Federation of Tax Administrators
Tobacco Section

From Sea to Shining Sea: State Cannabis Taxation

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Abstract

This paper provides an overview of state taxation of cannabis in the United States. The paper details each state’s cannabis tax system, provides a historical background of the imposition of federal law and states’ regulations, provides to-date tax revenue collections, highlights state compliance and administration challenges, examines tax policy considerations, including the imposition of various cannabis taxes, and discusses federal executive and legislative developments.

Disclaimer

The views expressed are those of the authors and should not be attributed to the Texas Comptroller of Public Accounts.
Acknowledgments

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Introduction

Some of the common street names for marijuana or cannabis are Aunt Mary, BC Bud, Blunts, Boom, Chronic, Dope, Gangster, Ganja, Grass, Hash, Herb, Hydro, Indo, Joint, Kif, Mary Jane, Mota, Pot, Reefer, Sinsemilia, Skunk, Smoke, Weed, and Yerba. We will use the term “cannabis” throughout this paper. Cannabis is a psychoactive (mind-altering) drug made from dried buds and leaves of the Cannabis sativa plant. Among the plant’s many active chemical compounds, delta-9-tetrahydrocannabinol (THC) and cannabidiol (CBD) are the most commonly known. CBD is derived from hemp. Hemp is any part of the cannabis sativa plant with no more than 0.3% of THC. THC is believed to be the main ingredient producing cannabis’ psychoactive effect. Cannabis is considered a controlled substance, meaning a drug that is placed under federal government regulation, including manufacture, possession, and sale. Also, the Food and Drug Administration (FDA) has not approved the use of the cannabis plant as medicine. Despite cannabis’ treatment on the federal level, a growing number of states have decriminalized and legalized medical and recreational use of cannabis and have been collecting revenue from its taxation for the last several years. As cannabis use has become a more legally and socially accepted part of the domestic market, its legalization and taxation has landed high on the list of the hottest topics in state taxation. This paper covers important issues impacting state governments, such as taxation, revenue collections, federal legal landscape, tax policy considerations, compliance, and administration.

From the start, one core argument for the legalization of cannabis has been the potential revenue to fund government services through taxes. Cannabis taxes also presented an option to increase revenue for states that faced budget shortfalls caused, in part, by the COVID-19 pandemic.

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11 National Conference of State Legislatures, Fiscal Brief, State Taxation of Cannabis (January 2021), p.3.
Revenue collection has been robust in several jurisdictions with established markets where cannabis taxes have surpassed alcohol and cigarette tax collections.\(^{12}\)

The underlying aim of cannabis legalization is to reduce illegal sales and provide regulation of poor quality or high potency products. Taxing cannabis sales should help fund government services and address negative consequences of cannabis consumption. The challenge of taxing cannabis is achieving these goals without creating an overly complex tax system.\(^{13}\)

With 21 states having some type of recreational cannabis tax, no best practices or uniform approach exists. The lack of uniformity and many uncertainties continue to challenge states considering cannabis legalization. One major uncertainty is cannabis’ status on the federal level. Although the federal government has chosen not to interfere with states that have legalized it, cannabis is still classified as an illegal, Schedule I controlled substance. Due to cannabis’ federal classification, state cannabis businesses are not able to access banking services or many federal deductions that are available to most other businesses.\(^{14}\) The lack of access to banking services makes cannabis industry a cash-intensive business. Also, cannabis businesses do not qualify for many of the protections traditionally afforded to other businesses, such as insurance.

The discrepancy between the state and federal legality presents a unique legal framework under which cannabis use and sales operate, and this effectively complicates the domestic market. Cannabis products cannot be legally transported across state borders, so the entire process (seed-to-consumer) must occur within state borders. This unusual situation has resulted in a wide variety of tax designs and ongoing discourse and change.\(^{15}\)

Different states levy different taxes, with some even levying multiple taxes, including excise taxes as well as general sales tax on cannabis purchases. Although some jurisdictions impose local cannabis taxes, they are not discussed in this paper.\(^{16}\)

The three main ways states tax recreational cannabis may be categorized as follows:

- Percentage-of-price: tax on the price of the product (like general sales tax, but typically at higher rates;\(^{17}\) \textit{i.e.}, an ad valorem tax\(^{18}\)).
- Weight-based: tax on the weight of the product (similar to per-pack cigarette taxes).

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• Potency-based: tax on potency (i.e., THC level) of the product (similar to alcoholic beverages taxes).

The variety of approaches to state cannabis taxation and each state’s unique features, such as population, also make comparison of rates across the states challenging. Each state has different tax schemes, population, and market size. For example, Washington has the highest statewide retail-level tax at 37%. New York is the first state to implement a potency-based tax by milligrams of THC.19

Most state cannabis tax systems have existed for only a year or two, and many have operated exclusively without competition from neighboring states. The possibility of major federal cannabis law reforms could radically change how cannabis is sold and taxed in states across the U.S.20

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Imposition of Federal Law and States’ Regulation

Since 1970, “marihuana,” which includes all parts of the Cannabis sativa plant, has been listed in Schedule I of the Controlled Substances Act (CSA) due to its high potential for abuse attributable to THC effects and the absence of currently accepted medical use. While cannabis is classified as a controlled substance under federal law and its possession is prohibited under the CSA, 21 states and Washington, D.C. have legalized the possession of cannabis for recreational use. The following section briefly summarizes the history of cannabis regulation.

Growing and consuming cannabis was legal in the U.S. until the 1910s when the states, not the federal government, started to enact laws criminalizing cannabis. In 1937, the federal government followed suit by passing the Marijuana Tax Act (MTA). Prior to criminalizing the plant, cannabis was included in the United States Pharmacopoeia, the list of permissible and federally approved medicines. Regulation continued, until cannabis was classified as a Schedule I narcotic in 1970. Cannabis’ classification in the CSA placed it alongside LSD, heroin, and other substances deemed highly addictive and without safe dosages. Under the CSA, the manufacture, distribution and possession of Schedule I narcotics is prohibited, carrying criminal sentences of up to life in prison.

In the 1990s, the states took the initiative again to change cannabis’ legal classification through state policy action. States started to adopt their own regulations, unwinding federal ones. There were several increasingly important changes that supported the states in adopting new regulations. First, there was an increase in popular and political support for the use of medical cannabis by seriously ill patients. Second, the war on drugs proved futile in controlling a substance that continued to be easy to acquire. Third, large amounts of resources were spent on enforcement of cannabis laws.

The first state to enact medical cannabis use was California, where voters passed Proposition 215 in 1996. To protect doctors’ federal Drug Enforcement Agency (DEA) licenses, the proposition only required a doctor to give an oral or written “recommendation,” not an actual prescription of medical cannabis. As of this writing, medical cannabis is legal in 37 states.

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In 2013, under President Obama’s administration, the Department of Justice (DOJ) issued a memo (the Cole Memorandum) stating that the DOJ would not enforce federal marijuana prohibition in states that "legalized marijuana in some form and ... implemented strong and effective regulatory and enforcement systems to control the cultivation, distribution, sale, and possession of marijuana," with certain exceptions. The Cole Memorandum was rescinded in 2018 by Attorney General Jeff Sessions, during President Trump’s administration. In response to this, the Sensible Enforcement of Cannabis Act, which attempted to enshrine into law the protections offered by the memorandum, was introduced, but not enacted.

In October 2022, President Biden pardoned thousands of Americans convicted for possession of cannabis and ordered a review of the drug’s legal status. Biden also urged state governors to issue similar pardons for state offenses involving cannabis. It would take an act of Congress to decriminalize cannabis. Although lawmakers have not acted on the matter, the issue has gained support among members of both parties. Aside from Congressional action, the Department of Justice has independent authority under the CSA to begin the process of removing cannabis’ classification as a Schedule I drug.

Cannabis’ removal from the list of the most dangerous drugs would change the federal and, in turn, state regulatory landscape, materially impacting cannabis businesses – which then would be allowed to bank and be listed on U.S. stock exchanges. It would also do away with certain tax burdens for these businesses and make them eligible for some tax benefits.

For example, Internal Revenue Code (IRC) of 1982, Section 280E prohibits a taxpayer from deducting or claiming credits for the business expenses of any trade or business that “consists of trafficking in controlled substances (within the meaning of Schedule I and II of the CSA).” Thus, even where the sale of cannabis is legal under state law, Section 280E denies deducting ordinary and necessary business expenses such as “rent, utilities, compensation, costs of administration, and charitable gifts to promote goodwill.” Many states conform to the

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31 The courts have repeatedly rejected constitutional concerns about section 280E and have sided with the IRS in determining that even businesses in states where cannabis sales are legal aren’t entitled to deduct their business expenses. However, those businesses may offset their gross receipts by the cost of goods sold when calculating their gross income. Wesley Elmore, Biden Review of Marijuana Scheduling Could Have Tax Implications, Tax Notes Federal, Vol. 177, October 10, 2022.
provisions of the IRC for corporate and/or personal income tax purposes, including Section 280E application in determining state taxable income. A few states (such as Colorado and Oregon) have enacted a provision that modifies their conformity to allow cannabis businesses to deduct business expenses on their state returns that would otherwise be nondeductible because of Section 280E.\textsuperscript{33}

If cannabis is added or moved to a lower schedule under the CSA (Schedule III\textsuperscript{34}) or descheduled, this would allow the tax deduction and remove the credit prohibitions on cannabis businesses. There are several decriminalization bills in Congress, including the Marijuana Opportunity Reinvestment and Expungement Act (H.R. 3617), which passed the House in April 2022; and the Cannabis Administration and Opportunity Act (S. 4591), introduced in the Senate in July 2022. Among several changes, H.R. 3617 would impose a tax on cannabis products produced in or imported into the U.S. and an occupation tax on cannabis production facilities and export warehouses.\textsuperscript{35} This would regulate cannabis and impose an excise tax on cannabis products like the taxes imposed on alcohol and tobacco products.\textsuperscript{36}

Federal legalization could allow multinational corporations to grow cannabis on an industrial scale and ship it across state lines, which may result in a significant drop in cannabis product prices. The price drops may, in turn, affect state revenue collections from cannabis taxes, while possibly increasing other revenue sources, such as corporate income taxes.\textsuperscript{37}

States face several concerns and challenges, such as coming up with effective regulations to address black-market competition, the proliferation of high-potency THC products, and preventing youth from accessing the drug.\textsuperscript{38} Legalization of cannabis would remove the cloud of uncertainty over state programs that have been attempting to provide safe, regulated access to the public, while ensuring a robust and inclusive framework for legalization to come to fruition.\textsuperscript{39} For the moment, federal laws continue to conflict with state legalization, which creates instability and uncertainty as states begin to institute cannabis reform.\textsuperscript{40}

\textsuperscript{34} Schedule III drugs have less potential for abuse or dependence and include products with less than 90 milligrams of codeine per dose, as well as ketamine and anabolic steroids. Wesley Elmore, Biden Review of Marijuana Scheduling Could Have Tax Implications, Tax Notes Federal, Vol. 177, October 10, 2022.
\textsuperscript{36} Wesley Elmore, Biden Review of Marijuana Scheduling Could Have Tax Implications, Tax Notes Federal, Vol. 177, October 10, 2022.
\textsuperscript{37} Cannabis Update, FTA, Alex Spelman SICPA, February 28, 2021.
State Cannabis Taxation

Aside from the societal and political support for (medical) cannabis that began to increase in the 1990s, states have also discovered the immense revenue potential for both businesses and local and state governments. As of this writing, 21 states have enacted recreational cannabis taxes. Most states levy an excise tax at the retail and/or wholesale level, with several states applying excise taxes at both levels. Although Connecticut, New York, Rhode Island, Vermont, and Virginia have enacted a cannabis tax, they have not yet begun taxing sales. The District of Columbia and Minnesota also legalized recreational cannabis possession, but neither jurisdiction imposes a cannabis tax. Maryland and Missouri voters approved legalization of recreational cannabis in the November 2022 midterm elections, whereas voters in Arkansas, North Dakota, and South Dakota rejected legalization proposals. Currently, states with cannabis taxes levy three types of excise taxes: a percentage-of-price tax, a weight-based tax, and a potency-based tax.

Price-Based Taxes
In most states, cannabis excise taxes are based on the retail price and imposed at the point of sale. A percentage-of-price cannabis tax is similar to a general sales tax. It is calculated as a percentage of the retail price, paid by the consumer and remitted to the government by the retailer. Cannabis taxes are typically higher than the state general sales tax rates, ranging from 10% to 37%. The price-based tax is the most popular among the states, with 11 states solely levying this excise tax and five states using it in addition to another tax. In contrast, California, Illinois, and New Jersey impose gross receipts taxes.

Weight-Based Taxes
Akin to other “sin taxes,” such as alcohol and tobacco, weight-based taxes are based on weight or quantity and not the price. These taxes vary based on the part of the plant being sold. The calculation method for these taxes varies among states. A cultivator is responsible for paying the tax following the sale of its product to a distributor or retailer. The tax is then incorporated into the purchase price paid by a consumer. Alaska and New Jersey exclusively use weight-based taxes, whereas Colorado, Maine, and Nevada use both price-based and weight-based taxes.

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42 See National Conference of State Legislatures, Fiscal Brief, State Taxation of Cannabis (January 2021).
43 In 2014, DC voters approved the legalization of recreational cannabis, but Congress prevents the District from regulating and taxing legal transactions. Urban Institute and Brooking Institution, Tax Policy Center, The Pros and Cons of Cannabis Taxes, by Richard Auxier and Nikhita Airi (September 28, 2022), p.4.
Potency-Based Taxes
Potency-based taxes are like taxes on liquor: They are based on the product’s content.\textsuperscript{49} Potency-based taxes on cannabis are based on the product’s THC content, because the THC level is the primary psychoactive compound in cannabis. Connecticut exclusively levies a potency-based tax, whereas Illinois and New York use price-based and potency-based taxes.\textsuperscript{50}

Stamp Tax
Some states levy a “stamp tax” or “controlled substance tax,” historically imposed on the sale or possession of illegal drugs. These taxes are generally payable by the sellers of the illegal drugs by requiring them to purchase official stamps from the state’s department of revenue that are affixed to the product as evidence of payment of the tax, hence the name “stamp tax.”\textsuperscript{51}

General Sales Tax
Of the 21 states with cannabis excise taxes, 12 states also impose a general sales tax on the purchase of cannabis. Colorado, Maine, and New York exempt cannabis purchases from their general sales tax. Montana, Oregon, and Alaska do not have a general sales tax.\textsuperscript{52}

Retail Sales Tax and Use Tax Revenue from Medical Cannabis
The tax rates imposed on medical cannabis sales are generally not as burdensome as the excise taxes imposed on recreational cannabis. Unless specifically exempt, medical cannabis is usually subject to retail sales tax.\textsuperscript{53}

Table 1
State Cannabis Taxes

<table>
<thead>
<tr>
<th>State</th>
<th>Price-based</th>
<th>Weight-based</th>
<th>Potency-based</th>
<th>General sales tax</th>
</tr>
</thead>
<tbody>
<tr>
<td>Alaska</td>
<td></td>
<td>X</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Arizona</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>California</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Colorado</td>
<td>X</td>
<td>X</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Connecticut</td>
<td>X</td>
<td>X</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Illinois</td>
<td>X</td>
<td>X</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Maine</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Massachusetts</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
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<tr>
<td>Michigan</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

\textsuperscript{49} See National Conference of State Legislatures, Fiscal Brief, State Taxation of Cannabis (January 2021).
<table>
<thead>
<tr>
<th>State</th>
<th>Legal Status</th>
<th>Taxable Sales</th>
</tr>
</thead>
<tbody>
<tr>
<td>Montana</td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Nevada</td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>New Jersey</td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>New Mexico</td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>New York</td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Oregon</td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Rhode Island</td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Vermont</td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Virginia</td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Washington</td>
<td>X</td>
<td></td>
</tr>
</tbody>
</table>

Source: Table based on information from the Urban Institute and Brooking Institution.\(^{54}\)
Note: Connecticut, New York, Rhode Island, Vermont, and Virginia have enacted taxes but have not yet begun taxable sales.

**Figure 1**
Legal Status of Cannabis by State

Source: Based on information from The Center for Advancing Health (CFAH).\(^{55}\)
Notes: In Alabama, medical cannabis use is only legal in the form of non-psychoactive CBD oil for children with epilepsy. In South Carolina, medical cannabis use is only legal in the form of CBD oil with less than 0.9% THC for people with Dravet syndrome, Lennox-Gastaut syndrome, or refractory epilepsy.


State Cannabis Tax Revenue Collections

Revenue continues to be the main motivator for legalized recreational cannabis. State cannabis tax collections totaled nearly 1% of the total state general tax revenues. Several states provided their state revenue collections from cannabis taxes, which are included in Table 2 below. As evidenced in the table, cannabis revenues have increased annually and demonstrated resiliency throughout the COVID-19 pandemic, with robust growth in many cases.

Table 2
State Revenue from Cannabis Taxes (medical use and/or recreational use)
(in millions of dollars, fiscal year period July 1 through June 30)

<table>
<thead>
<tr>
<th></th>
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<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Alaska*</td>
<td></td>
<td></td>
<td></td>
<td>1.8</td>
<td>10.8</td>
<td>19.1</td>
<td>24.2</td>
<td>30.1</td>
<td>86.0</td>
</tr>
<tr>
<td>California**</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>56.4</td>
<td>261.2</td>
<td>426.3</td>
<td>819.0</td>
<td>1,562.9</td>
</tr>
<tr>
<td>Colorado***</td>
<td>12.0</td>
<td>66.0</td>
<td>109.7</td>
<td>169.8</td>
<td>235.2</td>
<td>251.8</td>
<td>307.3</td>
<td>410.6</td>
<td>1,562.4</td>
</tr>
<tr>
<td>Illinois</td>
<td>0.5</td>
<td>1.9</td>
<td>3.9</td>
<td>5.9</td>
<td>66.9</td>
<td>340.9</td>
<td>420.0</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Washington****</td>
<td>0.0</td>
<td>64.6</td>
<td>186.1</td>
<td>315.2</td>
<td>362.0</td>
<td>390.4</td>
<td>469.2</td>
<td>555.4</td>
<td>2,342.9</td>
</tr>
</tbody>
</table>

Source: State agencies, including state departments of revenue.
Notes:
*Alaska – Cannabis tax revenue is from cultivation. There is no tax on final sales and no breakout of medical versus recreational. FY 2022 values are preliminary as of Nov. 30, 2022.
**California – Imposition of California cannabis taxes became operative on Jan. 1, 2018. Cannabis taxes apply to recreational and medical cannabis at the same rates.
***Colorado – Tax on cannabis (recreational sales and excise) began on Jan. 1, 2014. Cannabis sales tax increased from 10% to 15% on July 1, 2017. Cannabis excise tax is 15%, but the average market rates fluctuate quarterly.
****Washington – Prior to FY 2016, the cannabis excise tax was based on a three-tier model. The tax was levied at 25% at the production level, 25% at the processor level, and 25% at the retail level. Beginning in FY 2016 to date, the excise tax is only levied on retail sales at 37%.

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Figure 2  
State Revenue from Cannabis Taxes, FYs 2014-2021 (medical use and/or recreational use) (in millions)

[Cannabis Taxes Revenues FYs 2014-2021 (in millions)]

Note: Chart based on data from state agencies.

Figure 3  
Share of State Revenue from Cannabis, Alcoholic Beverage, and Cigarette/Tobacco Taxes, FYs 2018-2021

[Share of Total State Tax Revenue, FYs 2018-2021 Alaska, California, Colorado, Illinois, and Washington]

Note: Chart based on data from state agencies.
Figure 3
California State Revenue from “Sin Taxes,” FYs 2018-2021 (in millions)

Source: Chart based on data from California Department of Tax and Fee Administration.

Figure 4
Colorado Revenue from Cannabis, Alcoholic Beverage, and Cigarette/Tobacco Taxes, FYs 2014-2021 (in millions)

Source: Chart based on data from Colorado Department of Revenue.
Forecasting Challenges and Tax Revenue Allocation

Although cannabis tax collections are performing well overall, they are not an immediate or infallible revenue solution. According to the Pew Charitable Trust, it has been difficult to accurately forecast cannabis tax revenues. Some states have underestimated revenue (e.g., Nevada exceeded projections by 45%), others overestimated revenue (e.g., California missed projections by 45%) and some, like Colorado, were close to projections. With this still unpredictable revenue potential, states should consider setting up trust funds or another mechanism during high revenue periods to balance low revenue periods.58

Cannabis legalization and taxation should not be seen as an immediate band-aid or a magic bullet for budget shortfalls. It can take years to fully develop effective regulations, licenses, and a legal framework and for revenues to match expectations (see examples of Colorado and Washington).59

58 See National Conference of State Legislatures, Fiscal Brief, State Taxation of Cannabis (January 2021).
State Tax Policy Considerations

“We don’t know the best way to tax cannabis, and even if we knew at first, that way would soon prove wrong.” – Pat Oglesby, cannabis taxation professional.\(^6\)

Setting cannabis tax rates is certainly a balancing act. On one side of the scale is the rationale of using excise taxes to make “sin” products cost prohibitive – especially for young and occasional users. On the other side of the scale is collecting enough from the “sin” taxes to draw users out of the illicit market and to use these taxes to offset costs to society created or exacerbated by the consumption of cannabis products.\(^6\)

As states grapple with setting tax rates for cannabis sales, they juggle several factors: determining the best balance between dissuading occasional use and curbing (ideally, eliminating) customer participation in the illicit market; balancing the medical and recreational cannabis tax rates; and the complexity inherent in competing tax rates between neighboring states.

One goal of implementing an excise tax on cannabis sales is like that of other “sin” taxes: to dissuade the consumption of the product by raising the price. The increased price limits consumption by young and occasional users.

However, increasing the “sin” tax too high may further allow the illicit market to thrive. Combining effective cannabis taxes from most states, we observe relatively high rates – between 20% and 40%. These high rates keep illicit sales attractive, as a 2019 study of California suggests that illegal cannabis sellers outnumbered legal ones by almost three-to-one.\(^6\)

The second factor in considering tax rates is the differences between medical cannabis sales tax rates and those for recreational use. The typically lower tax rates for medical cannabis, which predate taxes on recreational cannabis, create a downward pressure on recreational cannabis tax rates.\(^6\)

Lastly, as legalization increases across more states, significant tax differences will be reflected in product pricing – leading consumers to travel across state borders to purchase cheaper cannabis in neighboring states. As more data becomes available and states gain greater experience in administering their cannabis tax programs, some states, such as Colorado and Washington, are considering lowering their tax rates. In contrast, others are considering increasing their taxes. For example, Massachusetts increased its cannabis excise tax rate from 3.5% to 10.75% when


\(^{6}\) See National Conference of State Legislatures, Fiscal Brief, State Taxation of Cannabis (January 2021).

\(^{6}\) See National Conference of State Legislatures, Fiscal Brief, State Taxation of Cannabis (January 2021).
revenue expectations were not met.\textsuperscript{64} Continuing to share intended and unexpected outcomes of cannabis taxation among states should help all states develop the most appropriate rates for their needs.

Thus, for states that have not yet settled on the best rate, there is an additional challenge with tax design – that of the variety of cannabis products currently on the market as well as any new products that will enter the market in the future. Current products vary from pre-rolled joints and brownies to THC-infused sparkling water. State tax systems must be flexible enough to adjust to new products as they enter the market.\textsuperscript{65}

To date, most states have applied a price-based tax on retail sales of recreational cannabis. The advantage of this type of a tax is that it allows for simplicity as there is a taxable event with a transaction, allowing for simple valuation. The downside is that it is not neutral or equitable. It has been argued that to tax cannabis efficiently, the tax should be levied at a rate that corresponds to the social costs or externalities associated with the product. These externalities do not share association with the price.\textsuperscript{66}

It has been suggested that weight-based taxes are more resistant to volatility in the long term as prices tend to drop when markets mature. However, this type of tax may lead to the consumption of higher-potency cannabis products, as the potency or quality is not considered in this tax approach. This type of tax is also more burdensome as far as compliance and its administration. Moreover, studies suggest that THC content is not equivalent to alcohol content and does not necessarily determine potency. Therefore, potency may not be as reliable of a measure as alcohol content is for liquor taxes.\textsuperscript{67}

The challenges and opportunities states face in creating their cannabis taxation system may be as unique as the states themselves. Could a state directly sell cannabis to consumers in the same way that some governments operate liquor stores (e.g., Virginia or Canadian provinces)?\textsuperscript{68} Even when a state has established a taxation system, its work is never complete, as cannabis laws and markets evolve. For example, Alaska Gov. Mike Dunleavy established a task force to review and recommend reforms to the state’s taxation of its legal marijuana industry, which the task force issued on January 13, 2023.\textsuperscript{69}

\textsuperscript{64}See National Conference of State Legislatures, Fiscal Brief, \textit{State Taxation of Cannabis} (January 2021).
\textsuperscript{67} See National Conference of State Legislatures, Fiscal Brief, \textit{State Taxation of Cannabis} (January 2021).
\textsuperscript{69} The Task Force on Recreational Marijuana, \textit{Governor’s Advisory Task Force on Recreational Marijuana Report to the Honorable Governor Mike Dunleavy} (January 13, 2023).
State Compliance and Administration

As states legalize and implement their cannabis tax programs, they face a variety of challenges. Below are some examples of compliance and administration challenges encountered by state agencies in California, Washington, and Illinois.

**California**

**Cultivation Tax**
The California Department of Tax and Fee Administration (CDTFA) experienced the following challenges with auditing the cultivation tax along with compliance issues that the cannabis industry encountered upon the imposition of the tax.

- Through June 30, 2022, cultivation tax was imposed on all harvested cannabis based on the weight and category of the cannabis that entered the commercial market on all cannabis cultivators, with the final distributors being responsible for reporting and paying the tax to the CDTFA.
- The cultivation tax was based on the weight and category of harvested cannabis at the beginning of the supply chain, which required each cannabis business in the supply chain to keep track of the weight and category of the cannabis for the last distributor to properly report and pay the cultivation tax to the CDTFA.
- The weight-based cultivation tax created a challenge for cultivators when the wholesale cost of the cannabis decreased and the weight-based rate remained the same, which ultimately increased the ratio between the cultivation tax paid and the wholesale cost of the cannabis.
- CDTFA had difficulty tracing the reported cultivation tax back to the originating cultivator along with verifying the weight and category of the cannabis that was used to calculate the tax.

**Cannabis Excise Tax**
Through Dec. 31, 2022, the Cannabis Tax Law imposed a 15% cannabis excise tax on purchasers at the retail sale of cannabis or cannabis products based on the average market price of cannabis or cannabis products sold in a retail sale. Distributors are responsible for collecting the cannabis excise tax from cannabis retailers along with reporting and paying the cannabis excise tax to the CDTFA.

The following are the general challenges the CDTFA has experienced with auditing cannabis excise tax along with compliance issues that the cannabis industry faces.

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- Distributors are required to report and pay the cannabis excise tax to the CDTFA prior to when the tax is imposed on the purchaser at the retail sale and collected from the purchaser.
- The calculation of the average market price to determine the cannabis excise tax is complex, which can lead to collecting, reporting, and paying an incorrect amount to the CDTFA.
- CDTFA is challenged with determining the type of transactions that occurred between cannabis retailers and their suppliers to determine the correct calculation of the average market price.

To address the difficulties the state and the industry faced in administering and complying with the California Cannabis Tax Law, Assembly Bill 195 (Stats. 2022, ch. 56) was chaptered on June 30, 2022, which reformed the Cannabis Tax Law. This reform should aid in improving CDTFA’s administration in collecting cannabis taxes and ensuring a level playing field for all cannabis business in the state by enacting the following changes to the Cannabis Tax Law:
- Effective July 1, 2022, the cultivation tax imposition ended, and it no longer applies to cannabis that entered the commercial market on and after July 1, 2022.
- Effective Jan. 1, 2023, the responsibility to report and pay the cannabis excise tax to the CDTFA shifted from distributors to cannabis retailers.
- New enforcement and collection provisions were added to the Cannabis Tax Law.

Cannabis Tax Allocation
The California cannabis taxes are deposited into a California Cannabis Tax Fund, a special trust fund established solely to carry out the purpose of the Control, Regulate and Tax Adult Use Marijuana Act (Act). The Act seeks to establish a comprehensive system to control and regulate the cultivation, distribution, transportation, storage, manufacturing, processing, and sale of all cannabis and cannabis products. The cannabis taxes provide funding for youth education and prevention programs, medical research, environmental mitigation efforts, law enforcement, and administrative costs for numerous California state agencies charged with licensing, regulating, and taxing cannabis.

Colorado

Cannabis Tax Allocation
Ten percent of the Colorado cannabis tax revenues are allocated to local governments and the remaining 90% go to the state. The state portion allocates 72% to the marijuana tax cash fund, 15.5% to the general fund, and 12.5% to the public-school fund. The retail marijuana excise tax goes to the public-school capital construction fund.
Washington

The Washington State Liquor and Cannabis Board has pointed to the difficulty of tracking sales and inventory of cash-based businesses, reporting sales for products with high tax rates, and acquiring inventory from authorized sources.

- **Cash-based businesses**: Requiring deeper analysis of cash received and logged (sales and inventory tracking) rather than deposited directly utilizing bankcard transactions due to current federal regulations. This practice requires added analysis of gross receipts and cash logs in addition to bank statements. Alternative cashless transactions that transfer funds from a consumer’s account to the business’s account must also be considered.

- **High tax rates**: Requiring careful analysis to ensure sales are reported and reasonable in relation to cost of goods while factoring in local statutes regarding conditional sales, sales below acquisition, samples, discount market trends and other inventory changes. Reviewing sales transaction documentation for adequate reflection of sales price and respective tax.

- **Inventory**: Ensuring that product sold is obtained from authorized sources. Reviewing inventory records for diversion and inversion. Sampling inventory counts to ensure that values are not overstated.

Illinois

The Illinois Department of Revenue has encountered several compliance issues with cannabis dispensaries charging an incorrect tax rate and/or taxes, including:

- Dispensaries failing to charge or charging the incorrect retailers’ occupation tax rate on cannabis and non-cannabis sales. Dispensaries should be charging the proper retailers’ occupation tax based on the location where sales occur for both cannabis and non-cannabis sales.

- Dispensaries charging municipal or county cannabis retailers’ occupation taxes prior to their effective date.

- Dispensaries charging both adult-use rates and medical rates on a single sale. Medical and adult-use cannabis are taxed differently. In no case should a sale of a single cannabis product be charged both the medical cannabis tax rate and adult-use cannabis rate.

Cannabis Tax Allocation

All monies collected under the Cannabis Regulation and Tax Act are to be deposited into the Cannabis Regulation Fund, consisting of taxes, license fees, other fees, and any other amounts required to be deposited or transferred into the Fund.

- 2% is to be transferred to the Drug Treatment Fund to be used by the Department of Human Services for: (i) developing and administering a scientifically and medically accurate public education campaign educating youth and adults about the health and...
safety risks of alcohol, tobacco, illegal drug use (including prescription drugs), and cannabis, including use by pregnant women; and (ii) data collection and analysis of the public health impacts of legalizing the recreational use of cannabis. Expenditures for these purposes shall be subject to appropriations.

- 8% is to be transferred to the Local Government Distributive Fund and allocated as provided in Section 2 of the State Revenue Sharing Act. The monies shall be used to fund crime prevention programs, training, and interdiction efforts, including detection, enforcement, and prevention efforts, relating to the illegal cannabis market and driving under the influence of cannabis.

- 25% shall be transferred to the Criminal Justice Information Projects Fund to be used for the purposes of the Restore, Reinvest, and Renew Program to address economic development, violence prevention services, re-entry services, youth development, and civil legal aid, as defined by Section 15 of the Public Interest Attorney Assistance Act. The Restore, Reinvest, and Renew Program shall address these issues through targeted investments and intervention programs and promotion of an employment infrastructure and capacity building related to the social determinants of health in impacted community areas. Expenditures for these purposes shall be subject to appropriations.

- 20% shall be transferred to the Department of Human Services Community Services Fund, to be used to address substance abuse and prevention and mental health concerns, including treatment, education, and prevention to address the negative impacts of substance abuse and mental health issues. These include concentrated poverty, violence, and the historical overuse of criminal justice responses in certain communities, on the individual, family, and community; including federal, State, and local governments, health care institutions and providers, and correctional facilities. Expenditures for these purposes shall be subject to appropriations.

- 10% shall be transferred to the Budget Stabilization Fund.

- 35% or any remaining balance, shall be transferred to the General Revenue Fund.

**Alaska**

The Alaska Department of Revenue has experienced challenges with taxpayers reporting higher-value parts of the cannabis flower as a lower-value part of the trim to reduce their tax rate.

- Alaska’s tax structure is based on the weight of different parts of the plant and paid by cultivators on wholesale transfers. The flower tax rate is $50 per ounce vs. the trim rate of $15 per ounce.

- Alaska requires all licensed cannabis facilities to use Metrc, a provider of cannabis regulatory systems in the U.S. Metrc combines advanced software, radio-frequency identification (RFID) technology, a dedicated customer-support team, and a secure database to track and trace cannabis from seed, growth, harvest, and processing to testing, transport, and sale. The seed-to-sale data provides valuable insights to growers,

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73 Based on information provided by the Alaska Department of Revenue, December 6, 2022.
74 [https://www.metrc.com/](https://www.metrc.com/), (Last accessed on December 6, 2022).
processors, retailers, and regulators to help ensure a safe and compliant cannabis industry.

- Alaska can conduct monthly reconciliations using transfer reports from Metrc. Most of the audits are selected from discrepancies found between the Metrc data and what is reported on tax returns.

- Most cannabis taxpayers do not have traditional bank accounts in Alaska. Alaska is challenged with many cultivators going out of business before they can be audited, often with an outstanding tax debt. Additionally, Alaska is unable to follow normal collection efforts due to an inability to levy bank accounts.

Cannabis Tax Allocation
In 2016, the Alaska Legislature created the Recidivism Reduction Fund, a sub fund within the General Fund, and directed the Alaska Department of Administration to separately account for 50% of the cannabis tax collected and deposit it into this fund. The Legislature may use the annual estimated balance in the fund to make appropriations to the departments of Corrections, Public Safety, and Health and Social Services for recidivism programs. Since October 2018, 25% of cannabis tax revenue has been deposited into the Marijuana Education and Treatment Fund.
Conclusion

States that have enacted recreational legal cannabis regulations have experienced various challenges and worked toward developing best practices regarding administration, revenue collection, and enforcement procedures. In developing and implementing cannabis tax programs, states may use the following principles as a basis for their excise tax rates on recreational cannabis: keeping tax rates low enough to undercut, or at the very least, stabilize the illicit market; design a tax regime that would bring in consistent revenue, even while cannabis products prices may fluctuate; and generate sufficient revenue to fund cannabis-related programs and infrastructure, including mitigating societal costs associated with cannabis products consumption.\textsuperscript{75} States that are developing cannabis taxation programs could look to similar, established excise tax programs, such as alcoholic beverage excise taxation. For example, in Alaska a task force was commissioned to review the state’s cannabis tax and regulations, as well as the state’s alcoholic beverages programs, and provide recommendations for improvements to the system.\textsuperscript{76} Should cannabis become legalized on the federal level, large tobacco and pharmaceutical companies will be important industry stakeholders. With the ever-evolving cannabis markets and possible state and federal law reforms, states should stay informed and flexible.\textsuperscript{77}


Appendix: Cannabis Use Data

Cannabis is the most-used federally illegal drug in the United States.\(^78\)

**How many people use cannabis?**
Among aged 12 or older in 2020 in the U.S., 17.9\% (or about 49.6 million people) reported using cannabis in the past 12 months, according to the 2020 National Survey on Drug Use and Health.\(^79\)

**How many young students use cannabis?**
In 2021, an estimated 7.1\% of 8\textsuperscript{th} graders, 17.3\% of 10\textsuperscript{th} graders, and 30.5\% of 12\textsuperscript{th} graders reported using cannabis/hashish in the past 12 months, according to the 2021 Monitoring the Future Survey.\(^80\)

**How many people have a cannabis use disorder?**
Among people aged 12 or older in 2020, an estimated 5.1\% (or about 14.2 million people) had a cannabis use disorder in the past 12 months, according to the 2020 National Survey on Drug Use and Health.\(^81\)

\(^78\) Centers for Disease Control and Prevention, “Data and Statistics,” (June 8, 2021). [https://www.cdc.gov/marijuana/datastatistics.htm#:~:text=Marijuana%20is%20the%20most%20commonly%20used%20drug%20in%20the%20United%20States%2C%20at%20least%20once%20in%202019.&text=Recent%20research%20estimated%20that%20approximately%2014.2%20million%20people%20had%20a%20cannabis%20use%20disorder (Last visited October 10, 2022).]

