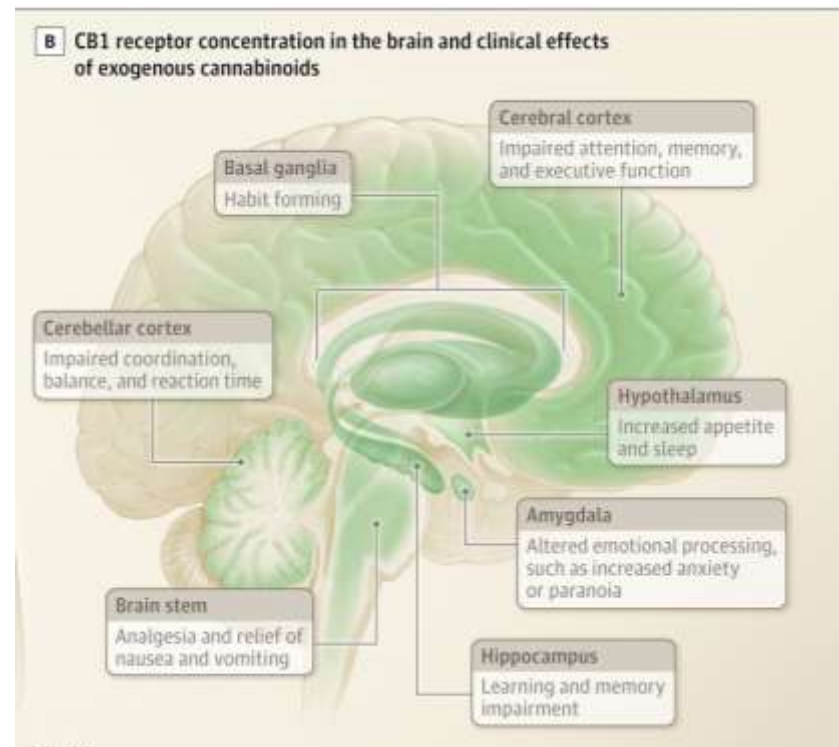
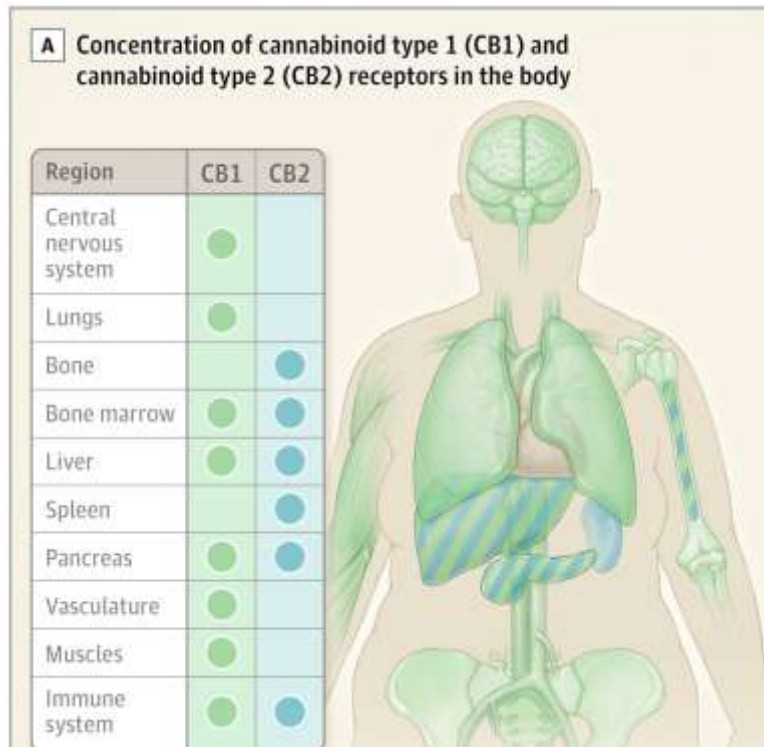
Kansagara D, Terry GE, Ayers CK, D'Souza DC. Cannabis and Mental Health: A Review. *JAMA Intern Med.* 2026;186(5):618–628. doi:10.1001/jamainternmed.2025.8215



So why are adolescents using cannabis?



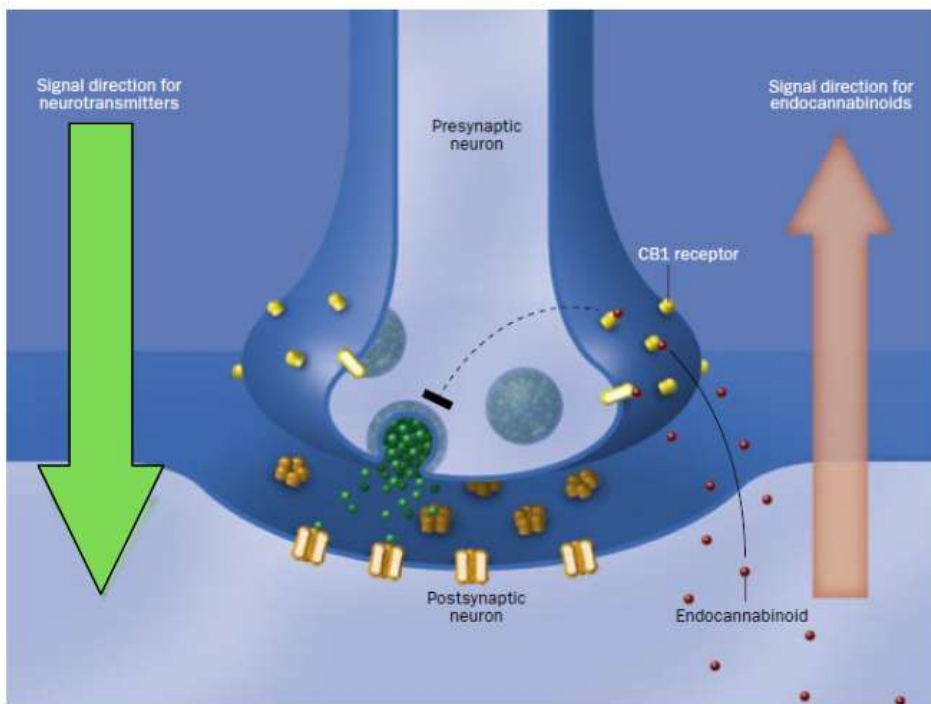
The Endocannabinoid System



Kansagara D, Terry GE, Ayers CK, D'Souza DC. Cannabis and Mental Health: A Review. *JAMA Intern Med.* 2026;186(5):618–628. doi:10.1001/jamainternmed.2025.8215

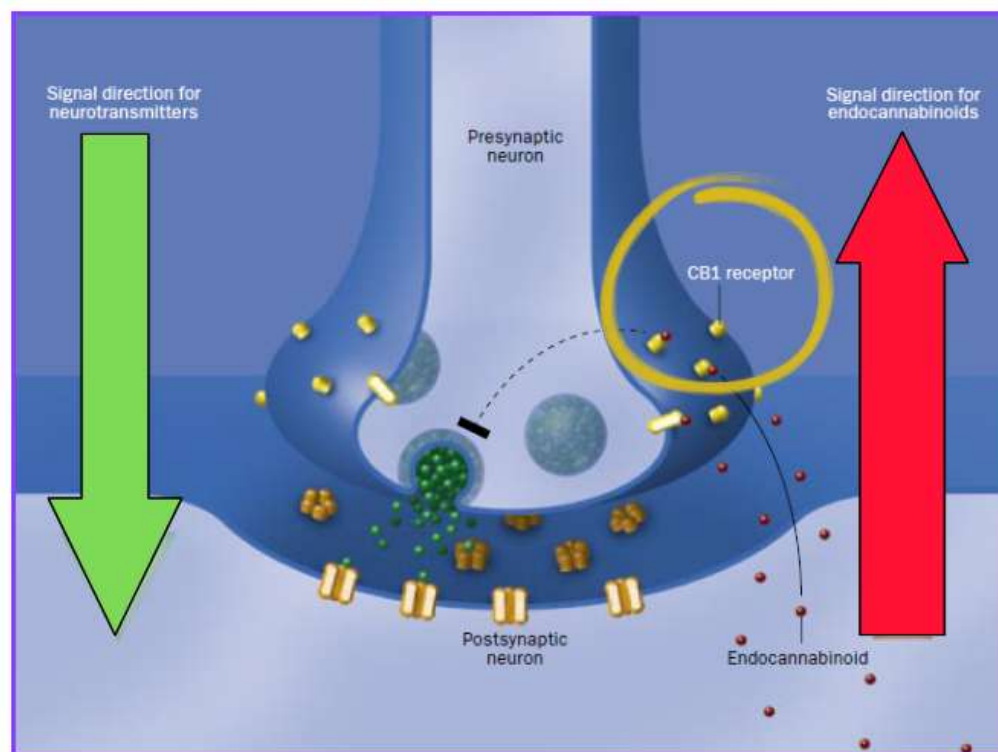


The Endocannabinoid System





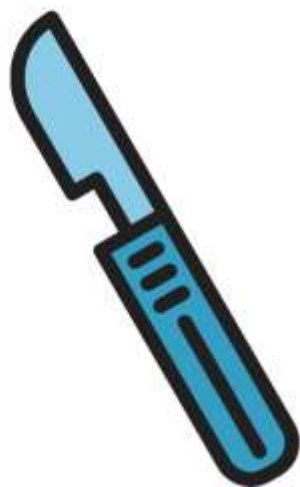
The Endocannabinoid System





The Endocannabinoid System

Andamamide

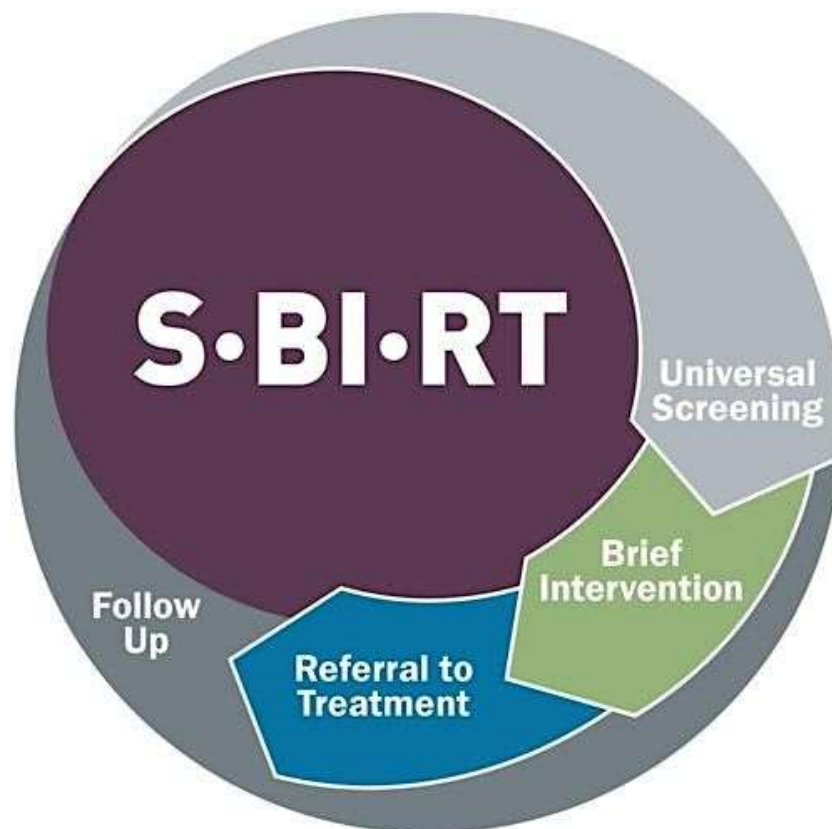


THC





What can you do as a clinician?





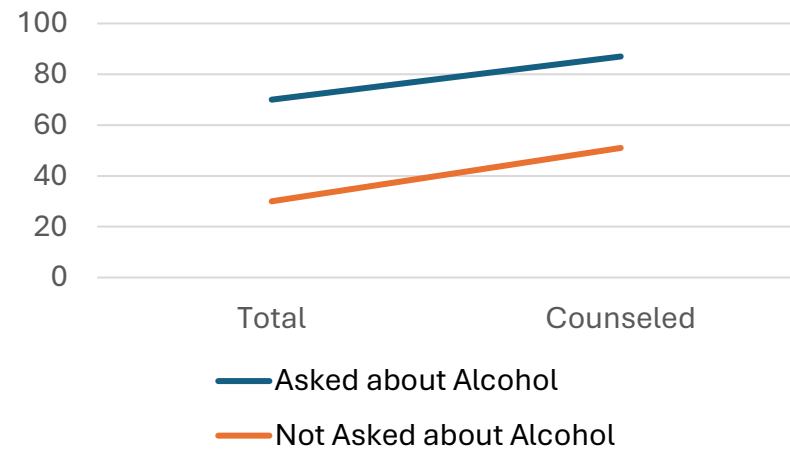
Why screen?





Why screen?

Asking Leads to Counseling



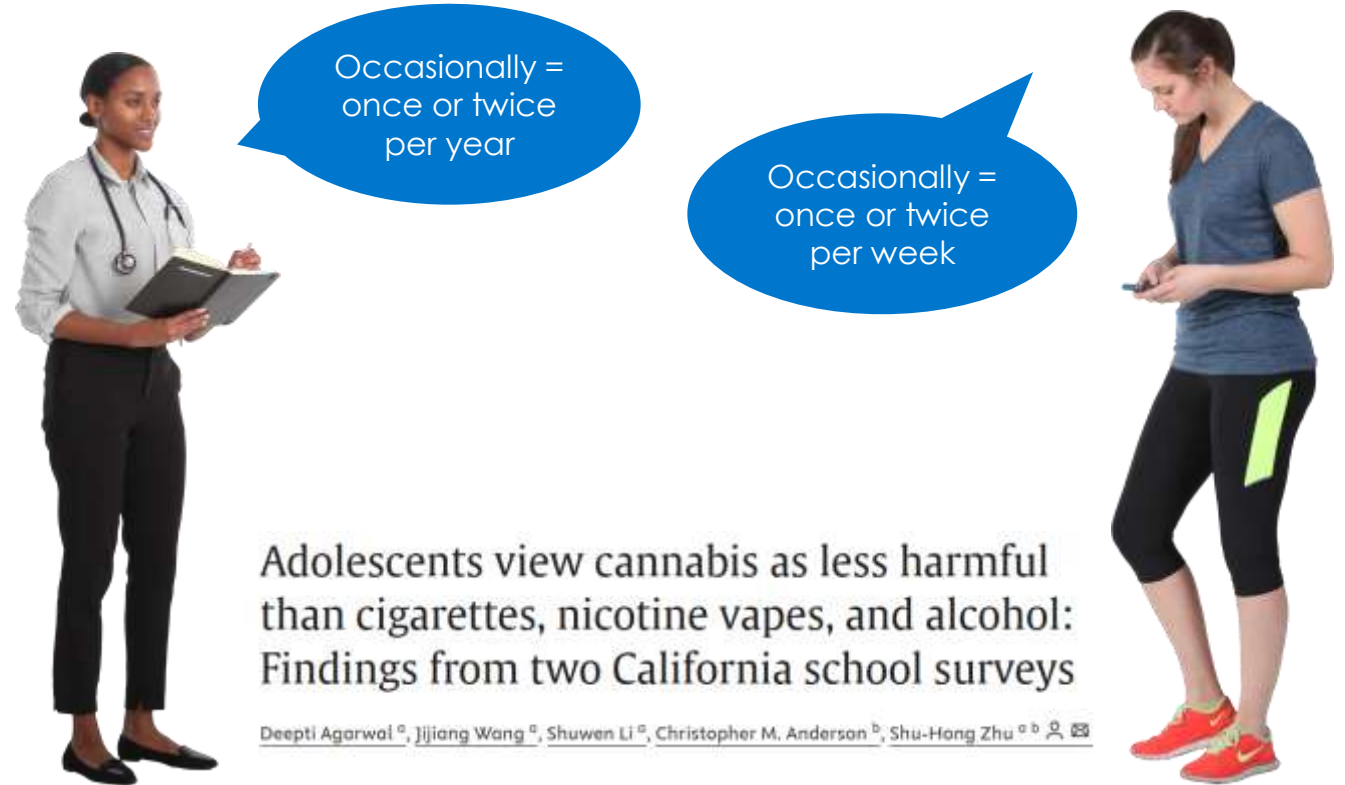
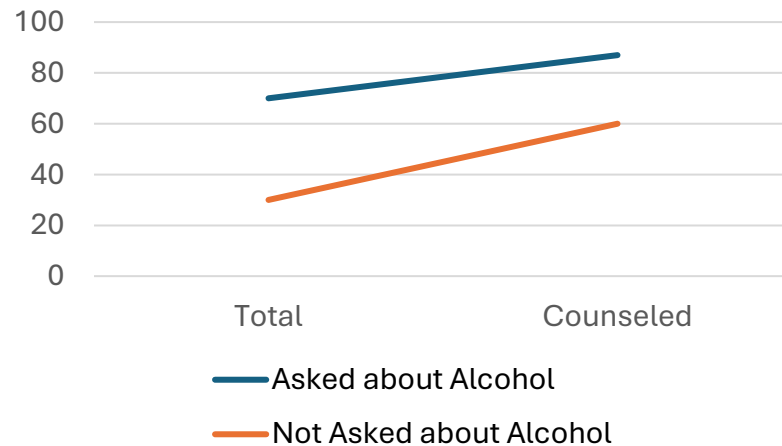
Lunstead J, Weitzman E, Harstad E et al. Screening and Counseling for Alcohol Use in Adolescents With Chronic Medical Conditions in the Ambulatory Setting. *Journal of Adolescent Health*, 64, 804-806





Why screen?

Asking Leads to Counseling



Adolescents view cannabis as less harmful than cigarettes, nicotine vapes, and alcohol: Findings from two California school surveys

Deepti Agarwal ^a, Jijiang Wang ^a, Shuwen Li ^a, Christopher M. Anderson ^b, Shu-Hong Zhu ^{a b}  

Agarwal, Deepti, et al. "Adolescents view cannabis as less harmful than cigarettes, nicotine vapes, and alcohol: Findings from two California school surveys." *Drug and Alcohol Dependence* (2026): 113155.



Screening Options

Exhibit 2: Screeners for Use with Adolescents

	Clinician-Administered		Self-Administered		
	For Screening Use of Other Illicit Drugs				
	For Screening Tobacco Use				
	For Screening Alcohol Use				
Screening to Brief Intervention (S2BI); NIDA	✓	✓	✓	✓	✓
Brief Screener for Alcohol, Tobacco, and Other Drugs (BSTAD); NIDA	✓	✓	✓	✓	✓
Alcohol Screening and Brief Intervention for Youth; NIAAA	✓				✓
CRAFFT; Boston Children's Hospital	✓	✓	✓	✓	✓



Screening Options

BSTAD

Brief Screener for Tobacco, Alcohol, and other Drugs




Brief Screener for Tobacco, Alcohol, and other Drugs

In the PAST YEAR, on how many days did you smoke cigarettes or use other tobacco products?

days

Click and drag on the bar above to select the number of days or type the number of days in the field above.

PREVIOUS 7% complete NEXT

  National Institute on Drug Abuse 

National Institutes of Health - Turning Discovery into Health



Screening Options

S2BI

Screening to Brief Intervention

Screening to Brief Intervention (S2BI) Tool

The following questions will ask about your use, if any, of alcohol, tobacco, and other drugs. Please answer every question by checking the box next to your choice.

IN THE PAST YEAR, HOW MANY TIMES HAVE YOU USED:

Tobacco?

- Never
- Once or twice
- Monthly
- Weekly or more

Alcohol?

- Never
- Once or twice
- Monthly
- Weekly or more

Marijuana?

- Never
- Once or twice
- Monthly
- Weekly or more

S2BI Tool developed at Boston Children's Hospital with support from the National Institute on Drug Abuse.

It is best used in conjunction with "The Adolescent SBIRT Toolkit for Providers" www.mass.gov/maclearinghouse (no charge).

STOP if answers to all previous questions are "never." Otherwise, continue with questions on the back.

OVER



Screening Options

CRAFFT 2.1

Part A

During the PAST 12 MONTHS, on how many days did you:

1. Drink more than a few sips of beer, wine, or any drink containing **alcohol**? Say "0" if none.

of days

2. Use any **marijuana** (cannabis, weed, oil, wax, or hash by smoking, vaping, dabbing, or in edibles) or "**synthetic marijuana**" (like "K2," "Spice")? Say "0" if none.

of days

3. Use **anything else to get high** (like other illegal drugs, pills, prescription or over-the-counter medications, and things that you sniff, huff, vape, or inject)? Say "0" if none.

of days

4. Use a **vaping device*** containing **nicotine and/or flavors**, or use any **tobacco products†**? Say "0" if none.

of days

**Such as e-cigs, mods, pod devices like JUUL, disposable vapes like Puff Bar, vape pens, or e-hookahs. †Cigarettes, cigars, cigarillos, hookahs, chewing tobacco, snuff, snus, dissolvables, or nicotine pouches.*



Screening Options

CRAFT 2.1

Part A

During the PAST 12 MONTHS, on how many days did you:

1. Drink more than a few sips of beer, wine, or any drink containing alcohol? Say "0" if none.

2. Use any marijuana (cannabis; vaping, dabbing, or in edibles "Spice")? Say "0" if none.

3. Use anything else to get high (prescription or over-the-counter pills, huff, vape, or inject)? Say "0" if none.

4. Use a vaping device* containing tobacco products†? Say "0" if none.
*Such as e-cigs, mods, pod devices, vape pens, or e-hookahs. †Cigarets, snuff, snus, dissolvables, or nicotine.

Part B

Circle one

C Have you ever ridden in a **CAR** driven by someone (including yourself) who was "high" or had been using alcohol or drugs? **No** **Yes**

R Do you ever use alcohol or drugs to **RELAX**, feel better about yourself, or fit in? **No** **Yes**

A Do you ever use alcohol or drugs while you are by yourself, or **ALONE**? **No** **Yes**

F Do you ever **FORGET** things you did while using alcohol or drugs? **No** **Yes**

F Do your **FAMILY** or **FRIENDS** ever tell you that you should cut down on your drinking or drug use? **No** **Yes**

T Have you ever gotten into **TROUBLE** while you were using alcohol or drugs? **No** **Yes**



Takeaways

- **Use a validated screener:**
- *“In the past year, how many times have you used?”*



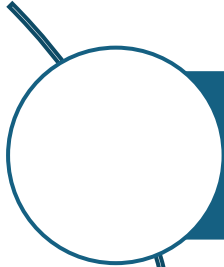
What can you say?

S2BI: Screening to Brief Intervention

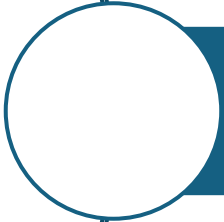
In the past year (12 months), how many times have you used:	Never	Once or twice	Monthly	Weekly
1. Tobacco	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2. Alcohol	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3. Marijuana	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>



What can you say?



Most people your age are not using substances, unlike what it looks like on social media



You're making a great decision for your health!



How to deal with peer pressure: Be direct; Blame it on an adult; Suggest something else



What can you say?

S2BI: Screening to Brief Intervention

In the past year (12 months), how many times have you used:	Never	Once or twice	Monthly	Weekly
1. Tobacco	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2. Alcohol	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
3. Marijuana	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>



What can you say?

S2BI: Screening to Brief Intervention

In the past year (12 months), how many times have you used:	Never	Once or twice	Monthly	Weekly
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2. Alcohol	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
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Yes. I used it sparingly at 14, knowing it was wise to not get stoned every day, but just using it twice a month or so at the start i would progressively and subconsciously get more comfortable with using it more frequently until i was ripping bonges at least 3 times a day in college and skipping classes and homework until i failed out. It never made me dumb, but i do think it has affected my memory a bit and my motivation.



What can you say?

S2BI: Screening to Brief Intervention

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Risks of early substance use

Table. Prevalence of Specific Substance Use Disorders Among Individuals With Lifetime Substance Use Aged 12 to 25 Years by Time Since First Substance Use^a

Measure	Weighted % (95% CI)					P value
	Total	Time since initiation, mo				
		≤12	>12-≤24	>24-≤36	>36	
Lifetime cannabis use, age 12-17 y						
No.	10 800	3500	3300	2000	2100	NA
12-mo Cannabis use disorder						
Unadjusted	15.1 (14.3-16.0)	8.5 (6.2-7.4)	14.0 (12.5-15.5)	18.7 (16.6-20.9)	25.1 (22.8-27.6)	<.001
Adjusted	NA	10.7 (9.3-12.3) ^b	14.6 (13.2-16.2) ^b	16.8 (15.0-18.8) ^b	20.1 (18.0-22.3) ^b	<.001
Lifetime cannabis use, age 18-25 y						
No.	35 100	2100	3300	3800	26 000	NA
12-mo Cannabis use disorder						
Unadjusted	10.2 (9.8-10.7)	4.8 (3.8-6.1)	7.8 (6.7-9.0)	9.4 (8.2-10.7)	11.1 (10.6-11.7)	<.001
Adjusted	NA	6.4 (5.2-7.9)	8.5 (7.4-9.8)	9.1 (8.0-10.4)	10.9 (10.3-11.4)	<.001

Volkow ND, Han B, Einstein EB, Compton WM. Prevalence of Substance Use Disorders by Time Since First Substance Use Among Young People in the US. *JAMA Pediatr.* 2021;175(6):640-643. doi:10.1001/jamapediatrics.2020.6981



Mitigate Risk Factors

- Ask why they use substances? What are the positive effects they gain from use?

“Cool” Belonging	Assess for bullying, friendships, relationships
Experimentation	Assess for ADHD
Coping	Assess for co-occurring mental health disorders



What can you say?

S2BI: Screening to Brief Intervention

In the past year (12 months), how many times have you used:	Never	Once or twice	Monthly	Weekly
1. Tobacco	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2. Alcohol	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3. Marijuana	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>



What can you say?

S2BI: Screening to Brief Intervention

In the past year (12 months), how many times have you used:	Never	Once or twice	Monthly	Weekly
1. Tobacco	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2. Alcohol	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3. Marijuana	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

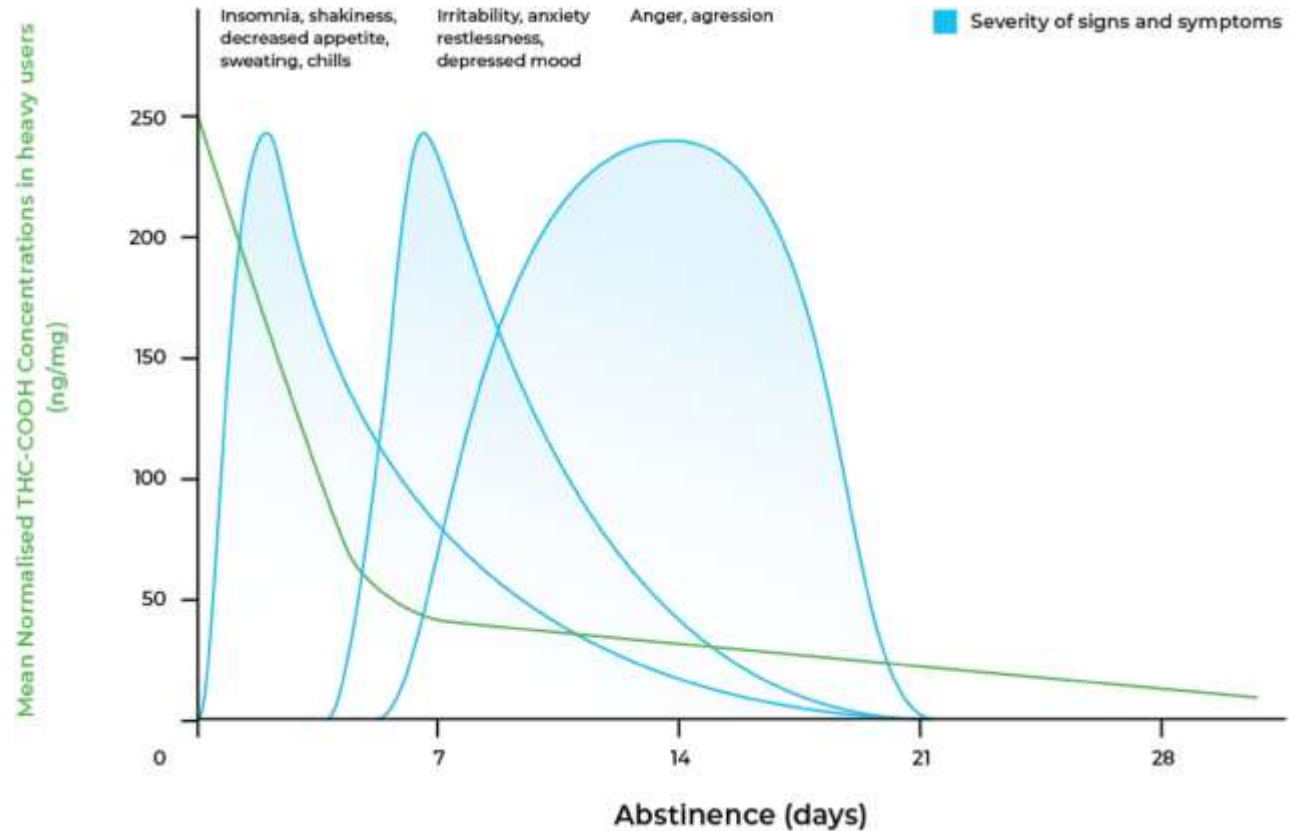
hey, i, like you, decided to start smoking in my freshman year and it has been all fine and dandy. Just remember that although marijuana isnt physically addictive it can be mentally.

I've been smoking constantly for the past few months. I became super suicidal around the beginning of this year, and anti-depressants didn't really do the trick. I took to drinking for awhile, before I started smoking. Now I'm high most of the day but pretty functional. When I take a T-break, I get incredibly depressed. I've developed a pretty shitty tolerance on it. I'm not much of a social smoker, however.



Cannabis Withdrawal

Connor JP, Stjepanović D, Budney AJ, Le Foll B, Hall WD. Clinical management of cannabis withdrawal. *Addiction*. 2022;117:2075–2095. <https://doi.org/10.1111/add.15743>





Treat Withdrawal

- **Anorexia:**
 - cyproheptadine
 - mirtazapine 7.5mg – 15mg QD
- **Nausea:**
 - ondansetron
 - metoclopramide
- **Insomnia:**
 - melatonin
 - hydroxyzine 12.5mg - 25mg QID
 - mirtazapine 7.5mg – 15mg QD

Headaches:

- acetaminophen
- ibuprofen

Anxiety:

- hydroxyzine 12.5mg - 25mg QID
- buspirone 5mg – 7.5mg QD
- clonidine 0.1mg – 0.2mg QD
- mirtazapine 7.5mg – 15mg QD



Treatment for Cravings

- **NAC:**

- » Day 1: 600 mg (1 tablet) with breakfast
- » Day 2: 600 mg with breakfast and 600 mg with dinner
- » Day 3: 1,200 mg with breakfast and 600 mg with dinner
- » Day 4: 1,200 mg BID
- Continue at full dose for 8 weeks or as clinically indicated.

Gray KM, Carpenter MJ, Baker NL, et al. A Double-Blind Randomized Controlled Trial of N-Acetylcysteine in Cannabis-Dependent Adolescents. *Am J Psychiatry*. 2012;169(8):805-812.
doi:10.1176/appi.ajp.2012.12010055



Treatment for Cravings

- Naltrexone:
 - » Day 1: 25mg
 - » Day 2: 50mg

Haney M, Ramesh D, Glass A, Pavlicova M, Bedi G, Cooper ZD. Naltrexone Maintenance Decreases Cannabis Self-Administration and Subjective Effects in Daily Cannabis Smokers. *Neuropsychopharmacology*. 2015 Oct;40(11):2489-98. doi: 10.1038/npp.2015.108. Epub 2015 Apr 16. PMID: 25881117; PMCID: PMC4569951.



Treatment for Cravings

• Gabapentin

- day 1: one 300 mg capsule in the evening
- day 2: one 300 mg capsule in the morning and evening
- day 3: one 300 mg capsule in the morning, at midday, and in the evening
- day 4: one 300 mg capsule in the morning and at midday and two 300 mg capsules in the evening

Mason BJ, Crean R, Goodell V, et al. A Proof-of-Concept Randomized Controlled Study of Gabapentin: Effects on Cannabis Use, Withdrawal and Executive Function Deficits in Cannabis-Dependent Adults. *Neuropsychopharmacology*. 2012;37(7):1689-1698. doi:10.1038/npp.2012.14

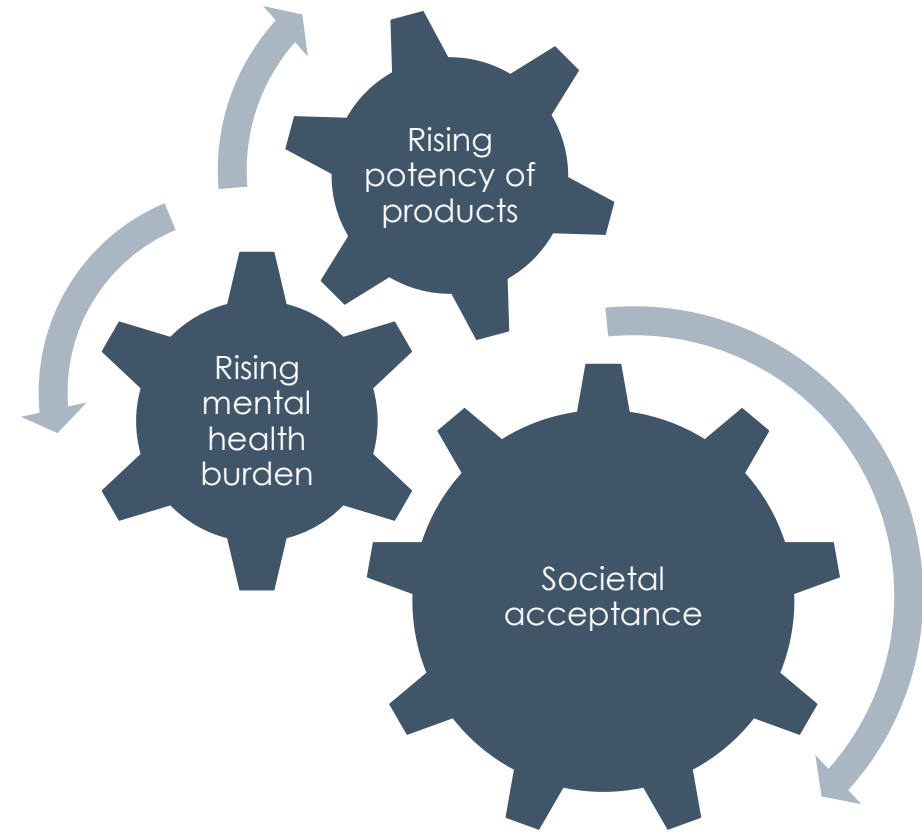


Cannabis and Mental Health





Cannabis and Mental Health





Does any of this work?

Table.

Multilevel logistic/negative binomial regression analyses examining mental health and substance use diagnoses and medical comorbidity over 7 years postindex among all eligible patients (n = 1,871)

	Alcohol disorder diagnosis		Any drug disorder diagnosis		Marijuana disorder diagnosis		Tobacco disorder diagnosis	
	OR	p-value	OR	p-value	OR	p-value	OR	p-value
Intercept	0.02 (0.00–0.13)	<.001	0.05 (0.01–0.37)	.003	0.08 (0.01–0.74)	.026	0.01 (0.00–0.03)	<.001
SBIRT Group (vs. Usual Care)	0.69 (0.51–0.94)	.017	0.73 (0.54–0.98)	.036	0.70 (0.50–0.98)	.037	0.83 (0.69–1.00)	.046

Sterling S, Parthasarathy S, Jones A, et al. Young Adult Substance Use and Healthcare Use Associated With Screening, Brief Intervention and Referral to Treatment in Pediatric Primary Care. Journal of Adolescent Health, 71, S15-S23



Does any of this work?

	Alcohol disorder diagnosis		Any drug disorder diagnosis		Marijuana disorder diagnosis		Tobacco disorder diagnosis	
	OR	<i>p</i> -value	OR	<i>p</i> -value	OR	<i>p</i> -value	OR	<i>p</i> -value
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I was so, so nervous to bring this up to a doctor and I'm so glad I did. It's too early to tell whether this medication will work for me, but just opening a dialogue with a health care professional about it has made me feel so much better. Also, like some of you, I believe that I have undiagnosed depression that I used marijuana to cope with, and I'm excited to be trying something that might help with that.



Takeaways

<p align="center"><u>Screening</u> Evidence-based screening tools: S2B1, CRAFFT 2.1, BSTAD</p>	<p align="center">“During the past 12 months, how many times did you...?”</p>
<p align="center"><u>Brief Intervention</u> Motivational Interviewing</p>	<p align="center">Tie it to their health - make it RELEVANT to them. Get to the root of the problem - offer help in other SAFER ways. Offer evidence-based medications.</p>
<p align="center"><u>Referral to Treatment</u></p>	<p align="center"><u>CNH Addictions Program</u> Takoma Theatre, 6833 4th St NW Washington DC, 20012 202-729-3300 https://www.childrensnational.org/get-care/departments/addictions-program</p>
	<p align="center">athakur@childrensnational.org</p>



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