Table of Contents

Farmers and 1099 filers might qualify for new COVID-19 unemployment benefits program .................. 1
Latest COVID-19 legislation to provide more funds for farm businesses................................................. 3
Selected Recent Legal Developments Involving Chlorpyrifos and the CWA ............................................. 6
The Deal with Dicamba Series ..................................................................................................................... 10
Challenging Monsanto for Harm Allegedly Caused by Glyphosate ....................................................... 32
Challenging California’s Decision to List Glyphosate as Carcinogenic.................................................... 34
Industrial Hemp Production Contracts: Managing Expectations and Mitigating Loss ......................... 37
Hemp as an Agricultural Commodity........................................................................................................ 42
Farmers aren’t traditionally eligible for unemployment benefits, but that won’t be the case when Ohio’s newest unemployment program opens. We've been keeping an eye out for the opening of the Pandemic Unemployment Assistance (PUA) program, which will provide unemployment benefits to persons affected by COVID-19. The program is targeted to persons who are not eligible for regular unemployment benefits, such as self-employed and 1099 filers. PUA is yet another economic assistance program generated by the Coronavirus Aid, Relief and Economic Security (CARES) Act recently passed by Congress.

PUA will provide regular unemployment benefit amounts to qualifying individuals, plus an additional $600 per week for the period of March 29 to July 25, 2020. Qualification doesn’t include a minimum income requirement, but a person must not be eligible for Ohio’s regular unemployment benefits and must not be currently receiving vacation, sick or other paid leave. The applicant must also be unable to work due to one of the following situations:

- The applicant has been diagnosed with COVID-19 or has symptoms and is seeking medical diagnosis;
- A member of the applicant’s household has been diagnosed with COVID-19;
- The applicant is providing care for a family or household member who has been diagnosed with COVID-19;
- The applicant cannot work due to caring for a child whose school or other facility has closed due to COVID-19;
- The applicant has become the primary support for a household because the head of the household has died due to COVID-19;
- The applicant has quit his or her job, was laid off, or could not begin a new job as a direct result of COVID-19;
- The applicant’s place of employment is closed because of COVID-19.

Applications should open by mid-May, on the Ohio Department of Job and Family Services website. Self-employed individuals will have to submit proof of employment, such as
earnings statements that reflect profit and loss, payroll deposits, or a 2019 tax return. The unemployment benefits will be retroactive to the date of eligibility and will last for no more than 39 weeks, up to December 26, 2020. PUA may also provide an additional 13 weeks of benefits for those who’ve exhausted regular unemployment benefits. To learn more or apply for PUA, visit [https://unemploymenthelp.ohio.gov/expandedeligibility/](https://unemploymenthelp.ohio.gov/expandedeligibility/)

[The Ohio State University]

[College of Food, Agricultural and Environmental Sciences]

[2120 Fyffe Road, Columbus, OH 43210]

cfaeswebmaster@osu.edu

cfaes.osu.edu
Economic relief measures in the CARES Act have proven difficult for farms, first due to confusion over which and how farmers qualify and also by soaring demand and depleted funding. But the recently enacted Paycheck Protection Program and Health Care Enhancement Act (HR 266) should help. The legislation injects more funds into both the Paycheck Protection Program (PPP) and Economic Injury Disaster Loans Program (EIDL) and clarifies that farmers can qualify for EIDL loans. The bill also came with a bonus: additional guidance from the USDA and SBA for farmers seeking to access the programs. Both programs are first-come, first-served, so farm businesses who haven’t applied for the funds should decide whether to do so right away.

Here’s how the new legislation affects agricultural businesses:

- Allocates another $310 billion for the PPP to provide payroll funding for eligible employers, which includes $60 billion in funding for smaller lending institutions working with PPP loan applicants.
- Doubles the EIDL program, adding another $10 billion to the SBA disaster loan program for eligible businesses.
- Clarifies that agricultural enterprises are eligible for EIDL loans.

Using the PPP: a few quick tips

The SBA will resume accepting applications for the PPP today. Information about the program is on SBA’s website, here. Generally, PPP gives loans of up to $10 million at 1% interest to keep employees employed, with a loan maturity of two years and generous forgiveness provisions.
Farm businesses, including cooperatives, with fewer than 500 employees or who fit within the definition of a “small business concern” may apply for a PPP loan through an approved lender. Lenders include local banks as well as agricultural lenders in the Farm Credit System. Farmers should talk first to the lenders with whom they ordinarily do business to see if the lenders are participating in the PPP. If not, SBA provides a lender locating tool here.

The PPP application is here. Employers may use the loan for payroll costs or owner compensation replacement, as well as for mortgage interest, rent, and utility payments and interest payment on other debts, but 75% of the expenditures must be for payroll costs. To determine the maximum loan amount, an employer must document and calculate aggregate payroll costs from the previous 12 months, from calendar year 2019, or from February to June of 2019 if a seasonal employer. The SBA provides assistance on how to calculate payroll costs, and finally addresses the requirements for self-employed farms who report income on Schedule F. Read the guidance here, and see question 3 if you’re reporting income on Schedule F.

Upon receiving a PPP loan, a lender will set up a separate account for the funds. Borrowers should carefully document loan expenditures. This is not only for compliance purposes, but also because the PPP loan program includes a forgiveness component that forgives an amount equal to the sum of eligible costs and payments made during the eight weeks following disbursement of loan funds. At least 75% of the amount forgiven has to be for payroll costs, and the amount may be reduced by reductions in total salary or wages. Borrowers will have to apply for forgiveness, and documentation of all expenditures will prove necessary to the forgiveness process. We’re awaiting additional guidance on the forgiveness provisions, so keep an eye out for more information on this important topic.

**The EIDL program**

Farm businesses and agricultural cooperatives with no more than 500 employees may also now apply for EIDL, which gives loans up to $2 million for businesses that suffer economic injuries due to COVID-19. Because the program ran out of funds, there is a backlog in EIDL applications and the SBA is not reopening the loan portal until it catches up with the backlog. If SBA does reopen the program, businesses apply directly through the SBA here.

Businesses may use an EIDL loan for fixed debt, payroll, accounts payable, and other operating expenses due to the pandemic, but can’t use the funds for the same purposes as the borrower’s PPP loan. The interest rate for EIDL is higher at 3.75% (2.75% for non-profits), but the term can be up to 30 years.

Important to note: EIDL also includes an “emergency advance” component that provides a $10,000 advance within a few days of submitting an application. A borrower doesn’t have to repay the advance, even if the borrower doesn’t ultimately qualify for a loan. But if the borrower also has a PPP loan, the PPP forgiveness is reduced by the $10,000 EIDL
advance. The emergency advance can go towards paying sick leave, payroll, increased materials costs, rental or mortgage payments, or other obligations due to revenue losses, as long as the borrower hasn’t used PPP funds for those costs.

There's still more for farms to digest from the CARES Act. The Farm Office team is ready to help! Join us for "The Farm Office is Open" tonight at 8 p.m., when we'll discuss the CARES Act programs and other economic developments for agriculture. Register for the live webinar and access past webinar recordings here.
2020 MID-SOUTH AGRICULTURAL AND ENVIRONMENTAL LAW CONFERENCE – ONLINE CLE

Selected Recent Legal Developments Involving Chlorpyrifos and the Clean Water Act (Waters of the U.S. and Direct Discharges)

Materials excerpted from various editions of the Agricultural Law Weekly Review. Prepared by staff of the Penn State Center for Agricultural and Shale Law

Chlorpyrifos:

Maryland Bill Enacting Chlorpyrifos Ban Awaits Governor’s Action
On March 18, 2020, the Maryland General Assembly passed, and transmitted to Maryland Governor Larry Hogan, Maryland Senate Bill 300. This legislation included a phased-in state-wide prohibition on use of the pesticide chlorpyrifos, beginning with an October 1, 2020, aerial application ban and concluding with a total prohibition of its use by January 1, 2022. Unless vetoed by Governor Hogan, the bill will become law on April 17, 2020. Under the bill, beginning January 1, 2021, the use of chlorpyrifos or seeds treated with it is prohibited, except for specified applications to fruit trees or snap bean seeds. Those exceptions will end on July 1, 2021, unless the Department of Agriculture finds that no effective alternative exists in which case an extension can be granted until December 31, 2021. All exceptions will end on January 1, 2022. Barring a veto, Maryland will join California, New York and Hawaii as states prohibiting chlorpyrifos use and/or sales. [NOTE: On May 7, 2020, Governor Hogan vetoed this legislation.]

Chlorpyrifos User Input Sought Regarding Potential Pennsylvania Statutory Ban
On March 3, 2020, the Pennsylvania Department of Agriculture’s (PDA) Pesticide Advisory Board met and reported that PDA is seeking input from stakeholders on chlorpyrifos use in Pennsylvania in response to House Bill 2091, a bill introduced in the Pennsylvania General Assembly on December 2, 2019, and currently pending in the House Agriculture and Rural Affairs Committee that seeks to prohibit chlorpyrifos use in Pennsylvania sixty days after enactment. Instructions on submitting input to PDA are here.

Corteva Announces Discontinuance of Chlorpyrifos Production by Year’s End
On February 6, 2020, Corteva, Inc., one of the leading manufacturers of the pesticide chlorpyrifos, announced that it will end production and sales of the pesticide by the end of 2020. Hawaii, California and New York have all taken actions to end chlorpyrifos use and sales in their respective states, as discussed in last month’s Agricultural Law Brief. Corteva made the following statement: “Demand for one of our long-standing products, chlorpyrifos, has declined significantly over the last two decades, particularly in the U.S. Due to this reduced demand, Corteva has made the strategic business decision to phase out our production of chlorpyrifos in 2020. We are committed to continuing to support our farmers and invest in products they need.
Our customers will have access to enough chlorpyrifos supply to cover current demand through the end of the year, while they transition to other products or other providers. Our customers, shareholders and employees will benefit by redeploying our resources.”

New York Governor Directs Ban on Chlorpyrifos by Agency Action
On December 10, 2019, New York Governor Andrew Cuomo vetoed New York State Senate Bill Senate Bill 5343, a bill to phase out the use of the pesticide chlorpyrifos in the State of New York by December 1, 2021, and directed the New York Department of Environmental Conservation (DEC) in the veto memorandum to immediately prohibit chlorpyrifos use by aerial spraying. Veto Memorandum #193 also adds language in which the Governor’s Office requires DEC to take further regulatory action to ban chlorpyrifos use for all purposes by December 2020, except apple tree trunk spraying, which will be banned by July 2021. The end result is that the timetable for discontinuing chlorpyrifos use legally in New York is accelerated by at least one year for most uses and by six months for all uses.

California EPA Announces Agreement to End the Use of Chlorpyrifos in California by 2020
On October 9, 2019, the California Environmental Protection Agency (CalEPA) issued a press release announcing an agreement to end most sales of the pesticide chlorpyrifos within California by 2020. Chlorpyrifos is a pesticide used to control weeds and protect crops against soil insect pests. In August 2018, the California Department of Pesticide Regulation (DPR) released a draft scientific review entitled “Evaluation of Chlorpyrifos as a Toxic Air Contaminant” suggesting that the pesticide should be listed as a toxic air contaminant. In light of this and other research, DPR announced its intention to cancel chlorpyrifos product registrations. The present agreement between CalEPA and Dow Agrosciences, the company behind the chlorpyrifos patent, will accelerate the chlorpyrifos ban. Dow Agrosciences and other companies will cease all sales of chlorpyrifos on February 6, 2020. After December 31, 2020, the possession and use of chlorpyrifos by individual growers will be prohibited. In the meantime, the use of chlorpyrifos will be subject to thorough control and restrictions.

Groups File Petition Regarding Chlorpyrifos
On August 7, 2019, the public interest environmental law organization Earth Justice filed a petition for review with the U.S. Court of Appeals for the 9th Circuit regarding the U.S. Environmental Protection Agency’s (EPA) decision to not ban the pesticide chlorpyrifos. Previously, on May 29, 2017, EPA issued a Petition Denial Order entitled “Chlorpyrifos; Order Denying PANNA and NRDC’s Petition to Revoke Tolerances” (82 FR 64). Subsequently, on July 18, 2019, EPA issued an Objections Denial Order entitled “Chlorpyrifos; Final Order Denying Objections to March 2017 Petition Denial Order” (84 FR 35555). Earth Justice, on behalf of 11 petitioners, seeks a review of both the Petition Denial Order and the Objections Denial Order by the court.

Clean Water Act – Waters of the United States:
Navigable Waters Protection Rule Published in Federal Register
April 21, 2020, the Environmental Protection Agency and Army Corps of Engineers published in the Federal Register the final rule titled, Navigable Waters Protection Rule: Definition of...
EPA Releases New Navigable Waters Protection Rule to Replace 2015 WOTUS Rule
On January 23, 2020, the U.S. Environmental Protection Agency and the U.S. Army Corps of Engineers (collectively “EPA”) announced the issuance of the Navigable Waters Protection Rule. This long-awaited rule will provide a new regulatory definition of “waters of the United States” for the purpose of establishing the limits of EPA’s regulatory jurisdiction under the Clean Water Act (CWA). It will be published in the Federal Register as a final rule, without any additional comment period, and its effective date will be sixty days after publication. To date, the Federal Register publication has not occurred. This action follows the October 22, 2019, EPA repeal of the existing and controversial 2015 Waters of the United States (WOTUS) Rule, effective December 23, 2019. EPA announced the repeal as step one of the process to newly define “waters of the United States” under the CWA, and the publication of the new Navigable Waters Protection Rule has been announced as step two and the completion of that process. EPA will conduct a public webcast discussing the final Navigable Waters Protection Rule on February 13, 2020, at 2:00 p.m. Eastern Standard Time. Audio and video of the webinar can be viewed live by registering or by streaming a recorded version from EPA’s website. EPA maintains a website at www.epa.gov/nwpr devoted to the long regulatory and litigation history of the 2015 WOTUS Rule and the process that produced the new Navigable Waters Protection Rule.

EPA Repeals 2015 Rule Defining “Waters of the United States”
On September 12, 2019, U.S. Environmental Protection Agency (EPA) Administrator Andrew Wheeler announced the repeal of the 2015 Clean Water Act rule defining “waters of the United States” (WOTUS). According to EPA, the repeal of the 2015 rule is the first step in its two-step approach to redefine WOTUS and clearly distinguish between federally regulated and state-controlled waters. For the second step, EPA proposed a new WOTUS definition in December 2018 (84 FR 4154). The final rule will become active after 60 days once published in the Federal Register. For further explanation of “waters of the United States,” see the March 7, 2017 and January 2, 2019 Agricultural Law in the Spotlight articles, Executive Order on the “Waters of the United States” Rule and U.S. EPA and Army Corps of Engineers Issue Proposed Revised Definition of “Waters of the United States.”

Georgia Court Returns 2015 WOTUS Rule to Federal Agencies
On August 21, 2019, the U.S. District Court for the Southern District of Georgia remanded the 2015 “Waters of the United States” (WOTUS) rule back to the U.S. Environmental Protection Agency and the U.S. Army Corps of Engineers (the Agencies) for further proceedings (Georgia v. Wheeler, No. 2:15-cv-00079). Additionally, the court left in place a preliminary injunction against the 2015 WOTUS rule in Alabama, Florida, Georgia, Kansas, Kentucky, South Carolina, Utah, and West Virginia pending those proceedings. Currently, the 2015 WOTUS rule is in effect in 22 states (plus the District of Columbia and the U.S. territories), not in effect in 27 states, and under federal court consideration in New Mexico. According to the court, the 2015 WOTUS rule impermissibly extended the authority granted to the Agencies “beyond the limits of the [Clean Water Act], and thus is not a permissible construction of the phrase ‘waters of the United States’ within the statute.” Additionally, the court held “that the Agencies’ promulgation
of the WOTUS Rule violates the [Administrative Procedure Act’s] procedural requirements.” The court stated that it chose not to vacate the WOTUS rule because “administrative efforts are already underway to repeal and replace the WOTUS Rule with a new rule that abides by both statutes” and that such an order could “cause disruptive consequences to the ongoing administrative process.” For more information on the 2015 WOTUS rule and EPA’s proposed rule to revise the rule’s definition of WOTUS, see the January 9, 2019 Agricultural Law in the Spotlight article entitled: U.S. EPA and Army Corps of Engineers Issue Proposed Revised Definition of “Waters of the United States.”

Texas Court Returns 2015 WOTUS Rule to EPA
On May 28, 2019, the U.S. Dist. Court Southern Dist. of Texas remanding the 2015 “Waters of the United States” (WOTUS) rule back to the Environmental Protection Agency (EPA), for further proceedings (Texas v. United States Envtl. Prot. Agency, Case No. 3:15-CV-00162). In remanding the case, the court noted that the final rule promulgated by EPA “defined ‘adjacent waters’ . . . using distance-based criteria, rather than the ecologic and hydrologic criteria used in the proposed rule” in violation of the notice-and-comment requirements of the Administrative Procedure Act. Additionally, the court sustained a preliminary injunction previously issued on September 12, 2018 which enjoined the 2015 WOTUS rule in Texas, Louisiana, and Mississippi.

Clean Water Act – Direct Discharges:

U.S. Supreme Court Decides Clean Water Act Permitting Case
On April 23, 2020, the U.S. Supreme Court held in a 6-3 decision that the Clean Water Act (CWA) requires a discharge permit when there is a direct discharge from a point source into navigable waters or when there is the “functional equivalent of a direct discharge.” County of Maui, Hawaii v. Hawaii Wildlife Fund, et al., No. 18-260. The decision sought to bring clarity to circumstances where a discharge passes through groundwater before entering navigable waters. The decision rejected the Ninth Circuit Court of Appeal’s establishment of a broader permitting standard based upon whether a discharge was “fairly traceable” to a point source.

U.S. Supreme Court Hears Major Clean Water Act Case
On November 6, 2019, The U.S. Supreme Court heard oral argument in a case which is likely to have a significant impact on the scope of the Clean Water Act (CWA). In County of Maui, Hawaii v. Hawaii Wildlife Fund, et al., No. 18-260, the issue to be decided is whether the CWA requires a permit when pollutants originate from a point source but are conveyed to navigable waters by a nonpoint source, e.g. groundwater. The CWA differentiates between point source (requiring a permit) and nonpoint source pollution (controlled through federal oversight of state government, and other non-CWA, programs). The U.S. Court of Appeals for the Ninth Circuit decision under appeal greatly expanded the common understanding of the CWA’s permitting process by including pollutants that reach navigable waters by nonpoint sources so long as the pollutants can be traced in more than de minimis amounts to a point source. In the case, the County of Maui does not possess a CWA permit for the injection of treated sewage into underground wells from which it eventually finds its way to the Pacific Ocean a half-mile away.
The National Agricultural Law Center

The nation’s leading source for agricultural and food law research & information
NationalAgLawCenter.org | nataglaw@uark.edu

Blog Series: 2020

The Deal with Dicamba: An Overview of Dicamba Litigation throughout the U.S.

Brigit Rollins
Staff Attorney, National Agricultural Law Center

The information set out below is an eight-part series that the National Agricultural Law Center published discussing the various on-going lawsuits concerning the chemical herbicide known as dicamba. How these lawsuits ultimately play out could have far-reaching impacts on how pesticides and pesticide-resistant, genetically-engineered crops are used in agriculture. Each of these articles is set out in chronological order below.

Part 1: Overview/Introduction

Dicamba is a chemical compound that is used in herbicides that are designed to kill annual and perennial broad-leafed plants. It works by mimicking natural plant hormones to cause abnormal growth and eventually death. Dicamba is more toxic to plants than glyphosate, the chemical used in Roundup, and is used to combat glyphosate-resistant species, including Palmer amaranth, commonly known as pigweed. While dicamba is an extremely effective herbicide, it has had ongoing problems with volatility, meaning that it easily becomes airborne and drifts off-target during application. Due to its trouble with volatility, Dicamba has historically been used in the late winter and early spring as a pre-emergent, meaning that it was applied directly to the soil prior to planting crops in order to kill weed seeds. By applying dicamba directly to soil prior to planting, damage that could occur to crops due to the pesticide’s volatility was prevented.

In 2015, Monsanto Company (“Monsanto”) released a line of soybean and cotton seeds that were genetically engineered to be resistant to dicamba. Monsanto’s idea was that farmers would plant the seeds and then spray a dicamba-based herbicide over the top of the crops to kill weeds that grew later in the planting season. Although the accompanying dicamba-based herbicide, XtendiMax, would not be registered by the Environmental Protection Agency (“EPA”) until 2017, Monsanto began selling its dicamba-resistant seeds to farmers in 2015. While Monsanto reportedly warned consumers that they were not allowed to apply older forms of dicamba to the new, dicamba-resistant seeds, the following growing season saw an
increase in the number of reports of damage attributed to dicamba drift. As the number of reports grew, so did the number of lawsuits concerning dicamba.

Many of these lawsuits were filed against Monsanto by farmers alleging injury to their crops, one was filed against EPA for approving Monsanto’s dicamba-based pesticide, and one was filed by Monsanto itself against an Arkansas regulatory body that banned the use of dicamba in the state. All of these cases are currently on-going, and it is unclear yet what their ultimate result will be.

**Bader Farms**

The first lawsuit filed by a producer against Monsanto for damage caused by dicamba drift was filed by Bader Farms, Inc. (“Bader Farms”) in 2016. The suit, **Bader Farms, Inc. v. Monsanto Co., No. 1:16-cv-299 (E.D. Mo. 2019)**, alleges widespread damage to the plaintiffs’ peach orchards, along with a multi-million dollar financial loss. At the center of Bader Farms’ original complaint was Monsanto’s genetically modified Roundup Ready 2 Xtend soybeans and Bollgard II Xtend cotton seeds (“Xtend crops”), dicamba-resistant seeds that the plaintiff alleged were released without an accompanying EPA-approved dicamba herbicide in 2015 and 2016. The plaintiffs alleged that by selling the Xtend crop seeds without a corresponding herbicide, it was foreseeable to Monsanto that farmers would use old, highly volatile, drift-prone dicamba that had a strong chance of damaging neighboring crops.

In 2017, Bader Farms filed an amended complaint with the court, adding BASF Corporation (“BASF”), another pesticide manufacturer, as a defendant to the case. Bader Farms also added new complaints with respect to dicamba-related damage it suffered during the 2017 growing season. That damage, according to Bader Farms, occurred as a result of Monsanto continuing to market Xtend crops along with dicamba-based herbicides that had been approved by EPA. In 2017, two dicamba-based herbicides were available to growers, XtendiMax and Engenia. Monsanto manufactured XtendiMax and BASF manufactured Engenia. According to Bader Farms, the damage caused in 2017 was greater than that caused in either 2015 or 2016. Bader Farms accused Monsanto and BASF of working together to manufacture, market, and sell dicamba-based products that they knew would cause harm.

**Multi-District Litigation**

Bader Farms was not alone in filing lawsuits against Monsanto and BASF. After the 2017 growing season, a host of new cases were filed against the two companies alleging injury due to dicamba-related damage. The plaintiffs in these cases were all soybean farmers located across eight different states. Ultimately, all the dicamba-related cases filed against Monsanto and BASF, including the original case filed by Bader Farms, were consolidated in a multidistrict litigation known as **In re: Dicamba Herbicides Litigation, No. 1:18-md-02820 (E.D. Mo. 2019)**. The consolidation order centralized suits brought by plaintiffs from Arkansas, Illinois, Iowa, Kansas, Mississippi, Missouri, Nebraska, South Dakota, and Tennessee. The case is now located in a United States District Court for the Eastern District of Missouri.

The multidistrict litigation resulted in the filing of two different Master Complaints, the Crop Damage Class
Action Master Complaint (“Crop Damage Master Complaint”) and the Master Antitrust Action Complaint (“Master Antitrust Complaint”). The Crop Damage Master Complaint was brought against both Monsanto and BASF. It concerned three dicamba-based herbicides – XtendiMax, Engenia, and FeXapan – as well as Monsanto’s dicamba-resistant Xtend seeds (collectively referred to as the “Xtend Crop System”). The plaintiffs in that complaint all challenged the design and sale of Monsanto and BASF’s dicamba herbicide products. Each plaintiff, on behalf of itself and a state-wide class, has raised claims under its own state’s laws, while also joining together to represent a nationwide class raising claims under the federal Lanham Act. The Master Antitrust Complaint alleged that Monsanto and BASF had partnered to monopolize herbicide-tolerant traits. Monsanto in particular was accused of using the threat of crop damage to leverage sales of its dicamba-tolerant traits.

After consolidation, the plaintiffs in Bader Farms moved to follow their own separate litigation schedule. The court granted this motion. As a result, Bader Farms remains a part of the In re: Dicamba litigation, but will file separate briefs, have a separate trial, and its own judicial opinions. The decision to grant Bader Farms its own schedule was based on several factors, including the fact that Bader Farms was the only plaintiff alleging damage to a crop other than soybeans, and that the Bader Farms litigation had progressed to a more advanced stage than any of the other consolidated lawsuits.

To date, the judicial opinions that have come out of either Bader Farms or In re: Dicamba have all been on motions to dismiss filed by the defendants. Those opinions have considered many of the claims brought by plaintiffs against the defendants, evaluated the merits of those claims, and determined which claims could go to trial and which could be dismissed. Trials for each case are scheduled to begin in 2020. The trial for Bader Farms is currently set to begin on January 27, 2020, while the trial for In re: Dicamba is scheduled to start during August, 2020.

**Challenging EPA Approval**

The third dicamba-related lawsuit currently making its way through the judicial system was filed by four public-interest organizations against both EPA and Monsanto. In Nat’l Family Farm Coal. v. U.S. Envtl. Prot. Agency, No. 19-70115 (9th Cir. 2019), the plaintiffs allege that EPA’s registration of Monsanto’s dicamba-based XtendiMax pesticide was an unlawful violation of the Federal Insecticide, Fungicide, and Rodenticide Act (“FIFRA”) and the Endangered Species Act (“ESA”). According to the plaintiffs, EPA had violated FIFRA by registering XtendiMax as a conditional use pesticide under FIFRA without needing the necessary requirements. The plaintiffs also alleged that EPA had violated the ESA by using the wrong standard to conclude that registering XtendiMax for use would not have an effect on listed species.

The groups first filed suit in 2017, challenging EPA’s 2016 approval of XtendiMax. However, after EPA renewed their approval of the pesticide in 2018, the court dismissed the case. Because EPA’s 2018 approval of XtendiMax now controlled the product’s use and availability, the court concluded that the plaintiffs’ challenge of the 2016 approval was moot. Although it dismissed the case for mootness, the court concluded that the plaintiffs would be allowed to refile in order to challenge the 2018 approval of XtendiMax, and that any refiling would be granted expedited scheduling.

The information contained in this document is provided for educational purposes only. It is not legal advice, and is not a substitute for the potential need to consult with a competent attorney licensed to practice law in the appropriate jurisdiction.
The refiled case once again alleged that EPA had violated FIFRA and the ESA by approving XtendiMax in 2018. The plaintiffs are seeking to have the court vacate EPA’s 2018 registration of XtendiMax.

**At the State Level**

Finally, it is worth noting that lawsuits concerning the use of dicamba are not just being brought against herbicide manufacturing companies in federal court. In 2017, Monsanto filed suit in Arkansas state court against the Arkansas Plant Board (“Plant Board”) over state regulations that the Plant Board put in place to restrict the use of Monsanto’s dicamba-based herbicide, XtendiMax. Through the lawsuit, *Monsanto Co. v. Arkansas State Plant Bd., No. CV-18-548*, Monsanto sought to invalidate regulations the Plant Board passed in 2016 and 2017, arguing that the 2016 rule had effectively prohibited in-crop use of XtendiMax in 2017, and that the 2017 rule would effectively prohibit in-crop use of XtendiMax in 2018. According to Monsanto, the Plant Board had violated both the Arkansas and the United States constitutions in passing the regulations. Monsanto also argued that the statute which determined how members were appointed to the Plant Board violated the Arkansas Constitution by allowing some members to be appointed by private industry.

In the same year, a similar lawsuit was filed against the Plant Board by several farmers in Arkansas. The farmers had used dicamba-based herbicides on their fields in 2017 and wished to do so again in 2018. Although the farmers had petitioned the Plant Board to adopt a regulation that established May 25 as the cut-off date for in-crop dicamba use for the 2018 growing season, the Plant Board adopted a cut-off date for early April. The farmers initiated a lawsuit, *McCarty v. Arkansas State Plant Bd., No. CV-18-309*, arguing that the Plant Board unreasonably ignored the farmers’ petition to set a May 25 cut-off date. Like Monsanto, the farmers also argued that the statute which governed how members were appointed to the Plant Board violated the Arkansas Constitution by delegating appointment power to private industry.

Both lawsuits have been before the Arkansas Supreme Court on issues of sovereign immunity, the rule of law that renders states immune from civil suits and criminal prosecution. Although the Plant Board argued that the doctrine of sovereign immunity barred both lawsuits, the Arkansas Supreme Court concluded that both Monsanto and the farmers could bring their claims. The cases were remanded back to the lower courts for further rulings.

To read the Crop Damage Master Complaint, click [here](#).

To read the Master Antitrust Complaint, click [here](#).

To read the complaint in Bader Farms, click [here](#).

To read the court’s opinion on motions to dismiss in *In re: Dicamba*, click [here](#).

To read the court’s opinion on motions to dismiss in *Bader Farms*, click [here](#).

The information contained in this document is provided for educational purposes only. It is not legal advice, and is not a substitute for the potential need to consult with a competent attorney licensed to practice law in the appropriate jurisdiction.
Part 2: Lanham Act Claims

By 2018, hundreds of plaintiffs had filed individual lawsuits in their home states against Monsanto Company ("Monsanto") and BASF Corporation ("BASF"), alleging that the companies were responsible for crop damage caused by their dicamba-based herbicides, and that the companies had conspired to create a monopoly of the pesticide-resistant crops market. Lawsuits against the two companies were filed in Arkansas, Illinois, Iowa, Kansas, Missouri, Mississippi, Nebraska, South Dakota, and Tennessee. Ultimately, those cases were consolidated into one lawsuit known as In re: Dicamba Herbicides Litigation, No. 1:18-md-02820 (E.D. Mo. 2019). Consolidation was supported by both plaintiffs and defendants because the various cases shared common questions of fact and consolidation would eliminate the possibility of inconsistent rulings from different courts. The United States District Court for the Eastern District of Missouri was selected as the court where the consolidated case would be heard because some of the earliest actions involving dicamba damage were initially filed in that court, including Bader Farms, Inc. v. Monsanto Co., No. 1:16-cv-299 (E.D. Mo. 2019), the first lawsuit to raise allegations against Monsanto for dicamba-related damage. Additionally, Monsanto is headquartered in St. Louis, Missouri which is located in the Eastern District of Missouri. The consolidated case is before Judge Stephen N. Limbaugh, Jr. who was selected for the case because he is also presiding over the trial in Bader Farms, Inc. v. Monsanto Co.

After consolidation, In re: Dicamba was divided into two main components, the claims alleging crop damage and the claims alleging antitrust violations. The crop damage claims have been raised in the Crop Damage Class Action Master Complaint ("Crop Damage Master Complaint") and the antitrust claims have been raised in the Master Antitrust Action Complaint ("Master Antitrust Complaint"). While the antitrust claims all accuse Monsanto and BASF of violating federal law, most of the claims for crop damage allege that Monsanto and BASF violated state law. However, the Crop Damage Master Complaint does contain one federal law claim. That claim has the potential to have a wider impact than the claims for violations of state law because it accuses the defendants of violating the law on a national level.

The plaintiffs in In re: Dicamba accused Monsanto and BASF of violating the federal Lanham Act in the Crop Damage Master Complaint. Both defendants moved to have the claims dismissed before trial. The court dismissed the Lanham Act claims brought against BASF, but concluded that the claims against Monsanto could move to the trial stage.

The Lanham Act is the federal statute that governs trademarks and unfair competition. The Crop Damage Master Complaint asserts claims under § 1125(a) of the Lanham Act which essentially prevents...
manufacturers from making statements or using commercial advertising to confuse or deceive consumers with respect to what their products do and how their products behave when used. The plaintiffs argue that Monsanto and BASF violated this portion of the Lanham Act multiple times while marketing Monsanto’s dicamba-resistant seeds and both defendants’ dicamba-based herbicides, XtendiMax and Engenia (collectively referred to as the “Xtend Crop System”).

According to the Crop Damage Master Complaint, the defendants made multiple statements when marketing the Xtend Crop System claiming that the system could be “safely employed utilizing over-the-top application of dicamba herbicides on dicamba-resistant crops and would not lead to volatilization and/or drift onto susceptible non-dicamba resistant plants and crops.” The plaintiffs allege that these statements violated the Lanham Act by misleading consumers of the Xtend Crop System into thinking that there was no risk, or a very low risk, of dicamba drift if the dicamba herbicides were applied according to the instructions. Because there was still risk of pesticide drift even if the defendants’ application instructions were followed, plaintiffs contend that it was a violation of the Lanham Act to market the Xtend Crop System as being safe when applied according to the instructions.

In asking the court to dismiss the Lanham Act claims, Monsanto and BASF made three arguments: (1) the plaintiffs could not bring Lanham Act claims against Monsanto or BASF because the plaintiffs were not in direct business competition with either company; (2) the harm alleged by the plaintiffs was too far removed from the defendants’ alleged marketing conduct; and (3) the court lacked personal jurisdiction over both Monsanto and BASF and therefore did not have authority to consider federal claims brought against either of them. Of the arguments for dismissal made by the defendants, the court found that only BASF’s claim that the court lacked person jurisdiction over it had merit. Based on that argument, the court dismissed the Lanham Act claims against BASF, but allowed the claims against Monsanto to continue.

In considering the defendants’ first argument, that the plaintiffs were not direct business competitors of either Monsanto or BASF, the court focused on a Supreme Court case which held that to bring a claim under the Lanham Act, a plaintiff was required to be “a commercial actor suffering commercial injuries,” not “a consumer who [was] hoodwinked into purchasing a disappointing product.” Given that requirement, the court refused to grant the defendants’ motion to dismiss the plaintiffs’ Lanham Act claim because although the plaintiffs were not in direct business competition with the defendants, they were commercial actors who had suffered commercial injuries by losing crop sales to dicamba damage.

The court turned next to the defendants’ second argument that the harm alleged by the plaintiffs was too far removed from the defendants’ marketing conduct. According to the defendants, the plaintiffs were “at best ‘indirect’ victims of the allegedly false advertising.” The defendants argued that because the plaintiffs had not bought or used the Xtend Crop System, then they were not the real victims of the alleged Lanham Act violations. The court did not agree with the defendants’ argument, concluding that the plaintiffs had clearly alleged a commercial injury because the defendants’ misrepresentations caused third parties to buy and use the dicamba that damaged the plaintiffs’ crops, resulting in loss of sales. Therefore, the court determined that the plaintiffs’ Lanham Act claims would not be dismissed on that ground.

The information contained in this document is provided for educational purposes only. It is not legal advice, and is not a substitute for the potential need to consult with a competent attorney licensed to practice law in the appropriate jurisdiction.
Finally, the court considered whether it lacked personal jurisdiction over each defendant. In other words, the court considered whether it had the authority to rule on federal claims against either Monsanto or BASF. With respect to Monsanto, the court concluded that it did have general jurisdiction over the company because its headquarters were located in Missouri, the same state where the court is located. However, with respect to BASF, the court concluded that it did not have general jurisdiction over the company because it was not incorporated or headquartered in Missouri or in any other of the states that the plaintiffs originally brought their federal claims in. Therefore, the court dismissed the nationwide class action claims against BASF for violations of the Lanham Act.

When In re: Dicamba goes to trial, the plaintiffs will be permitted to litigate their Lanham Act claims against Monsanto. If the plaintiffs are ultimately successful on their Lanham Act claims, it would result in a finding that Monsanto had made deceptive statements about the volatility of its dicamba-based herbicide when marketing its products. However, if the plaintiffs lose on their Lanham Act claims at trial, that would mean that the company had made statements that were true or that it believed to be true while marketing the Xtend Crop System. It is possible that however the jury rules on this claim at trial, Monsanto will have to alter how it markets its dicamba-based herbicides.

To read the Crop Damage Master Complaint, click [here](#).

To read the text of the Lanham Act, click [here](#).

To read the court’s opinion on motions to dismiss in In re: Dicamba, click [here](#).

**Part 3: State Law Failure to Warn Claims**

The plaintiff farmers in both Bader Farms, Inc. v. Monsanto Co., No. 1:16-cv-299 (E.D. Mo. 2019) and In re: Dicamba Herbicides Litigation, No. 1:18-md-02820 (E.D. Mo. 2019) raised state law failure to warn claims against Monsanto Company (“Monsanto”) and BASF Corporation (“BASF”). In both cases, only Monsanto moved to have the claims dismissed and each time the court refused. Therefore, the claims will proceed to the next step in each litigation.

Failure to warn claims are brought against product manufacturers for failing to provide adequate warnings alerting consumers of the potential dangers of using their products. The plaintiffs in both cases argued that they were injured by the defendants’ failure to provide warnings on their dicamba-based products. According to the plaintiffs in both In re: Dicamba and Bader Farms, the labels attached to the dicamba-based pesticides manufactured by both Monsanto and BASF were inadequate to inform consumers about the risks the pesticides presented to non-dicamba-resistant soybeans.

Although the state law failure to warn claims are similar to the federal Lanham Act claims raised by the In re: Dicamba plaintiffs because both claims allege that Monsanto and BASF provided misleading or inadequate information, there is an important difference between the two. The Lanham Act claims allege
that the defendants used misleading statements to market their products, while the state law failure to warn claims allege that the products themselves do not come with warnings or instructions that would alert consumers to the risks associated with the products.

**IN RE: DICAMBA**

The plaintiffs in *In re: Dicamba* all alleged failure to warn claims under the laws of their respective states in the Crop Damage Class Action Master Complaint (“Crop Damage Master Complaint”). The claims were brought against both Monsanto and BASF, however only Monsanto moved to have the claims dismissed. Monsanto argued that the claims should have been dismissed because they were preempted by the Federal Insecticide, Fungicide, and Rodenticide Act (“FIFRA”), the federal statute which regulates the use, sale, and labeling of pesticides.

FIFRA is implemented by the Environmental Protection Agency (“EPA”). The statute requires that before a pesticide becomes legally available for sale and use, EPA must register the pesticide. To register a pesticide with EPA, a manufacturer must submit a proposed label to the agency that provides instructions for how to use the pesticide. EPA will only approve a pesticide once it ensures that when it is used according to the label directions, it does not harm people or the environment.

Although FIFRA does not require EPA to confirm that a pesticide will not cause crop damage before approving a label, it does have a prohibition on “misbranding,” which occurs when a label contains “false or misleading” statements, or if the label omits necessary warnings. It is unlawful under FIFRA to sell an EPA-approved pesticide that is also misbranded. EPA has the authority to cancel a pesticide registration for misbranding, but FIFRA does not provide a right of action for private individuals to sue for damages caused by misbranding. Instead, individuals who have suffered damage due to misbranded pesticides may file lawsuits under applicable state law so long as the state law is not preempted by FIFRA. According to FIFRA’s preemption provision, state law will be preempted by the statute if it imposes a labeling or packaging requirement that is either in addition to or different from the requirements provided by FIFRA.

In *In re: Dicamba*, the plaintiffs claimed that the defendants had failed to provide adequate warnings and instructions on the labels for their dicamba-based pesticides. Additionally, the plaintiffs argued that the labels the defendants did put on their products were “false, misleading and failed to contain warnings or instructions adequate to protect or prevent harm to the environment.” Monsanto argued that the failure to warn claims were preempted by FIFRA and should therefore be dismissed because they sought to impose label requirements that were different from or in addition to the requirements imposed by FIFRA.

The plaintiffs made two arguments as to why the failure to warn claims were not preempted by FIFRA. First, the plaintiffs argued that their failure to warn claims went to more than just the labels on the defendants’ products. The plaintiffs alleged that Monsanto failed to warn of the risks of its products in a variety of ways, including face-to-face discussions, websites, and social media. Because those failure to warn claims do not target the defendants’ product labels, the plaintiffs argue that FIFRA does not preempt them. Second, the plaintiffs argued that the failure to warn claims that did involve the defendants’ product labels were
likewise not preempted by FIFRA because those claims do not seek to impose requirements that are in addition to or different from FIFRA. Instead, the plaintiffs maintained that the state laws were consistent with FIFRA’s prohibition on misbranding, which occurs if a label does not contain necessary warnings. Ultimately, the court felt that the information and arguments from all the parties was insufficient to allow the court to make a conclusive ruling. It agreed with the plaintiffs that the failure to warn claims that did not concern the product labels would not be preempted by FIFRA, but felt that it could not make a specific ruling about the claims that concerned the labels without more information. However, the court did not dismiss the failure to warn claims. The court allowed the claims to advance to the trial stage, but warned that they could not exceed the parameters of FIFRA.

**BADER FARMS**

Like in *In re: Dicamba*, the plaintiffs in *Bader Farms* brought their failure to warn claims against both BASF and Monsanto, but only Monsanto moved to dismiss. While the parties all agreed with the court’s conclusion in *In re: Dicamba* that the plaintiffs could not bring failure to warn claims that exceeded the parameters of FIFRA, Monsanto argued that the court should review whether the failure to warn claims that concerned non-label-related statements were preempted by FIFRA, and that all the failure to warn claims must fail regardless of anything else because the plaintiffs alleged that no warning would have fully protected them. The court declined to reconsider its ruling on the non-label-related failure to warn claims, but did address Monsanto’s second argument.

Under Missouri law, the law of the state where the court is located and where Monsanto is headquartered, a failure to warn claim requires a plaintiff to allege that their harm was proximately caused by the defendant’s alleged failure to provide an adequate warning. Monsanto argues that because the plaintiffs in *Bader Farms* alleged that no warning would have prevented the damage to their crops, then their failure to warn claims should be dismissed. In response, the plaintiffs argued that although no warning would have prevented Monsanto’s dicamba-based pesticides from moving off-target, proper warnings would have affected the decisions of farmers to purchase and use the products. The court concluded that the plaintiffs adequately plead their failure to warn claims. Monsanto’s motion to dismiss was denied and the failure to warn claims have advanced to the next stage of litigation.

**GOING FORWARD**

Ultimately, the outcome of the trials for *In re: Dicamba* and *Bader Farms* could impact the information required to be included with dicamba-based pesticides. If each case concludes with a finding that either Monsanto or BASF failed to provide consumers with enough information to adequately inform them of the risks associated with dicamba-based pesticides, then that could mean that additional warnings or instructions will be required for such pesticides going forward.

To read the Crop Damage Master Complaint, click [here](#). To read the complaint in *Bader Farms*, click [here](#).
The information contained in this document is provided for educational purposes only. It is not legal advice, and is not a substitute for the potential need to consult with a competent attorney licensed to practice law in the appropriate jurisdiction.
made the same argument. Each count of civil conspiracy argued that the defendants had worked together to carry out an “unlawful, fraudulent, deceptive scheme and device to improperly market, sell, and expand sales and profits from the defective Xtend Crop System.” Monsanto and BASF both moved to dismiss the civil conspiracy claims, arguing that the plaintiffs had failed to allege an underlying intentional tort.

According to the defendants, they could not be accused of conspiring to commit a wrongful activity if an intentional wrongful activity had not been identified. In response, the plaintiffs argued that all the states in which the plaintiffs had brought their civil conspiracy claims followed the Restatement (Second) of Torts § 876 which does not require an underlying intentional tort for a civil conspiracy claim. The court ultimately agreed with the plaintiffs and refused to dismiss the claims of civil conspiracy, but did highlight a confusing point in the plaintiffs’ argument.

The Restatement (Second) of Torts § 876 gives plaintiffs two ways to raise a claim of civil conspiracy. Section 876 (a) says that a party may be liable for civil conspiracy if they commit a tortious act together with another party. Meanwhile, § 876 (b) says that someone who “knows that the other’s conduct constitutes a breach of duty and gives substantial assistance or encouragement to the other” may be liable for civil conspiracy. In other words, § 876 (b) says that a person may be liable for civil conspiracy if they have substantially assisted another person in carrying out activity that they know is wrong. This is also known as the aiding and abetting section.

In considering whether to dismiss the claims for civil conspiracy the plaintiffs in In re: Dicamba brought against Monsanto and BASF, the court noted that the plaintiffs were not entirely clear which torts claims would serve as the underlying wrongful conduct, or which section of the Restatement they were raising their civil conspiracy claims under. However, the court allowed the claim to go forward because it felt that the plaintiffs had likely made a sufficient argument under at least one of the Restatement sections, but asked for further clarification on the issue. Essentially, the court allowed the civil conspiracy claims raised in In re: Dicamba to proceed to the trial stage because it did not have enough information to determine whether the claims should be dismissed before trial.

**BADER FARMS**

The plaintiffs in Bader Farms did not include civil conspiracy in their original complaint against Monsanto, but raised it later in amended complaints against both Monsanto and BASF. The most recently amended complaint, known as the Third Amended Complaint, filed by Bader Farms before trial brought two counts of civil conspiracy against Monsanto and BASF: (1) concerted action by agreement, and (2) aiding and abetting. This was done in response to the ruling in In re: Dicamba which asked for greater clarification over which section of the Restatement (Second) of Torts § 876 the civil conspiracy claims were being brought under. The plaintiffs in Bader Farms decided to pursue both.

Under the first count of conspiracy, concerted action by agreement, Bader Farms argued that the defendants “carried out their conspiracy by engaging in their negligent and intentionally tortious acts in concert with one another pursuant to their joint agreements to develop and commercialize the Xtend Crop
System.” Meanwhile, under the second count of conspiracy, aiding and abetting, Bader Farms accused the defendants of carrying out their conspiracy by “aiding and abetting each other’s negligent and intentionally tortious conduct in in furtherance of their joint plan to develop and commercialize the Xtend Crop System.” Essentially, the plaintiffs argued under the first count that Monsanto and BASF agreed to engage in negligent and tortious behavior together to sell the Xtend Crop System, while under the second count the plaintiffs argued that Monsanto and BASF each assisted the other in carrying out wrongful activity. Both companies moved for dismissal of each count.

The court began its analysis of the Bader Farms civil conspiracy claims by noting that the main difference between the two counts was that the first involves an agreement to engage in a wrongful activity, while the second focuses on whether a party knowingly gave “substantial assistance” to someone who engaged in wrongful conduct. With that distinction clarified, the court went on to uphold the count of concerted action by agreement, but dismissed the count of aiding and abetting.

In moving to dismiss the first count of conspiracy, the defendants argued that the claim required an underlying intentional tort, which the plaintiffs had failed to identify. The court was not persuaded by this argument, noting that the elements of conspiracy under Missouri state law, the state where the court is located, did not require an underlying intentional tort. While the court acknowledged that two parties cannot conspire to act negligently, it pointed out that the conspiracy alleged by Bader Farms was the intentional act of creating an “ecological disaster” to boost the defendants’ profits, not negligence. Accordingly, the court allowed the first count of conspiracy to proceed to the trial stage of litigation.

With respect to the second claim of conspiracy, aiding and abetting, the defendants argued that such a claim was not recognized by Missouri courts. The court agreed, stating that only one Missouri court of appeals case had ever approved the cause of aiding and abetting for conspiracy. Accordingly, the court dismissed the claim.

At trial, Bader Farms successfully argued the count of conspiracy under the theory of concerted action by agreement. The jury was persuaded by the argument that Monsanto and BASF carried out a conspiracy by agreeing to engage in wrongful behavior in order to develop and market their dicamba-resistant seeds and dicamba-based herbicides.

**GOING FORWARD**

In light of the recent jury verdict finding for Bader Farms on the claim of civil conspiracy, the plaintiffs in In re: Dicamba are likely to argue that Monsanto and BASF committed a civil conspiracy by agreeing to engage in wrongful activity. It is less likely that the In re: Dicamba plaintiffs will pursue a civil conspiracy claim for aiding and abetting because the court dismissed the aiding and abetting claim in the Bader Farms case. Ultimately, the claims for civil conspiracy in each case are important because they consider whether the defendants intended to engage in wrongful activity to increase their sales.

To read the Crop Damage Master Complaint, click [here](#).

The information contained in this document is provided for educational purposes only. It is not legal advice, and is not a substitute for the potential need to consult with a competent attorney licensed to practice law in the appropriate jurisdiction.
Part 5: Trespass and Nuisance Claims

Up to now, this series has examined the claims raised by plaintiffs in dicamba-related lawsuits that have passed judicial review been allowed to advance to the trial stage. This next installment will examine two claims that were dismissed before trial.

In the Crop Damage Class Action Master Complaint ("Crop Damage Master Complaint") filed in In re: Dicamba Herbicides Litigation, No. 1:18-md-02820 (E.D. Mo. 2019), the plaintiff farmers brought claims of trespass and nuisance against both Monsanto Company ("Monsanto") and BASF Corporation ("BASF"). Despite arguments advanced by the plaintiff, the judge dismissed both claims because the plaintiffs failed to show that they had alleged a valid legal argument.

Though they are separate claims, trespass and nuisance share some similarities. A plaintiff who brings a claim of trespass is alleging that the defendant has intentionally physically interfered with the person or property of the plaintiff, or that the defendant intentionally caused something to enter the plaintiff’s land. The plaintiffs in In re: Dicamba argued that Monsanto and BASF committed a trespass by causing particles of dicamba-based herbicides to physically enter their land and interfere with their property. Similarly, a plaintiff who brings claim of nuisance alleges that the defendant has interfered with the plaintiff’s interest in the private use and enjoyment of their land. In In re: Dicamba, the plaintiffs argued that Monsanto and BASF interfered with the plaintiffs’ private use and enjoyment of their land through the off-target movement of the defendants’ dicamba-based herbicides.

In raising both claims of trespass and nuisance, the plaintiffs argued that by manufacturing and marketing herbicides with a high likelihood of moving off-target, Monsanto and BASF knew or should have known that their products were substantially certain to invade the property of others. In response, Monsanto and BASF both argued that if any trespass or nuisance had occurred, it was the fault of the persons who had done the actual spraying of the dicamba-based herbicides, not the fault of either corporation.

Both Monsanto and BASF argued that the trespass claims should be dismissed because at the time of the alleged trespasses the herbicides were no longer in either corporation’s control. They were in control of the third parties who had purchased the herbicides. Monsanto and BASF argued that “courts do not impose trespass liability on sellers for injuries caused by their product after it has left the ownership and possession of the sellers.”

In response, the plaintiffs argued that Monsanto and BASF retained control over their products after purchase through licensing agreements. When farmers purchase products from Monsanto and BASF, they
enter into licensing agreements with the purchaser. Such licensing agreements allow Monsanto and BASF to retain certain rights to the products after purchase. The plaintiffs argued that the agreements also allowed the corporations to retain sufficient control over the herbicides to make them liable for trespass. However, the court was not persuaded by this argument. According to the court, the licensing agreements did not give either Monsanto or BASF the ability to terminate the use of their herbicides if parties misused them by committing a trespass. Therefore, neither Monsanto nor BASF had control of the herbicides after they were purchased. Because neither Monsanto nor BASF had control of the herbicides at the time the alleged trespasses took place, the court dismissed the claims.

For similar reasons, the court also dismissed the plaintiffs’ nuisance claims. Under those claims, the plaintiffs argued that they were harmed by off-target drift of dicamba-based herbicides. The plaintiffs argued that the resulting harm prevented them from using or enjoying their land. The plaintiffs argued that Monsanto and BASF were responsible for the resulting harm under the theory of nuisance because they either knew or should have known that their products had a high likelihood of moving off-target to invade the property of others.

In response, Monsanto and BASF argued that they could not be responsible for any alleged nuisance that may have resulted from particles of dicamba invading the plaintiffs’ property because neither Monsanto nor BASF had control over the products after they were purchased. Again, the defendants supported their argument by pointing out that “courts appear to agree that product manufacturers are not liable for nuisance caused by post-sale use of their products.” The court agreed with the defendants. According to the court, manufacturers are not liable for a nuisance caused after the product has left their control because the usual remedy in a nuisance case is to issue a court order preventing the defendant from carrying out the activity that resulted in the nuisance. In this case, the nuisance was caused by spraying dicamba-resistant herbicides, and neither Monsanto nor BASF had engaged in such activity. Therefore, the court dismissed the nuisance claims.

While the plaintiffs in In re: Dicamba brought claims for both trespass and nuisance, the plaintiffs in Bader Farms, Inc. v. Monsanto Co., No. 1:16-cv-299 (E.D. Mo. 2019) only raised claims for trespass. However, after the court in In re: Dicamba issued the order dismissing the trespass claims in In re: Dicamba, the plaintiffs in Bader Farms chose not to take their trespass claims to trial.

To read the Crop Damage Master Complaint, click here.

To read the court’s opinion on motions to dismiss in In re: Dicamba, click here.

Part 6: Sherman Act Claims

When lawsuits filed against Monsanto Company (“Monsanto”) and BASF Corporation (“BASF”) for allegedly causing dicamba-related injury to farmers were consolidated into the multidistrict case known as in In re: Dicamba Herbicides Litigation, No. 1:18-md-02820 (E.D. Mo. 2019), the multiple claims were divided into two general categories. That resulted in the filing of two separate complaints. The Crop Damage Class

The information contained in this document is provided for educational purposes only. It is not legal advice, and is not a substitute for the potential need to consult with a competent attorney licensed to practice law in the appropriate jurisdiction.
Action Master Complaint (“Crop Damage Master Complaint”) was filed on behalf of plaintiff farmers who did not plant dicamba-tolerant seeds or spray dicamba-based herbicides, but suffered dicamba-related crop damage from spraying done by third parties. The Master Antitrust Action Complaint (“Master Antitrust Complaint”) was filed on behalf of plaintiff farmers who were direct purchasers of Monsanto’s dicamba-tolerant soybeans. They claim to have been injured by Monsanto’s alleged monopoly in the dicamba-tolerant traits market. The plaintiffs in the Antitrust Master Complaint brought three claims against Monsanto for alleged violations of the Sherman Antitrust Act (“Sherman Act”).

The Sherman Act is a federal statute that prohibits efforts to monopolize marketplaces or restrict interstate commerce. In the Master Antitrust Complaint, the plaintiffs brought their claims under Section 2 of the Sherman Act. That particular section of the Act prohibits any attempt to monopolize interstate trade or commerce, going so far as to make the act a felony.

The plaintiffs brought three claims against Monsanto for violating Section 2 of the Sherman Act. First, the plaintiffs raised the claim of Monopoly. Under that claim, the plaintiffs alleged that Monsanto possessed monopoly power of herbicide-tolerant traits in soybeans, and that Monsanto used that power to suppress competition in the herbicide-tolerant market. Second, the plaintiffs raised the claim of Attempt to Monopolize. Under that claim, the plaintiffs alleged that Monsanto acted with the intent to create and maintain a monopoly of the herbicide-tolerant market. Finally, the plaintiffs raised a claim of Combination, Contract, or Conspiracy to Monopolize. Under that claim, the plaintiffs alleged that Monsanto and BASF collaborated to engage in a conspiracy to monopolize Monsanto’s herbicide-tolerant traits by making an agreement for BASF to sell dicamba-based herbicides while Monsanto sold dicamba-tolerant soybean seeds.

Monsanto asked the court to dismiss all three of the plaintiffs’ claims against it. The company made three arguments in support of dismissal: (1) the plaintiffs lacked standing to bring a claim under the Sherman Act because they were not “direct purchasers”; (2) the plaintiffs failed to allege a plausible antitrust violation; and (3) the plaintiffs failed to adequately plead willfulness, specific intent to monopolize, and conspiracy. The court agreed with Monsanto that the plaintiffs lacked standing to bring claims under the Sherman Act, and therefore dismissed the complaint. However, the dismissal was without prejudice, meaning that the plaintiffs could bring their antitrust claims against Monsanto again provided that they fixed the standing issue.

When a plaintiff brings a claim into court they must have what is known as “standing.” A person has standing to bring their claim if they can show that they have suffered an injury to their own legal interests, and that the court has the authority to provide a remedy for that injury. Monsanto argued that to have the necessary standing to bring a claim under the Sherman Act, a plaintiff must be a “direct purchaser” from the alleged monopoly supplier. In other words, Monsanto argued for the plaintiffs to have standing to bring a claim under the Sherman Act, they had to show that they directly purchased their dicamba-tolerant soybeans from Monsanto. To support its argument, Monsanto relied on other court cases that had concluded that only plaintiffs who had made direct purchases from the alleged monopoly supplier had standing to bring Sherman Act claims.
The court agreed with Monsanto, and found that the plaintiffs had failed to show that they had made direct purchases of dicamba-tolerant soybeans from the company. The court noted that not only had the plaintiffs not alleged that they purchased the dicamba-tolerant soybean seeds directly from Monsanto, none of the plaintiffs had identified where they purchased their seeds. Instead the plaintiffs alleged that they had entered into a licensing agreement with Monsanto to use the dicamba-tolerant trait technology as a part of the overall seed purchase. According to the court, this was not enough for the plaintiffs to bring Sherman Act claims against Monsanto because the seeds themselves were still purchased through a third party. It is common practice for farmers to purchase seeds through a third party such as an independent seed dealer, rather than directly from Monsanto. However, to successfully raise a claim under the Sherman Act, the plaintiff needs to have directly purchased from the defendant. Because the plaintiffs in this case could not establish a direct purchase connection between themselves and Monsanto, the court concluded that the plaintiffs lacked standing to bring Sherman Act claims and dismissed the Master Antitrust Complaint.

Because the Master Antitrust Complaint has been dismissed, it will not be progressing to the trial stage of the In re: Dicamba litigation.

To read the Master Antitrust Complaint, click here.

To read the court’s opinion on motions to dismiss in In re: Dicamba, click here.

To read the text of the Sherman Act, click here.

**Part 7: Endangered Species Act and Federal Insecticide, Fungicide and Rodenticide Act Claims**

Up to now, this series has focused on two cases involving plaintiff farmers who have filed suit against Monsanto Company (“Monsanto”) and BASF Corporation (“BASF”) for crop damage allegedly caused by dicamba-based pesticides produced by the companies. Those plaintiffs were seeking compensation for damages they suffered. This article will look at a case brought by several farming and environmental organizations against the Environmental Protection Agency (“EPA”), arguing that the agency’s approval of Monsanto’s dicamba-based herbicide, XtendiMax, was unlawful and should be overturned. These plaintiffs are seeking to have XtendiMax’s EPA approval revoked so that it cannot be used.

In the Ninth Circuit Court of Appeals, four environmental groups have filed a case against EPA, arguing that the agency violated both the Federal Insecticide, Fungicide, and Rodenticide Act (“FIFRA”) and the Endangered Species Act (“ESA”) by registering Monsanto’s XtendiMax for use. The lawsuit, Nat’l Family Farm Coal. v. U.S. Envtl. Prot. Agency, No. 19-70115 (9th Cir. 2019), was originally filed in January, 2017, and challenged EPA’s 2016 registration of Monsanto’s dicamba-based herbicide, XtendiMax. That initial case was dismissed in January, 2019 because by the time the court had issued its opinion, the 2016 registration had expired and XtendiMax had be re-registered in 2018 with a new label that contained new instructions for use. Although the court dismissed the original case because the 2016 registration of...
XtendiMax was no longer valid, it allowed the plaintiffs to file a new case over the 2018 registration of XtendiMax on an expedited timeline. In August, 2019, the plaintiffs had refiled against EPA for its 2018 decision to register XtendiMax for use, once again alleging that EPA had violated both FIFRA and the ESA.

**FIFRA CLAIMS**

The plaintiffs in *Nat’l Family Farm Coal. v. U.S. Envtl. Prot. Agency*, argue that EPA violated FIFRA by deciding to register XtendiMax in 2018 because EPA authorized the registration without making necessary prerequisite findings, meeting the requirements to register XtendiMax for conditional use, or supporting the 2018 registration with substantial evidence.

When EPA registered XtendiMax in 2016, the agency imposed a two-year automatic expiration on the registration. The 2016 registration would automatically expire in November, 2018 unless EPA determined before the expiration date that incidents of damage caused by XtendiMax drifting off target were not occurring at “unacceptable frequencies or levels.” In other words, the 2016 registration of XtendiMax would expire in 2018 unless EPA determined that use of the pesticide was not causing an unacceptable amount of crop damage as a result of drift. According to the plaintiffs, EPA failed to make the necessary finding in its 2018 reregistration of XtendiMax. The plaintiffs argue that registering XtendiMax in 2018 without addressing the 2016 requirement for reregistration should be enough for the 2018 registration to be set aside.

In their complaint, the plaintiffs argue that EPA made two additional FIFRA violations. First, the plaintiffs allege that EPA failed to meet the requirements necessary to register XtendiMax under the “new use” exception to FIFRA’s unconditional registration standard. Under FIFRA, pesticides are registered under the unconditional registration standard unless a conditional exception applies. The unconditional standard requires that the party seeking registration of a pesticide submit to EPA enough data for EPA to determine whether the pesticide “will perform its intended function without unreasonable adverse effects on the environment.” However, FIFRA provides three exceptions to the unconditional registration standard. One of those is the conditional new use exception. Under that exception, EPA may register a new use for a pesticide that is already registered even though the data EPA has on the pesticide is insufficient to support an unconditional registration if the agency determines that: “(i) the applicant has submitted satisfactory data pertaining to the proposed additional use, and (ii) amending the registration in the manner proposed by the applicant would not significantly increase the risk of any unreasonable adverse effect on the environment.”

EPA registered XtendiMax in 2018 under the new use exception because a new label had been developed with updated instructions for use of the pesticide. The plaintiffs argue that EPA failed to make either of the necessary findings. FIFRA mandates that, at a minimum, EPA must have the data needed to assess any increase in risk that would occur as a result from the approval of a conditional new use for a registered pesticide. The plaintiffs argue that EPA did not have the data necessary to fully assess the risks of approving the changes to the XtendiMax label. Because it did not have the data necessary to make the first finding, the plaintiffs argue that EPA would have been unable to make the second finding that the new use would
The information contained in this document is provided for educational purposes only. It is not legal advice, and is not a substitute for the potential need to consult with a competent attorney licensed to practice law in the appropriate jurisdiction.

not significantly increase the risk of adverse effect on the environment.

Finally, the plaintiffs allege that EPA violated FIFRA by not supporting the 2018 registration decision with substantial evidence. Specifically, the plaintiffs argue that EPA’s conclusion that the changes to the XtendiMax label would prevent unreasonable adverse effects to off-target locations was not supported by substantial evidence. The plaintiffs made three arguments to show that EPA had failed to support the 2018 registration with substantial evidence. First, the plaintiffs alleged that all but one of the changes to the XtendiMax label failed to address volatility, which the plaintiffs assert is the main reason why dicamba-based herbicides move off-target. Second, the plaintiffs asserted that EPA concluded that applicator error was the main reason why XtendiMax caused harm to off-target locations without providing evidence to support that claim. Finally, the plaintiffs noted that EPA itself admitted that the changes to the XtendiMax label were minimal and would not completely eliminate the problem of XtendiMax moving off target.

**ESA CLAIMS**

In addition to violating FIFRA, the plaintiffs in *Nat’l Family Farm Coal. v. U.S. Envtl. Prot. Agency* also argue that EPA violated the ESA when it registered XtendiMax in 2018. Although the plaintiffs allege that EPA made numerous violations of the ESA, their main complaint is that EPA used the wrong standard in to make the determination that registering XtendiMax would have “no effect” on listed species. According the plaintiffs, had EPA used the correct standard, they would have had to consult with Fish and Wildlife Service (“FWS”) about the 2018 registration of XtendiMax and may have had to adopt mitigation measures to reduce harm to endangered species.

The plaintiffs argue that EPA violated the ESA by using a FIFRA standard to determine that registering XtendiMax in 2018 would have no effect on any listed species instead of the ESA standard. By applying the FIFRA standard, EPA concluded that registering XtendiMax in 2018 would have “no effect” on any listed species or designated critical habitat. The plaintiffs argue that instead of applying FIFRA standards, EPA should have applied ESA standards which the plaintiffs assert would have ultimately triggered consultation with FWS on XtendiMax’s impacts to endangered species.

When registering a pesticide for use, FIFRA requires EPA to determine that the pesticide “will not generally cause unreasonable adverse effects on the environment.” EPA must make this determination by “taking into account the economic, social, and environmental costs and benefits of the use of any pesticide[.]” Under the ESA, any time a federal agency authorizes, funds, or carries out an action, it must comply with the statute by ensuring that the action will not jeopardize any listed species. If the agency finds that the proposed action “may effect” a listed species, then it must consult with FWS to minimize the effect. The FIFRA standard differs from the ESA standard because FIFRA requires EPA to weigh all the costs and benefits of the pesticide to determine if there will be an unreasonable adverse effect while the ESA requires agencies to begin consultation once it determines that the agency action may have an effect on any listed species. According to the plaintiffs, EPA used FIFRA’s “unreasonable adverse effects” standard to conclude that there would be no harm to any listed species instead of applying the ESA “may effect” standard. The plaintiffs argue that had EPA applied the ESA standard, EPA would have concluded that registering
XtendiMax in 2018 may have affected several listed species and the agency would have conducted formal consultation with FWS.

Because of the alleged violations of both FIFRA and the ESA, the plaintiffs ask the court to vacate the 2018 registration of XtendiMax. If the court ultimately finds for the plaintiffs, then XtendiMax could be banned from use on a federal level until EPA complies with the court’s order. Oral argument in this case has been scheduled for April 21, 2020. After oral argument, the Ninth Circuit will make its decision.

To read the complaint in *Nat’l Family Farm Coal. v. U.S. Envtl. Prot. Agency*, click [here](#).

To read the text of FIFRA, click [here](#).

To read the text of the ESA, click [here](#).

For more National Agricultural Law Center resources on pesticides, click [here](#).

For more National Agricultural Law Center resources on the ESA, click [here](#).

**Part 8: Arkansas State Court Cases**

The previous articles in this series have all looked at lawsuits initiated by plaintiffs who alleged that they were harmed by use of dicamba-based pesticides. This article, the final in the series, will examine three state court cases brought by plaintiffs challenging regulatory efforts to limit the use of dicamba.

**Background**

In 2017, two lawsuits were brought against the Arkansas State Plant Board (“Plant Board”) over rules that the Board had adopted restricting the use of dicamba-based herbicides within the state of Arkansas. Monsanto Company (“Monsanto”) and a group of Arkansas farmers both initiated separate lawsuits against the Plant Board, alleging that the regulatory body had unlawfully prevented the use of dicamba-based herbicides during the 2017 and 2018 growing seasons. The lawsuits followed the Plant Board’s passage of a rule in late 2017 that prohibited in-crop use of dicamba during the 2018 growing season from April 16 to October 31.

The rule was the second of its kind. In 2016, the Plant Board had passed a rule that prohibited in-crop use of Monsanto’s XtendiMax during the 2017 growing season from April 15 to September 15. However, the Plant Board approved Engenia, a dicamba-based pesticide manufactured by BASF Corporation for use in 2017. The following year, the Plant Board banned all dicamba-based herbicides. In both cases, the plaintiffs argued that the Plant Board’s rules were invalid.

**The Monsanto Case**

The information contained in this document is provided for educational purposes only. It is not legal advice, and is not a substitute for the potential need to consult with a competent attorney licensed to practice law in the appropriate jurisdiction.
In its case, Monsanto challenged the legality of the rules for the 2017 and 2018 growing seasons. The company argued that the Plant Board acted arbitrarily and beyond its statutory authority in passing the rules. Specifically, Monsanto alleged that the Plant Board had acted unlawfully by requiring Monsanto to comply with a requirement that it submit two years of research conducted by University of Arkansas scientists assessing the volatility of XtendiMax. Monsanto also asserted that the way the Plant Board chose its members was unconstitutional.

The case, *Monsanto Co. v. Arkansas State Plant Bd., No. 60CV-17-5964 (Cir. Ct. Pulaski Cty. 2019)* was originally filed in the Pulaski County Circuit Court in late 2017. However, the court dismissed the case, concluding that it was barred by the sovereign immunity doctrine which is the rule of law that renders States immune from civil suits and criminal prosecution. Monsanto appealed that ruling to the Supreme Court of Arkansas which concluded that Monsanto could bring its claims because the company alleged that the Plant Board had violated several Arkansas statutory and constitutional provisions, and that it had exceeded its delegated authority. By the time the court issued that opinion, the 2017 and 2018 rules had expired and the Plant Board had issued new regulations addressing the use of dicamba during the 2019 growing season. Those regulations significantly increased the amount of time during which dicamba-based pesticides could be applied in-crop in Arkansas by setting the cut-off date at May 25 instead of April 16. In light of those developments, the court dismissed the portions of the lawsuit that sought to invalidate the 2017 and 2018 rules, but sent the portions of the lawsuit relating to the requirement that Monsanto had to submit research conducted by scientists at the University of Arkansas to the Plant Board, and to the constitutionality of the Plant Board’s composition back to the circuit court to review.

Back before the circuit court, Monsanto made two main claims. First, Monsanto argued that the Plant Board’s requirement that any party applying to have a pesticide registered in the state of Arkansas must submit two years of research conducted by scientists at the University of Arkansas violated the Commerce Clause of the United States Constitution because it unfairly burdened the economic interest of out-of-state research facilities. Second, Monsanto argued that the state law allowing private interest groups, instead of the Governor, to appoint half of the Plant Board’s eighteen members violated the Arkansas State constitution because it was an unlawful delegation of the appointment power.

In an order issued in December, 2019 the court concluded that the Plant Board’s regulation requiring that parties submit two years of research conducted at the University of Arkansas for any pesticide it wanted to register in the state of Arkansas did not violate the Commerce Clause of the United States Constitution because it unfairly burdened the economic interest of out-of-state research facilities. However, the court did agree with Monsanto that the statute permitting private interest groups to appoint members to the Plant Board was an unconstitutional delegation of the appointment power. Accordingly, the court invalidated the statute. The Plant Board has appealed the decision to the Arkansas Supreme Court.

*The Farmers’ Case*

The second lawsuit filed against the Plant Board over its dicamba regulations was brought by a group of Arkansas farmers. In *McCarty v. Arkansas State Plant Bd., 60CV-17-6539 (Cir. Ct. Pulaski Cty. 2019)*, the
plaintiff farmers challenged the rule adopted by the Plant Board prohibiting the use of dicamba in 2018 from April 16 to October 31. The farmers were all soybean farmers who had used Engenia on their fields in 2017 to combat palmer amaranth, also known as pigweed, which has grown resistant to other pesticides. The farmers had hoped to continue using dicamba to suppress pigweed during the 2018 growing season.

Like Monsanto, the plaintiffs in McCarty v. Arkansas State Plant Bd. argued that the 2018 rule was invalid because the statute governing the formation of the Plant Board violated the Arkansas Constitution by allowing private interest groups to appoint half of the Board’s members. According to the plaintiffs, this was an invalid delegation of legislative power to private interests. The plaintiffs asked the court to void the regulations the Plant Board had adopted regarding the use of dicamba during 2018 because the power of the Plant Board to was not constitutionally valid.

As in the Monsanto case, the Circuit Court of Pulaski County dismissed the plaintiffs’ complaint in McCarty v. Arkansas State Plant Bd. on the basis of sovereign immunity. The plaintiffs appealed that decision to the Supreme Court of Arkansas, which concluded that the plaintiffs’ constitutional claims were not subject to the sovereign immunity defense. Although the plaintiffs’ claims specifically relating to the regulation for the 2018 growing season were moot by the time the case reach the Supreme Court in 2019 because the regulation was no longer in effect, the court concluded that the plaintiffs’ claims that the Plant Board was unconstitutionally formed should be heard by the lower court.

Back before the Circuit Court of Pulaski County, the judge issued a ruling on December 2, 2019 dismissing the case in favor of the Plant Board. The plaintiffs have appealed this decision to the Arkansas Supreme Court.

*Recent Filings*

In late 2019, before after both Monsanto Co. v. Arkansas State Plant Bd. and McCarty v. Arkansas State Plant Bd. had been sent back to the lower court, but before the lower court issued a decision in either case, another suit was filed against the Plant Board over its regulation of dicamba. In Todd v. Arkansas State Plant Bd., No. 60CV-19-8569 (Cir. Ct. Pulaski Cty. 2019), the plaintiff argues that the Plant Board made constitutional violations when it fined him for dicamba use during 2018 because the Board is formed in violation of the Arkansas State Constitution. Like the previous two cases, the plaintiff in Todd v. Arkansas State Plant Bd., argues that the state law allowing private interest groups to appoint members to the Plant Board is an unconstitutional delegation of legislative power. Therefore, the plaintiff argues that the Plant Board’s decision to fine him for dicamba use during 2018 should be rendered void.

This case is in early stages, and may ultimately depend on the outcome of the pending appeals in Monsanto Co. v. Arkansas State Plant Bd. and McCarty v. Arkansas State Plant Board.

*Impacts*

Although the conclusions of both Monsanto Co. v. Arkansas State Plant Bd., McCarty v. Arkansas State Plant
Board, and Todd v. Arkansas State Plant Bd. will only be applicable in Arkansas, their impact has the potential to extend beyond the state’s boundaries by influencing how proponents of dicamba may seek to block restrictions of the pesticide by state or federal governments. In all likelihood, dicamba use is an issue that will continue to appear before courts at all levels.

To read the Pulaski County Circuit Court order in Monsanto Co. v. Arkansas State Plant Bd., click here.

To read the Arkansas Supreme Court opinion in Monsanto Co. v. Arkansas State Plant Bd., click here.

To read Monsanto’s complaint in Monsanto Co. v. Arkansas State Plant Bd., click here.

To read the Pulaski County Circuit Court order in McCarty v. Arkansas State Plant Bd., click here.

To read the Arkansas Supreme Court opinion in McCarty v. Arkansas State Plant Bd., click here.

To read the plaintiffs’ complaint in McCarty v. Arkansas State Plant Bd., click here.

To read the plaintiffs’ complaint in Todd v. Arkansas State Plant Bd., click here.
Challenging Monsanto for Harm Allegedly Caused by Glyphosate

Brigit Rollins
Staff Attorney, National Agricultural Law Center

A trial in a case alleging that Roundup, Monsanto’s glyphosate-based herbicide, caused cancer was set to begin October 2019 but was officially been postponed until 2020. The case, Winston v. Monsanto Co., No. 1822-CC0051, was filed in Missouri state court in early 2018 and specifically accuses Monsanto of failing to warn users of Roundup that glyphosate is a carcinogen.

Although the Winston case represents only one out of at least 50,000 plaintiffs currently alleging that Monsanto failed to warn them that Roundup could cause cancer, it would have been only the fourth case in which cancer patients alleged that Roundup had caused their cancer to make it to the trial stage. Two of the three previous cases were before California state courts, and one was before the United States District Court for the District of Northern California. All three resulted in jury awards for the plaintiffs. Of the cases still pending against Monsanto, most have been filed in state court. However, some 1,300 federal suits have been consolidated before a U.S. District Judge for the Northern District of California.

The three cases that have so far resulted in jury verdicts, Johnson v. Monsanto Co., No. CGC-16-550128; Hardeman v. Monsanto Co., No. 16-cv-00525-VC; and Pilliod, et al. v. Monsanto Co., No. RG17862702, were all decided claims of design defect, failure to warn, and negligence. The juries determined that Roundup had a design defect because it was unsafe in a way that an ordinary consumer would not expect when the product was used as intended; that Monsanto failed to warn consumers that Roundup was dangerous despite the fact that Monsanto knew or should have known that Roundup posed a threat to consumers; and that Monsanto was negligent in designing and selling Roundup in the first place.

Monsanto, which was bought by the German-based Bayer in 2018, has appealed the jury verdicts for the California cases. In a brief filed with the California appeals court seeking to overturn the jury verdict in the Johnson case, Monsanto argued that it had no duty to warn consumers of the risk of glyphosate when regulators worldwide have continuously concluded that glyphosate is safe and noncarcinogenic. In the U.S., the Environmental Protection Agency (EPA) maintains that glyphosate poses no risk to human health when
it is safely used by following the label instructions. However, plaintiffs in the cases against Monsanto have repeatedly cited a report put out in 2015 by the International Agency for Research on Cancer (IARC) which concluded that glyphosate is carcinogenic. Plaintiffs relied on this report to argue that Monsanto knew or should have known that Roundup posed a risk to human health. In response, Monsanto has argued that because the report only came out in 2015, and because regulatory agencies have yet to alter their conclusions about the safety of glyphosate, that it would be a misinterpretation of the law to conclude that Monsanto failed to warn consumers about the safety of Roundup.

Many are speculating that the Winston case in Missouri has been postponed to give the parties a chance to reach a settlement out of court, in part because of the large settlements that juries have awarded in the three previous cases. Combined, the three California cases together resulted in well over $2 billion in damages, with one case alone resulting in $2 billion and the other two each resulting in multi-million dollar awards. However, in a statement from Bayer announcing the postponement of the Winston case, the company made no mention of settlement talks and instead noted that its legal team would be taking the time to focus on the appeals currently underway in California.

The Johnson case has been set for a hearing on June 2, 2020. The Hardeman case opening brief was filed December 13, 2019. On February 7, 2020, Monsanto filed its opening appeals brief in the Pilliod case.

Roundup is one of the most-used pesticides in the U.S. It is extremely effective at controlling weeds, and according to EPA is used both in agricultural and non-agricultural settings for everything from the production of fruits and vegetables to land conservation. Additionally, glyphosate is often used in conjunction with glyphosate-resistant crops including corn and soybeans. At the moment, EPA is unwilling to restrict the current use of glyphosate-based herbicides due both to how widely such herbicides are used, and to the fact that EPA has found no risks to public health from the current approved uses of glyphosate. Secretary of Agriculture, Sonny Perdue, has said in an EPA press release that “if we are going to feed 10 billion people by 2050, we are going to need all the tools at our disposal, which includes the use of glyphosate.”

To learn more about pesticides, click here.
Challenging California’s Decision to List Glyphosate as Carcinogenic

Brigit Rollins
Staff Attorney, National Agricultural Law Center

In 2017, a national coalition of farming interests, food producers, and pesticide manufacturers came together to file a lawsuit against the State of California through its regulatory agency the California Office of Environmental Health Hazard Assessment ("OEHHA") for listing the chemical glyphosate on a list of chemicals known by the State to cause cancer. Known as Nat’l Ass’n of Wheat Growers et. al. v. OEHHA, No. 2:17-cv-02401 (E.D. Cal.), the case is currently awaiting the court’s determination on whether to let the case go to trial. Due to how widely used glyphosate is, the outcome of this case will likely have far-reaching impacts.

Glyphosate is one of the widest used pesticides in the United States. Used primarily in Roundup, glyphosate is approved by the federal government for use on over 100 food crops. The Environmental Protection Agency ("EPA") has approved glyphosate for use under the Federal Insecticide, Fungicide, and Rodenticide Act ("FIFRA") for several decades, and maintains that glyphosate poses no risk to human health when it is used according to label instructions. Glyphosate has been studied for decades, and until recently has largely been considered to be non-carcinogenic.

The Safe Drinking Water and Toxic Enforcement Act of 1986, commonly known as Proposition 65, was enacted by California voters in 1986. Proposition 65 prevents California businesses from exposing citizens to chemicals known to the State to cause cancer without providing a required warning, and from knowingly discharging such chemicals into the environment where the chemical would be likely to enter drinking water. Proposition 65 requires the OEHHA to maintain a list of chemicals known to the State of California to cause cancer. Through a function of the proposition, any substance identified as a carcinogen by International Agency for Research on Cancer ("IARC") is automatically added to OEHHA’s list of chemicals known to cause cancer. IARC published a report in March, 2015 which identified glyphosate as a “probable human carcinogen.” That study kicked off the process which lead OEHHA to list glyphosate under

The information contained in this document is provided for educational purposes only. It is not legal advice, and is not a substitute for the potential need to consult with a competent attorney licensed to practice law in the appropriate jurisdiction.
Proposition 65 as a chemical known to the State of California to cause cancer.

This lawsuit was filed soon after glyphosate was listed under Proposition 65. The plaintiffs, primarily a collection of grower associations, state farm bureaus, and glyphosate manufacturers, maintain that glyphosate does not cause cancer. They repeatedly refer to multiple studies conducted by EPA and two studies conducted by OEHHA in 1997 and 2007 which all conclude that glyphosate is non-carcinogenic. The complaint filed by the plaintiffs alleges that by listing glyphosate under Proposition 65 as a known carcinogen, OEHHA has committed multiple violations of the United States Constitution.

First, the plaintiffs allege that requiring businesses to put warning labels on any products containing glyphosate would violate the Free Speech Clause of the First Amendment by compelling speech that is “false and misleading.” Second, the plaintiffs allege that OEHHA has violated Article VI, Clause 2 of the United States Constitution, commonly known as the Supremacy Clause, which provides that state laws that conflict with federal law are preempted and have no effect. The plaintiffs argue that if Proposition 65 required all products containing glyphosate to be sold with a label stating that glyphosate was known to cause cancer, it would violate the Federal Food, Drug, and Cosmetic Act (“FDCA”) which prohibits false or misleading labeling of food. Finally, the plaintiffs allege that OEHHA has violated the Due Process Clause of the Fourteenth Amendment which provides that “[n]o state shall . . . deprive any person of life, liberty, or property, without due process of law.” According to the plaintiffs, OEHHA violated the Due Process Clause by relying only on IRAC’s 2015 report to conclude that glyphosate causes cancer instead of conducting any of its own studies. The plaintiffs conclude that because OEHHA has not conducted its own studies into whether glyphosate causes cancer, the State of California does not know that glyphosate is carcinogenic and therefore has no rational basis for listing glyphosate as a chemical known to the State to cause cancer.

Currently, the court is considering whether to allow the case to proceed to trial or whether it will issue an opinion through summary judgment. Courts will issue opinions through summary judgment when they have concluded that there are no factual issues for a jury to consider and that the case can be decided on issues of law without going to trial. The plaintiffs in this case have requested summary judgment, indicating that they feel that the facts in this case are undisputable and that the only role of the court would be to decide whether or not the defendant violated the law. The defendants have also asked the court to grant summary judgment, arguing that since the case has been filed three juries in other lawsuits have concluded that glyphosate does cause cancer, meaning that there can be no dispute of fact with regard to glyphosate being a carcinogen.

Whatever the court decides, its opinion will likely have far-reaching effects. Many of the plaintiffs in this case represent growers who operate outside of California, but ship their products to the State for sale. If glyphosate is listed under Proposition 65, then any produce which has been sprayed with glyphosate that is sold in California will be required to have a warning label, even if it is grown in a different state. Additionally, since this case was filed, multiple lawsuits have been brought by private citizens against Monsanto Company (“Monsanto”) asserting that glyphosate manufactured by the company gave them cancer. While several of those suits are ongoing, the three that have gone to trial have resulted in large jury awards for the plaintiffs. However the court rules, its decision has the potential to affect anyone who uses glyphosate.

The information contained in this document is provided for educational purposes only. It is not legal advice, and is not a substitute for the potential need to consult with a competent attorney licensed to practice law in the appropriate jurisdiction.
glyphosate.

To read the complaint in *Nat’l Ass’n of Wheat Growers et. al. v. OEHHA*, click [here](#).

For more National Agricultural Law Center information on lawsuits concerning glyphosate, click [here](#).

For more National Agricultural Law Center resources on pesticides, click [here](#).
As states increasingly afford farmers opportunities to grow hemp and produce hemp products, legal disputes between buyers and sellers are bound to arise. Both buyers and sellers can look to mitigate their risks by ensuring that they plan for them in their production contracts. Contract law varies from state to state, but there are general principles that apply everywhere. Contracts for hemp production are no different. Hemp contracts are still relatively new so good contracts are hard to find; however after collecting available examples from around the country we have broken them down by common clauses to discuss differences and similarities in this new industry.

**Licensing and Costs**

Hemp cultivation and production is heavily regulated by both the state and federal governments. Accordingly, growers and processors often need to be licensed before beginning operation. Failure to secure the proper licensing before beginning an operation will invariably lead to delay or termination of production, and possibly civil or criminal penalties.

To address this issue, many hemp production contracts explicitly require parties to secure and prove that they have the proper licenses before beginning any production. This burden almost exclusively falls on the grower, not the buyer of the final product; however most states also require that the processor of the raw hemp crop also have a license which they would be responsible to obtain. One area where licenses and fees are more likely to be shared are for testing, delivery, or other post-cultivation activities which may not fall squarely into either grower or processor responsibilities.

**Confidentiality**

The information contained in this document is provided for educational purposes only. It is not legal advice, and is not a substitute for the potential need to consult with a competent attorney licensed to practice law in the appropriate jurisdiction.
Ensuring confidentiality is a common practice in business contracts, but it is particularly common with hemp production. Because hemp cultivation is relatively new industry, there are continuing innovations among growers and producers to set their products apart from the competition. Consequently, intellectual property, such as the innovation of proprietary technology and genetic modification, is often the focus of these confidentiality provisions. Another common subject of a confidentiality clause is the pricing mechanism that the processor uses to compensate the grower. Some contracts go as far as prohibiting parties from even disclosing the existence of the contract.

Prohibitions on disclosure of various facts of production or the agreement are not categorical. Absent express exceptions in the contract, various state and federal statutes require disclosure of certain things despite a contract’s confidentiality requirements. For example, parties may disclose what they are required to by applicable law without being considered in breach of the contract. However, most contracts require that the other party receive notice before this information is disclosed. Furthermore, confidentiality clauses typically do not bar the disclosure of information that has become readily publicly available through no fault of the grower or information that was independently developed by employees or consultants of the buyer without reliance on such confidential information.

Another objective of the confidentiality clause is security. Hemp production contracts often address preservation of the secrecy of the location of the greenhouses or fields where the hemp is grown. Though hemp is legally different from marijuana, that distinction is not common knowledge. Consequently, hemp production sites face enhanced security threats as individuals may think the crop is marijuana or there have been instances where people knowingly stole industrial hemp plants. One of the most efficient ways that parties can protect against this risk is to include in their contract a confidentiality provision protecting against disclosure of the site where the crop is grown along with the quantity grown.

Cultivation

The grower is typically required to use its best efforts in cultivating the agreed upon product. This standard is often defined as producing and cultivating hemp in accordance with industry standard. The grower agrees perform its services diligently to meet those standards. For example, a grower’s typical obligations are to:

- Cultivate and care for the product and take precautions to keep it free from disease and comply with the terms set by the buyer.
- Apply only the chemicals and treatments pre-approved by the buyer and legal under state or federal regulation.
- Provide access to the crop for the buyer from time to time to ensure that the growing conditions conform to the agreement.
- To limit access to the product and knowledge of the operation to only those parties involved in the contract or state or federal agencies with enforcement authority.

Certain contracts explicitly prohibit the growth of marijuana on any land that will be used to grow industrial
hemp. In the event that this type of cross-contamination occurs, the agreements provide that the grower will have waived its right to any compensation for the product grown and will declared in breach of the contract. This is for both ensuring quality and avoiding any criminal liability for the grower or buyer. Many contracts acknowledge that the grower may not be successful in producing the estimated quantity or quality expected by the buyer. Accordingly, the agreements typically provide that a grower is not obligated to do so if he is legitimately unable to; however, if it is unable to grow the expected quantity or quality, the grower is prohibited from transferring that product to any other party.

As the industry matures we expect contracts to further tailor the cultivation and harvesting requirements to meet the individual needs of the processors taking into account factors such as the equipment that they use and the final products that they market.

**Quality and Testing**

The quality of the delivered product is typically one of the most focused upon and detailed provisions of hemp production contracts. The buyer typically sets the standards for the quality of hemp it expects. One example of the standards set are as follows:

- Not greater than 1% green seeds after cleaning;
- 0% orange or brown “meats” after hulling;
- Not greater than 2% yellow “meats” after hulling;
- Not greater than 0.1% sclerotinia;
- 0% pesticides, fungicide or herbicide chemical residue, no glyphosates at all.

Often the standards for quality based upon state or federal regulations. This typically requires that the hemp is relatively free of any contaminants such as mold or non-hemp biomass and shall have a moisture content that is consistent with long-term product stability. The buyer often further requests that the product be free of chemical, pesticides or herbicides and that the grower prove such by providing the buyer with a copy of a state license and state-issued fitness certificate or certified third-party laboratory.

To ensure that the product is the quality that the buyer expects, agreements generally require that the grower either deliver a sample for testing to the buyer or perform testing on the product itself to determine the quality of the product. For example, one agreement requires that the grower provide a five-pound sample immediately after harvest that is representative of the grower’s production. A separate sample is required for each grade that is grown. Buyers also often require growers to provide access to the crops as often as is deemed necessary to inspect the crops from time to time.

If the buyer is performing the tests in-house then the grower may also want to take samples at the same time and send them off to a certified third-party lab to verify the results that the buyer gets because those results are often going to have a dramatic impact on the price the grower will receive.

**Delivery**

The information contained in this document is provided for educational purposes only. It is not legal advice, and is not a substitute for the potential need to consult with a competent attorney licensed to practice law in the appropriate jurisdiction.
Strict time limits are often imposed regarding the time between harvest and delivery ranging from 48 hours to 5 days. These requirements are generally specifically addressed, but sometimes contracts just note that time is of the essence. Liability for delays in delivery are almost entirely placed on the grower absent gross negligence by the buyer. Upon delivery of the inappropriate quantity or quality, some contracts provide that the grower is responsible for paying the buyer for storage of the product, which typically determined by a set price per pound, per day.

Leftover seed or product grown in excess of the agreement is typically agreed to be the property of the buyer and the grower has no authority to sell excess seed or product to anyone but the buyer that is a party to the contract. Similarly to when a non-compliant crop is cultivated, growers are generally required to destroy excess hemp or leftover seed.

**Liability/Risk of Loss**

When disputes arise over the quality of the product, agreements vary as to the remedies available to each party. Typically, the buyer or distributor has great discretion and protection in dealing with these issues, which often means the ability to reject the product at its sole discretion. Nevertheless, the buyer still must normally notify the buyer of its decision to reject the product. When this happens, the grower is often allowed to keep the rejected product unless the contract requires otherwise, which would likely be because of some intellectual property interest that the buyer has in the hemp. However, even when the grower retains the rejected product, contracts will likely require that the buyer destroy it to prevent the grower from profiting from a product not grown in accordance with the contract.

The grower generally assumes the responsibility for any liability arising from the quality of the product grown. On occasion, contracts permit for liability to shift to the buyer upon transfer provided that the grower provided all necessary and accurate information related needed for testing of the product. For example, the grower may be liable, and accordingly suffer a loss, if it fails to take precautions to keep the crops free from disease and comply with any directions given by the buyer. This includes only applying chemicals and treatments to the crops that the buyer has permitted to be used.

In the event that disputes grow into litigation, parties may choose to address this through mandatory arbitration or choice of law and venue provisions. Though growing and production agreements are often between intrastate parties, most contracts contain a choice of law clause. In the instance that the two parties are not within the same state, the agreement typically provides that the applicable law is that of the state where the buyer is located. Choice of venue clauses typically set venue in the jurisdiction—often the county—where the buyer is located.

**Conclusion**

Contracts for the cultivation and sale of industrial hemp are still in their infancy. Many contracts across the country do not take into account the different challenges facing the industrial hemp industry compared to other commonly grown crops. However, due to the high investment costs associated with growing
industrial hemp farmers, and their lenders, like the certainty afforded by these contracts. When this is coupled with the requirement from the USDA Agricultural Marketing Service that hemp growers must have a contract in place to market the crop before they are able to purchase crop insurance has made contracting even more appealing to growers.

Unfortunately, the collapse of the CBD market in 2019 has made many processors unwilling to guarantee a purchase price which puts crop insurance out of reach for many growers and exposes growers to greater risk due to the high cost of producing a hemp crop for CBD or CBG purposes.
Hemp as an Agricultural Commodity

(name redacted)
Specialist in Agricultural Policy

Updated July 9, 2018
Summary

Industrial hemp is an agricultural commodity that is cultivated for use in the production of a wide range of products, including foods and beverages, cosmetics and personal care products, nutritional supplements, fabrics and textiles, yarns and spun fibers, paper, construction and insulation materials, and other manufactured goods. Hemp can be grown as a fiber, seed, or other dual-purpose crop. However, hemp is also from the same species of plant, Cannabis sativa, as marijuana. As a result, production in the United States is restricted due to hemp’s association with marijuana, and the U.S. market is largely dependent on imports, both as finished hemp-containing products and as ingredients for use in further processing (mostly from Canada and China). Current industry estimates report U.S. hemp sales at nearly $700 million annually.

In the early 1990s there was a sustained resurgence of interest to allow for commercial hemp cultivation in the United States. Several states conducted economic or market studies and initiated or enacted legislation to expand state-level resources and production. Congress made significant changes to federal policies regarding hemp in the 2014 farm bill (Agricultural Act of 2014 (P.L. 113-79, §7606). The 2014 farm bill provided that certain research institutions and state departments of agriculture may grow hemp under an agricultural pilot program. The bill further established a statutory definition for industrial hemp as “the plant Cannabis sativa L. and any part of such plant, whether growing or not, with a delta-9 tetrahydrocannabinol concentration of not more than 0.3 percent on a dry weight basis.” Delta-9 tetrahydrocannabinol is the dominant psychotropic ingredient in Cannabis sativa. In subsequent omnibus appropriations, Congress has blocked the U.S. Drug Enforcement Administration (DEA) and federal law enforcement authorities from interfering with state agencies, hemp growers, and agricultural research. Appropriators have also blocked the U.S. Department of Agriculture (USDA) from prohibiting the transportation, processing, sale, or use of industrial hemp that is grown or cultivated in accordance with the 2014 farm bill provision.

Despite these efforts, industrial hemp continues to be subject to U.S. drug laws, and growing industrial hemp is restricted. Under current U.S. drug policy, all cannabis varieties—including industrial hemp—are considered Schedule I controlled substances under the Controlled Substances Act (CSA, 21 U.S.C. §§801 et seq.). Although hemp production is generally allowed following requirements under the 2014 farm bill, some aspects of production remain subject to DEA oversight, including the importation of viable seeds, which still requires DEA registration according to the Controlled Substances Import and Export Act (21 U.S.C. §§951-971). Other guidance from DEA, USDA, and the Food and Drug Administration provides additional clarification regarding federal authorities’ position on hemp and its future policies regarding its cultivation and marketing. This guidance supports DEA’s contention that the commercial sale or interstate transfer of industrial hemp continues to be restricted.

Congress has continued to introduce legislation to further advance industrial hemp and address these types of concerns in the next farm bill. Introduced legislation as part of the Industrial Hemp Farming Act—first introduced in the 109th Congress and greatly expanded over the past few years—seeks to further facilitate hemp production in the United States but would also amend the CSA to specify that the term marijuana does not include industrial hemp. An expanded version of this bill was introduced in the 115th Congress in both the House and Senate (H.R. 5485; S. 2667). Many of the provisions in these bills are included in the Senate-passed 2018 farm bill (H.R. 2) that is now being debated in Congress. Similar provisions are not part of the House version of the 2018 farm bill (H.R. 2). Myriad other bills introduced in both the House and the Senate would further amend the CSA and other federal laws to address industrial hemp.
Contents

Hemp Production and Use ............................................................................................................. 1
  Commercial Uses of Hemp ....................................................................................................... 2
  Estimated Retail Market ........................................................................................................ 3
  U.S. Hemp Imports ................................................................................................................ 4
  U.S. Market Potential ............................................................................................................ 6
Global Production .................................................................................................................... 7
  International Production ...................................................................................................... 7
    Global Production (Excluding Canada) ................................................................................ 7
    Production in Canada ........................................................................................................ 9
  U.S. Production .................................................................................................................... 10
Federal Law and Requirements ................................................................................................ 12
  Controlled Substances Act of 1970 .................................................................................... 12
  Agricultural Act of 2014 ....................................................................................................... 13
  Selected Appropriations Actions ........................................................................................... 14
State Laws .................................................................................................................................. 16
DEA Policy Statements and Other Federal Guidance .............................................................. 18
  DEA Permit Requirements .................................................................................................. 18
  Dispute Over Hemp Imports (1999-2004) ........................................................................ 20
  2013 DEA Guidance Outlined in “Cole Memo” .................................................................. 22
  DEA’s Blocking of Imported Viable Hemp Seeds ................................................................. 24
  2016 Joint “Statement of Principles” on Industrial Hemp .................................................... 25
  2018 Restrictions on SBA Loans .......................................................................................... 27
  Other Federal Agency Actions .............................................................................................. 27
Ongoing Congressional Activity ............................................................................................... 28
  2018 Farm Bill Debate ........................................................................................................ 28
    House Farm Bill (H.R. 2) ................................................................................................. 29
    Senate Farm Bill (H.R. 2) ............................................................................................... 29
  Industrial Hemp Farming Act ............................................................................................... 33
  Legislation Regarding Possible Medical Applications of Hemp .......................................... 34
  Other Introduced Legislation ................................................................................................. 36
  Congressional Action on USDA Hemp Research Support ................................................... 37
Groups Supporting/Opposing Further Legislation ................................................................. 38
Concluding Remarks .............................................................................................................. 41

Figures

Figure 1. Modern Uses for Industrial Hemp ............................................................................. 3
Figure 2. U.S. Hemp-Based Product Sales by Category, 2016 .................................................. 4
Figure 3. Hemp Fiber and Seed, Global Acreage (2000-2016) ................................................ 8
Figure 4. Hemp Fiber and Seed, Global Production (2000-2016) ........................................... 8
Figure 5. Canadian Hemp Acreage, 1998-2017 ................................................................... 9
Figure 6. State Laws Related to Industrial Hemp .................................................................... 17
Tables
Table 1. Value and Quantity of U.S. Hemp Imports, 1996-2017 ........................................... 5
Table 2. Industrial Hemp Crop Report, United States, 2016-2017 ........................................... 11
Table 3. Provisions Addressing Industrial Hemp in House and Senate Farm Bills, Compared with Current Law ............................................................... 30

Appendixes
Appendix A. Listing of Selected Hemp Studies ............................................................... 42
Appendix B. Joint DEA/USDA/FDA “Statement of Principles on Industrial Hemp” ............... 43

Contacts
Author Contact Information .......................................................................................... 44
For centuries, industrial hemp (plant species Cannabis sativa) has been a source of fiber and oilseed used worldwide to produce a variety of industrial and consumer products. Currently, more than 30 nations grow industrial hemp as an agricultural commodity, which is sold on the world market. In the United States, however, production is strictly controlled under existing drug enforcement laws. Currently there is no large-scale commercial production in the United States, and the U.S. market depends on imports.

Congress made significant changes to federal policies regarding hemp in the 2014 farm bill (Agricultural Act of 2014, P.L. 113-79). The 2014 farm bill provided that certain research institutions and state departments of agriculture may grow hemp under an agricultural pilot program. In addition, in subsequent omnibus appropriations, Congress has blocked the U.S. Drug Enforcement Administration (DEA) and federal law enforcement authorities from interfering with state agencies, hemp growers, and agricultural research. Appropriators have also blocked the U.S. Department of Agriculture (USDA) from prohibiting the transportation, processing, sale, or use of industrial hemp that is grown or cultivated in accordance with the 2014 farm bill provision.

Despite these efforts, industrial hemp continues to be subject to U.S. drug laws, and growing industrial hemp is restricted. Under current U.S. drug policy, all cannabis varieties—including industrial hemp—are considered Schedule I controlled substances under the Controlled Substances Act (CSA), and DEA continues to control and regulate cannabis production. Although hemp production is now allowed in accordance with the requirements under the 2014 farm bill provision, other aspects of hemp production are still subject to DEA oversight, including the importation of viable seeds.

Congress has sought to further distinguish between industrial hemp and marijuana. Among the bills addressing industrial hemp, the Industrial Hemp Farming Act would amend the CSA to specify that the term marijuana does not include industrial hemp, thus excluding hemp from the CSA as a controlled substance subject to DEA regulation. This bill was reintroduced and expanded from bills introduced in previous Congresses dating back to the 109th Congress. An expanded version of this bill was introduced in the 115th Congress in both the House and Senate (H.R. 5485; S. 2667). Other provisions in these bills would further facilitate hemp production in the United States. Many of the provisions in these bills are included in the Senate version of the 2018 farm bill legislation (H.R. 2) that has passed the Senate. Similar provisions are not part of the House-passed 2018 farm bill (H.R. 2).

Other introduced legislation would amend the CSA “to exclude cannabidiol and cannabidiol-rich plants from the definition of marijuana” intended to promote the possible medical applications of industrial hemp. Myriad other bills introduced in both the House and the Senate would further amend the CSA and other federal laws to address industrial hemp.

## Hemp Production and Use

Botanically, industrial hemp and marijuana are from the same species of plant, Cannabis sativa, but from different varieties or cultivars that have been bred for different uses. However, industrial hemp and marijuana are genetically distinct forms of cannabis that are distinguished by their use, chemical makeup, and differing cultivation practices in production. While marijuana

---

1 21 U.S.C. §§801 et seq.
2 See, for example, “Purdue University Industrial Hemp Initiative,” NC-FAR Capitol Hill seminar, April 29, 2016.
3 In this report, cannabis refers to the plant species Cannabis sativa L and all of its industrial, medicinal, and recreational varieties. The terms industrial hemp and hemp are used interchangeably, and the term marijuana refers to the plant used as a medicinal or recreational drug.
generally refers to the psychotropic drug (whether used for medicinal or recreational purposes), industrial hemp is cultivated for use in the production of a wide range of products, including foods and beverages, personal care products, nutritional supplements, fabrics and textiles, paper, construction materials, and other manufactured goods.

Both hemp and marijuana also have separate definitions in statute. While marijuana is defined in U.S. drug laws, Congress established a statutory definition for *industrial hemp* as “the plant *Cannabis sativa* L. and any part of such plant, whether growing or not, with a delta-9 tetrahydrocannabinol concentration of not more than 0.3 percent on a dry weight basis” as part of the 2014 farm bill. Hemp is generally characterized by plants that are low in delta-9 tetrahydrocannabinol (delta-9 THC), the dominant psychotropic ingredient in *Cannabis sativa*.

For more background information, see CRS Report R44742, Defining “Industrial Hemp”: A Fact Sheet. However, joint guidance issued in August 2016 by DEA, USDA, and the Food and Drug Administration (FDA) suggests that there continues to be questions about what constitutes industrial hemp and its oversight under federal law.

**Commercial Uses of Hemp**

The global market for hemp consists of more than 25,000 products in nine submarkets: agriculture, textiles, recycling, automotive, furniture, food and beverages, paper, construction materials, and personal care (Table 1).

Hemp can be grown as a fiber, seed, or dual-purpose crop. The stalk and seed are the harvested products. The interior of the stalk has short woody fibers called hurds; the outer portion has long bast fibers. Hemp seed/grains are smooth and about one-eighth to one-fourth of an inch long.

Hemp fibers are used in fabrics and textiles, yarns and spun fibers, paper, carpeting, home furnishings, construction and insulation materials, auto parts, and composites. Hurds are used in animal bedding, material inputs, papermaking, and oil absorbents. Hemp seed and oilcake are used in a range of foods and beverages (e.g., salad and cooking oil and hemp dairy alternatives) and can be an alternative food and feed protein source. Oil from the crushed hemp seed is used in soap, shampoo, lotions, bath gels, and cosmetics. Hemp is also being used in nutritional supplements and in medicinal and therapeutic products, including pharmaceuticals. It is also used in a range of composite products. Hempcrete (a mixture of hemp hurds and lime products) is being used as a building material. Hemp is also used as a lightweight insulating material and in

---

6 Different developed varieties may be better suited for one use or the other. Cultivation practices also differ depending upon the variety planted. For more information, see CRS Report R44742, Defining “Industrial Hemp”: A Fact Sheet.
8 Some are promoting use of hemp as a rotational crop for use as an animal feed supplement (CRS communication with an Iowa cattle producer, February 28, 2016). See also B. Weaver, “Not Your Grandpa’s Farm: Hemp Industry Faces Growing Pains in Colorado,” *The Tribune*, October 1, 2016.
9 Some have suggested similarities between hempseed oil and hash oil. However, there is evidence suggesting differences regarding initial feedstock or input ingredients (hash oil requires high-THC marijuana, whereas hempseed oil uses low-THC industrial hemp), how they are produced (hash oil is extracted often using a flammable solvent, whereas hempseed oil is expeller-pressed or extracted mechanically, generally without chemicals or additives), and how they are used (hash oil is used as a psychoactive drug, whereas hempseed oil is used as an ingredient in hemp-based foods, supplements, and body care products). For more background information, congressional clients may contact the author of this report.
hemp plastics and related composites for use as a fiberglass alternative by the automotive and aviation sectors.\(^{10}\) Hemp is also promoted as a potential biodiesel feedstock\(^ {11}\) and cover crop.

These types of commercial uses are widely documented in a range of feasibility and marketing studies conducted by researchers at USDA and various land grant universities and state agencies. (A listing of these studies is in the Appendix A.) Currently, finished hemp products and raw material inputs are mostly imported into the United States and sold for use in further processing and manufacturing for a wide range of products.

**Figure 1. Modern Uses for Industrial Hemp**


### Estimated Retail Market

No official estimates are available of the value of U.S. sales of hemp-based products. The Hemp Industries Association (HIA) reports total U.S. retail sales of hemp products of nearly $700 million in 2016,\(^ {12}\) which includes food and body products, dietary supplements, clothing, auto

---

10 Virginia Industrial Hemp Coalition, “2015 Virginia Industrial Hemp Recommended Research Topics.”

11 See, for example, M. H. Renfroe, “Investigation of Industrial Hemp for Oil and Biofuel Production in Virginia,” Annual Report to Virginia Department of Agriculture and Consumer Services, August 30, 2016.

12 HIA, “2016 Annual Retail Sales for Hemp Products Estimated at $688 Million,” April 14, 2017. The reported retail value of the U.S. hemp market is an estimate based on SPINS survey data, which tracks data and market trends on natural product industry sales. SPINS data do not track retail sales for Whole Foods Market, Costco, and other retail outlets that market hemp-based products. HIA adjusted SPINS-data upward to account for these gaps.
parts, building materials, and other consumer products (Figure 2). HIA claims that U.S. hemp retail sales have increased by about 10% to more than 20% annually since 2011. Much of this growth is attributable to sales of hemp-based body products, supplements, and foods. Combined, these categories accounted for more than two-thirds of the value of U.S. retail sales in 2016.

Little detailed information is available on some other hemp-based sectors, such as for use in construction, biofuels, paper, textiles, or other manufacturing uses. Data are also not available on existing businesses or processing facilities.

![Figure 2. U.S. Hemp-Based Product Sales by Category, 2016](image)


### U.S. Hemp Imports

Hemp imports to the United States—consisting of hemp seeds and fibers often used as inputs for use in further manufacturing—totaled $67.3 million in 2017 (Table 1). Although hemp imports have declined from a record high of $78.1 million in 2015, U.S. hemp imports have steadily increased since 2005 when hemp imports totaled $5.7 million. This increase in trade followed the resolution of a legal dispute over U.S. imports of hemp foods in late 2004 (see “Dispute Over Hemp Imports (1999-2004)”) and also prior prohibitions on U.S. domestic production.

In 2017, nearly two-thirds (64%) of the value of all U.S. hemp imports were of hemp seeds, which were used mostly as inputs and ingredients for hemp-based products. Other ingredient imports—hemp oil, seed cake, and solids—accounted for another 28% of the value of total imports. Import hemp yarns and fibers accounted for about 8% of total import value in 2017 (Table 1). Trade data are not available for finished products, such as hemp-based clothing or other products including construction materials, carpets, or paper products.

Canada is the single largest supplier of U.S. hemp imports, accounting for about 90% of the value of annual imports. Other leading country suppliers include China (about 3-5% of annual imports) and Romania (2-4%). Remaining imports are supplied by other European countries, India, the Dominican Republic, and Chile. Canada is the primary source of U.S. imports of food-grade hemp seed and oilcake, with supplies also from China and Europe. China and some European countries are major suppliers of raw and processed hemp fiber and yarn.
Three forms of seed are imported:\(^\text{13}\) (1) *de-hulled seed*—often referred to as hemp hearts, hulled seeds, or hemp nut—which is used in a range of food products; (2) *non-viable whole seed*, which is rendered non-viable through a sterilization process, usually through temperature exposure; and (3) *viable whole seed*, which is capable of germination under suitable conditions. Most hemp seed cultivars originate in Europe (France, Germany, Hungary, Italy, Poland, and Romania), Russia, Ukraine, and China.

<table>
<thead>
<tr>
<th>Table 1. Value and Quantity of U.S. Hemp Imports, 1996-2017</th>
</tr>
</thead>
<tbody>
<tr>
<td>Hemp Seeds (HS 1207990320)</td>
</tr>
<tr>
<td>Hemp Oil and Fractions (HS 1515908010)</td>
</tr>
<tr>
<td>Hemp Seed Oilcake and Solids (HS 2306900130)</td>
</tr>
<tr>
<td>True Hemp, raw/proc. not spun (HS 5302)</td>
</tr>
<tr>
<td>True Hemp Yarn (HS 5308200000)</td>
</tr>
<tr>
<td>True Hemp Woven Fabrics (HS 5311004010)</td>
</tr>
<tr>
<td><strong>Total</strong></td>
</tr>
</tbody>
</table>

| Hemp Seeds (HS 1207990320) | metric ton | — | — | 92 | 712 | 2,311 | 2,783 | 15,977 | 17,820 | 7,606 |
| Hemp Oil and Fractions (HS 1515908010) | metric ton | — | 587 | 287 | 215 | 450 | 1,155 | 538 | 767 | 749 |
| Hemp Seed Oilcake and Solids (HS 2306900130) | metric ton | — | — | — | 240 | 601 | 938 | 1,826 | 1,163 | 1,475 |
| True Hemp, raw/proc. not spun (HS 5302) | metric ton | 53 | 678 | 181 | 42 | 72 | 161 | 278 | 494 | 621 |
| True Hemp Yarn (HS 5308200000) | metric ton | 6 | 89 | 113 | 42 | 70 | 102 | 166 | 213 | 312 |
| **Subtotal** | 59 | 1,354 | 673 | 1,251 | 3,504 | 5,139 | 18,785 | 20,457 | 10,763 |

| True Hemp Woven Fabrics (HS 5311004010) | m2 (1000) | 435 | 920 | 478 | 284 | 224 | 151 | 206 | 150 | 360 |

**Source:** Compiled by CRS using data from the U.S. International Trade Commission, http://dataweb.usitc.gov. Data are by Harmonized System (HS) code. Data shown as “—” indicate data are not available as breakout.

categories or, for some product subcategories, were established only recently. Data are not adjusted for inflation.


U.S. Market Potential

Most researchers acknowledge the potential profitability of industrial hemp, but also the potential obstacles to its development. Current challenges facing the industry include the need to re-establish agricultural supply chains, breed varieties with modern attributes, upgrade harvesting equipment, modernize processing and manufacturing, and identify new opportunities.14

In the past two decades, researchers at the USDA and various land grant universities and state agencies (for example, Arkansas, Kentucky, Maine, Minnesota, North Dakota, Oregon, and Vermont; see Appendix A) have conducted several feasibility and marketing studies. More recent available market reports indicate that the estimated gross value of hemp production per acre is about $21,000 from seeds and $12,500 from stalks.15

Studies by researchers in Canada and various state agencies provide a mostly positive market outlook for growing hemp, citing rising consumer demand and the potential range of product uses for hemp. Some state reports claim that if current restrictions on growing hemp in the United States were removed, agricultural producers in their states could benefit. A 2008 study reported that acreage under cultivation in Canada, “while still showing significant annual fluctuations, is now regarded as being on a strong upward trend.” Most studies generally note that hemp “has such a diversity of possible uses, [and] is being promoted by extremely enthusiastic market developers.” Other studies highlight certain production advantages associated with hemp or acknowledge hemp’s benefits as a rotational crop or further claim that hemp may be less environmentally degrading than other agricultural crops. Other studies claim certain production advantages to hemp growers, such as relatively low input and management requirements.

Other studies differ from the various state reports and provide a less favorable aggregate view of the potential market for hemp growers in the United States, highlighting challenges facing U.S. growers. For example, a 2000 study by USDA projected that U.S. hemp markets “are, and will likely remain, small, thin markets.” It also cited “uncertainty about long-run demand for hemp products and the potential for oversupply” among possible downsides of potential future hemp production. Similarly, a study by University of Wisconsin-Madison concluded that hemp production “is not likely to generate sizeable profits,” and, although hemp may be “slightly more profitable than traditional row crops,” it is likely “less profitable than other specialty crops” due to the “current state of harvesting and processing technologies, which are quite labor intensive, and result in relatively high per unit costs.”16 The study also noted that U.S. growers could be affected by competition from other world producers and by production limitations in the United States, including yield variability and lack of harvesting innovations and processing facilities, as well as difficulty transporting bulk hemp. The study further claimed that most estimates of profitability from hemp production are highly speculative and often do not include additional costs of growing hemp in a regulated market, such as the cost associated with “licensing, monitoring, and verification of commercial hemp.”

14 Ibid.
Hemp as an Agricultural Commodity

A 2013 study by researchers at the University of Kentucky predicted that despite “showing some positive returns, under current market conditions, it remained unclear whether anticipated hemp returns would be large enough to entice Kentucky grain growers to shift out of grain production” under most circumstances. They also noted that “short run employment opportunities evolving from a new Kentucky hemp industry appear limited (perhaps dozens of new jobs, not 100s),” because of continued uncertainty in the industry. Overall, the study concluded that there were many remaining unknowns and that further analysis and production research was needed.

A 2016 study notes that the most promising markets for North American hemp production is a continued focus on oilseed production and cannabidiol (CBD), a non-intoxicant cannabinoid that has promise for its therapeutic use as a pharmaceutical product.

Given the absence since the 1950s of any commercial and unrestricted hemp production in the United States, it is not possible to predict the potential market and employment effects of relaxing current restrictions on U.S. hemp production. While expanded market opportunities might exist in some states or localities if current restrictions on production are lifted, it is not possible to predict the potential for future retail sales or employment gains in the United States, either nationally or within certain states or regions. Little information is available from previous market analyses that have been conducted by researchers at USDA and land grant universities and state agencies.

Global Production

International Production

Approximately 30 countries in Europe, Asia, and North and South America currently permit farmers to grow hemp. Aggregated production data from the United Nations do not include all countries (most notably Canada) and may differ from other sources but comprise the most readily available source of information. Based on these data, excluding Canada, global acreage in hemp cultivation in 2016—both hemp seed and hemp tow waste—is reported at about 192,000 acres (Figure 3), with a reported total production of 355 million pounds (Figure 4). United Nations data do not include Canada, which is a major hemp producing and exporting country. Including other data for Canada, in 2016, aggregate acreage totaled at about 225,000 acres. Canada is also major supplier of U.S. hemp imports, particularly of hemp-based foods and food ingredients and other related imported products.

Preliminary information for 2017 indicate that hemp acreage in Canada and the European Union (EU) countries reached record levels, which could put global acreage at more than 330,000 acres. Still, as a share of total crop production in these countries, hemp production accounts for a negligible share (less than 0.5%) of total acreage.

Global Production (Excluding Canada)

Leading global hemp producers include Europe, China, South Korea, and Russia. Some countries never outlawed production; other countries banned production for certain periods in the past and

---

17 University of Kentucky, Considerations for Growing Industrial Hemp: Implications for Kentucky’s Farmers and Agricultural Economy, July 2013.

later lifted these restrictions. Hemp production across these countries and regions account for nearly all the reported production and acreage reported in the U.N. database.

According to Food and Agriculture Organization (FAO) of the United Nations data, Europe is the world’s single largest hemp producing market. In 2016, European countries produced hemp on a reported more than 80,000 acres—a historical record high and accounting for about one-half of FAO-reported global acreage. The EU has an active hemp market, with production in most member nations. Production is centered in France, the Netherlands, Lithuania, and Romania. Many EU countries lifted their bans on hemp production in the 1990s and, until recently, also subsidized the production of “flax and hemp” under the EU’s Common Agricultural Policy. Most EU production is of hurds, seeds, fibers, and pharmaceuticals. Other non-EU European countries with reported hemp production include Russia, Ukraine, and Switzerland.

China is another major producer, mostly of hemp textiles and related products, as well as a major supplier to the United States. In 2016, China’s hemp was about 20,000 acres. FAO data also report hemp production in Chile, China, Iran, Japan, South and North Korea, Pakistan, Russia, Syria, and Turkey. Other countries with active hemp grower and/or consumer markets not

---


20 EIHA, “The European Hemp Industry,” May 2016. Other producing countries include Austria, Bulgaria, Croatia, Czechia, Denmark, Finland, Germany, Hungary, Italy, Poland, Portugal, Slovenia, Spain, and Ukraine.

21 For information on the EU’s prior agricultural support for industrial hemp, see the EU’s notification to the World Trade Organization regarding its domestic support for agricultural producers (G/AG/N/EEC/68; January 24, 2011).

included in FAO’s annual compilation are New Zealand, India, Egypt, South Africa, Thailand, Malawi, and Uruguay.\textsuperscript{23}

**Production in Canada**

Canada’s commercial hemp industry is fairly new: Canada began to issue licenses for research crops in 1994, followed by commercial licenses starting in 1998. Since hemp cultivation was legalized in Canada, production has been variable year to year (Figure 5) but generally increasing—which some attribute to increased import demand in the United States.\textsuperscript{24} Acreage has ranged from 48,000 planted acres in 2006 to about 8,000 acres in 2008, rising again to a 100,000 acres in 2014 but then sharply dropping back again to 33,000 acres in 2016. In 2017, acreage in hemp cultivation and production rose sharply—reaching a record of nearly 140,000. Canada’s hemp cultivation still accounts for only about 1% of the country’s available farmland. The number of cultivation licenses has also varied from year to year, reaching a high of 560 licenses in 2006, followed by a low of 77 licenses in 2008 and rising to 340 licenses in 2011.\textsuperscript{25} Since then, the number of licenses has risen to more than 1,100 issued in 2015 and 2016. Annual retail sales of all Canadian-derived hemp seed products are estimated between $20 million and $40 million, and the number of businesses active in the sector has grown over the past few years.\textsuperscript{26}

*Figure 5. Canadian Hemp Acreage, 1998-2017*


\textbf{Notes:} The downturn in 2007 is viewed as a correction of overproduction in 2006 following the “success of the court case against DEA in 2004, and continued improvements in breeding, production, and processing,” which resulted in part in a “dramatic reduction in hemp acreage planted” in 2007. The 2007 downturn is also attributed to “increasingly positive economics of growing other crops” (Manitoba Agriculture, National Industrial Hemp Strategy, March 2008, prepared for Food and Rural Initiative Agriculture and Agri-Food Canada).

\textsuperscript{23} For a list of countries, see National Hemp Association, “Countries Where Hemp Is Grown,” http://nationalhempassociation.org/countries-where-hemp-is-grown/.

\textsuperscript{24} See, for example, Canadian Hemp Trade Alliance, “Grow Hemp,” http://www.hemptrade.ca/grow-hemp.


\textsuperscript{26} See, for example, Canadian Hemp Trade Alliance, “Grow Hemp.”
The development of Canada’s hemp market followed a 60-year prohibition and is strictly regulated. The Office of Controlled Substances of Health Canada, which issues licenses for all activities involving hemp administers the program. Under the regulation, all industrial hemp grown, processed, and sold in Canada may contain THC levels of no more than 0.3% of the weight of leaves and flowering parts. Canada has also set a maximum level of 10 parts per million for THC residues in products derived from hemp grain, such as flour and oil. To obtain a license to grow hemp, Canadian farmers must submit extensive documentation, including background criminal record checks, the Global Positioning System (GPS) coordinates of their fields, and supporting documents (from the Canadian Seed Growers’ Association or the Canadian Food Inspection Agency) regarding their use of certified low-THC hemp seeds and approved cultivars; and they must allow government testing of their crop for THC levels.

In 2016, Canada further relaxed its regulations of industrial hemp production by amending its drug laws to provide for a “class exemption” for hemp in order to “simplify the license application process for the 2017 growing season.” According to Health Canada, the Section 56 Class Exemption “better aligns regulation of industrial hemp with the demonstrated low public health and safety risks of the crop” intended “to simplify the license application process” as Canada moves forward with “its commitment to legalize, strictly regulate, and restrict access to marijuana.” Among the types of simplifications and streamlining are:

- reduced pre-requisite requirements (e.g., no longer need to pre-identify planting sites, no more minimum acreage requirements);
- reduced paperwork (to a single form), reduced proof requirements (to a single attestation), and growers may now apply electronically;
- THC testing requirements mostly eliminated (except for pedigreed seed or applications to be added to the list of approved cultivars);
- license expiry date extended until March the following year; and
- criminal record check valid now for one year.

The potential impact could greatly facilitate hemp production for Canadian farmers, which could continue to give them an advantage over U.S. growers, where hemp production remains restricted and legal in only few cases.

U.S. Production

Following enactment of the 2014 farm bill, hemp cultivation became allowed under certain circumstances by research institutions and state departments of agriculture. Official estimates of U.S. hemp production are not available. Information compiled by states and industry indicate that there were more than 25,500 acres of hemp production in 2017, up from 9,770 acres in 2016 (Table 2). In 2017, there were 1,420 registered or licensed growers and 32 universities.

---

27 Industrial Hemp Regulations (SOR/98-156), as part of the Controlled Drugs and Substances Act.
29 See Health Canada’s FAQs on its hemp regulations and its application for obtaining permits (http://www.hc-sc.gc.ca/). Other information is at the Canadian Food Inspection Agency website (http://www.inspection.gc.ca/).
31 Canadian Hemp Trade Alliance, “Health Canada Issues an Interim Class Exemption for Hemp.” See also Health Canada, “Notice to Industry” and “Section 56 Class Exemption in Relation to the Industrial Hemp Regulations,” November 2016.
Hemp was widely grown in the United States from the colonial period into the mid-1800s. Fine and coarse fabrics, twine, and paper from hemp were in common use. By the 1890s, labor-saving machinery for harvesting cotton made the latter more competitive as a source of fabric for clothing, and the demand for coarse natural fibers was met increasingly by imports. Industrial hemp was handled in the same way as any other farm commodity in that USDA compiled statistics and published crop reports and provided assistance to farmers promoting production and distribution. In the early 1900s, hemp continued to be grown, and USDA researchers

Table 2. Industrial Hemp Crop Report, United States, 2016-2017

<table>
<thead>
<tr>
<th>State</th>
<th>2016</th>
<th>2017</th>
<th>Purposes Grown</th>
</tr>
</thead>
<tbody>
<tr>
<td>Colorado</td>
<td>5,921</td>
<td>9,700</td>
<td>Fiber, grain, seed for sale, CBD</td>
</tr>
<tr>
<td>Hawaii</td>
<td>1</td>
<td>TBD</td>
<td>NA</td>
</tr>
<tr>
<td>Indiana</td>
<td>2</td>
<td>5</td>
<td>NA</td>
</tr>
<tr>
<td>Kentucky</td>
<td>2,525</td>
<td>3,100</td>
<td>Fiber, grain, seed for sale, CBD</td>
</tr>
<tr>
<td>Maine</td>
<td>1</td>
<td>30</td>
<td>Unknown</td>
</tr>
<tr>
<td>Minnesota</td>
<td>51</td>
<td>1,205</td>
<td>Fiber, grain, CBD (non-medical)</td>
</tr>
<tr>
<td>Montana</td>
<td>0</td>
<td>542</td>
<td></td>
</tr>
<tr>
<td>Nebraska</td>
<td>1</td>
<td>1</td>
<td>NA</td>
</tr>
<tr>
<td>Nevada</td>
<td>216</td>
<td>417</td>
<td>Fiber, grain</td>
</tr>
<tr>
<td>New York</td>
<td>30</td>
<td>2,000</td>
<td>NA</td>
</tr>
<tr>
<td>North Carolina</td>
<td>0</td>
<td>965</td>
<td></td>
</tr>
<tr>
<td>North Dakota</td>
<td>70</td>
<td>3,020</td>
<td>Grain</td>
</tr>
<tr>
<td>Oregon</td>
<td>500</td>
<td>3,469</td>
<td>NA</td>
</tr>
<tr>
<td>Pennsylvania</td>
<td>0</td>
<td>36</td>
<td>NA</td>
</tr>
<tr>
<td>Tennessee</td>
<td>225</td>
<td>200</td>
<td>CBD</td>
</tr>
<tr>
<td>Vermont</td>
<td>180</td>
<td>575</td>
<td>CBD research</td>
</tr>
<tr>
<td>Virginia</td>
<td>37</td>
<td>87</td>
<td>Fiber, grain research</td>
</tr>
<tr>
<td>Washington</td>
<td>0</td>
<td>175</td>
<td>NA</td>
</tr>
<tr>
<td>West Virginia</td>
<td>10</td>
<td>14</td>
<td>Fiber, grain</td>
</tr>
<tr>
<td>Total</td>
<td>9,770</td>
<td>25,541</td>
<td></td>
</tr>
</tbody>
</table>

Source: CRS from information from Vote Hemp, “2017 U.S. Hemp Crop Report,” January 2018 (number of acres), and the Colorado Department of Agriculture, “2016 National Hemp Regulatory Meeting Survey,” October 2016 (“purposes grown”). “NA” indicates that information is not available.
continued to publish information related to hemp production and also reported on hemp’s potential for use in textiles and in paper manufacturing. Several hemp advocacy groups, including HIA and Vote Hemp, Inc., have compiled other historical information and have copies of original source documents.

Between 1914 and 1933, in an effort to stem the use of Cannabis flowers and leaves for their psychotropic effects, 33 states passed laws restricting legal production to medicinal and industrial purposes only. The 1937 Marihuana Tax Act defined hemp as a narcotic drug, requiring that farmers growing hemp hold a federal registration and special tax stamp, effectively limiting further production expansion.

In 1943, U.S. hemp production reached more than 150 million pounds (140.7 million pounds hemp fiber; 10.7 million pound hemp seed) on 146,200 harvested acres. This compared to pre-war production levels of about 1 million pounds. After reaching a peak in 1943, production started to decline. By 1948, production had dropped back to 3 million pounds on 2,800 harvested acres, with no recorded production after the late 1950s.

**Federal Law and Requirements**

**Controlled Substances Act of 1970**

In 1937, Congress passed the first federal law to discourage cannabis production for marijuana while still permitting industrial uses of the crop (the Marihuana Tax Act; 50 Stat. 551). Under this statute, the government actively encouraged farmers to grow hemp for fiber and oil during World War II. After the war, competition from synthetic fibers, the Marihuana Tax Act, and increasing public anti-drug sentiment resulted in fewer and fewer acres of hemp being planted and none at all after 1958. The CSA placed the control of select plants, drugs, and chemical substances under federal jurisdiction and was enacted, in part, to replace previous federal drug laws with a single comprehensive statute.

The CSA adopted the same definition of *Cannabis sativa* that appeared in the 1937 Marihuana Tax Act. The definition of “marihuana” (21 U.S.C. §802(16)) reads:

The term marihuana means all parts of the plant Cannabis sativa L., whether growing or not; the seeds thereof; the resin extracted from any part of such plant; and every compound, manufacture, salt, derivative, mixture, or preparation of such plant, its seeds or resin. Such term does not include the mature stalks of such plant, fiber produced from such stalks, oil or cake made from the seeds of such plant, any other compound ... or preparation of such mature stalks (except the resin extracted therefrom), fiber, oil, or cake, or the sterilized seed of such plant which is incapable of germination.

---


42 USDA Agricultural Statistics, various years through 1949. A summary of data spanning 1931-1945 is available in the 1946 edition. See “Table 391—Hemp Fiber and Hempseed: Acreage, Yield, and Production, United States.”

The statute thus retains control over all varieties of the cannabis plant by virtue of including them under the term *marijuana* and does not distinguish between low- and high-THC varieties. The language exempts from control the parts of mature plants—stalks, fiber, oil, cake, etc.—intended for industrial uses. Some have argued that the CSA definition exempts industrial hemp under its term exclusions for stalks, fiber, oil, cake, and seeds.\(^{44}\) DEA refutes this interpretation.\(^{45}\)

Strictly speaking, the CSA does not make growing cannabis illegal; rather, it places strict controls on its production, making it illegal to grow the crop without a DEA permit. Regarding industrial hemp, however, growers that comply with the 2014 farm bill provision (discussed in the next section) do not need DEA approval.

**Agricultural Act of 2014**

The 113\(^{th}\) Congress considered various changes to U.S. policies regarding industrial hemp during the omnibus farm bill debate.\(^{46}\) The 2014 farm bill (Agricultural Act of 2014 [P.L. 113–79], §7606)\(^{47}\) provides that certain “institutions of higher education”\(^{48}\) and state departments of agriculture may grow industrial hemp, as part of an agricultural pilot program, if allowed under state laws where the institution or state department of agriculture is located. The farm bill also established a statutory definition of *industrial hemp* as “the plant *Cannabis sativa* L. and any part of such plant, whether growing or not, with a delta-9 tetrahydrocannabinol concentration of not more than 0.3 percent on a dry weight basis.” The provision was included as part of the research title of the law. The provision did not include an effective date that would suggest any kind of program rollout, and there appears to be nothing in the conference report or bill language to suggest that the states might not be able to immediately initiate action on this provision.

This provision was adopted when Representatives Polis, Massie, and Blumenauer introduced an amendment to the House version of the farm bill (the Federal Agriculture Reform and Risk Management Act of 2013) during floor debate on the bill. The amendment (H.Amdt. 208) was to allow institutions of higher education to grow or cultivate industrial hemp for the purpose of agricultural or academic research and applied to states that already permit industrial hemp growth and cultivation under state law. The amendment was adopted by the House of Representatives. Although the full House ultimately voted to reject H.R. 1947, similar language was included as part of a subsequent revised version of the House bill (H.R. 2642), which was passed by the full House.

In the Senate, Senators Wyden, McConnell, Paul, and Merkley introduced an amendment to the Senate version of the farm bill (S. 954, the Agriculture Reform, Food and Jobs Act of 2013). The amendment (S.Amdt. 952) would have amended the CSA to exclude industrial hemp from the definition of marijuana. The amendment was not adopted as part of the Senate-passed farm bill.

During conference on the House and Senate bills, the House provision was adopted with additional changes. The enacted law expands the House bill provision to allow both certain research institutions and also state departments of agriculture to grow industrial hemp, as part of

\(^{44}\) See, for example, Hemp Industries Association v. Drug Enforcement Administration, 357 F.2d (9th Circuit 2004).

\(^{45}\) 66 Federal Register 51530, October 9, 2001.

\(^{46}\) For farm bill information, see CRS Report R43076, *The 2014 Farm Bill (P.L. 113–79): Summary and Side-by-Side*.

\(^{47}\) 7 U.S.C. §5940.

\(^{48}\) Although not defined in the 2014 farm bill, the 2016 joint statement defines “institutions of higher education” according to the Higher Education Act of 1965, Section 101 of (20 U.S.C. §1001).
an agricultural pilot program, if allowed under state laws where the institution or state department of agriculture is located.

As the farm bill did not include an effective date distinct from the date of enactment, several states responded by making immediate plans to initiate new hemp pilot projects. In addition, several states enacted legislation to allow for hemp cultivation, which is a precondition for allowances under the 2014 farm bill.

Some have speculated whether the industrial hemp provision in the 2014 farm bill could terminate, expire, or require reauthorization in a subsequent farm bill. Although some individual authorizations in the farm bill specifically have provisions indicating that they expire in 2018 (such as authorized funding levels), the industrial hemp research provision in the 2014 farm bill does not have such language. Furthermore, the farm bill does not contain a default sunset provision for all its authorizations. Accordingly, the industrial hemp research provision in the 2014 farm bill appears to be intended to have some degree of permanence.

Despite these efforts, industrial hemp continues to be subject to U.S. drug laws, and growing industrial hemp is restricted. Under current U.S. drug policy, all cannabis varieties—including industrial hemp—are considered Schedule I controlled substances under the CSA. Although hemp production is now allowed in accordance with the requirements under the 2014 farm bill provision, other aspects of production are still subject to DEA oversight, including the importation of viable seeds, which still requires DEA registration according to the Controlled Substances Import and Export Act (CSIEA, 21 U.S.C. §§951-971). This requirement was reinforced in a 2016 joint Statement of Principles on Industrial Hemp from DEA, USDA, and FDA. The 2016 guidance also clarifies DEA’s contention that the commercial sale or interstate transfer of hemp continues to be restricted. (For more information, see “2016 Joint “Statement of Principles” on Industrial Hemp”.)

**Selected Appropriations Actions**

Immediately following the 2014 farm bill, some states quickly responded by expanding their efforts to grow industrial hemp. However, the absence of viable seeds to grow industrial hemp and DEA efforts to block imports of viable seed slowed these efforts. (For more information, see “DEA’s Blocking of Imported Viable Hemp Seeds”.) To avoid future similar DEA actions that might further stall full implementation of the hemp provision of the farm bill, Congress acted swiftly. Both the House and Senate FY2015 Commerce-Justice-Science (CJS) appropriations bills contained provisions to block federal law enforcement authorities from interfering with state agencies and hemp growers and counter efforts to obstruct agricultural research. The enacted FY2015 appropriation blocked federal law enforcement authorities from interfering with state agencies, hemp growers, and agricultural research. The provision stated that “none of the funds made available” to the U.S. Justice Department and DEA “may be used in contravention” of the 2014 farm bill. Similar language has been included in each subsequent enacted CSJ appropriation and is now also part Agriculture appropriation.

49 See, for example, comments made during a National Agricultural Law Center webinar, “Production of Industrial Hemp in the U.S.: Overview, Status, and Legal Issue,” October 13, 2015.


51 P.L. 113-235, Division B, §539.
The enacted FY2018 Agriculture appropriation states that none of the funds made available by the Agriculture or any other appropriation may be used in contravention of the 2014 farm bill provision or “to prohibit the transportation, processing, sale, or use of industrial hemp that is grown or cultivated” in accordance with the farm bill provision “to prohibit the transportation, processing, sale, or use of industrial hemp, or seeds of such plant, that is grown or cultivated” in accordance with the 2014 farm bill “within or outside the State in which the industrial hemp is grown or cultivated.” The FY2017 and FY2016 Agriculture appropriation contained similar language. Language referring to selling industrial hemp within a state addresses intrastate commerce, whereas language referring to selling hemp outside the state may be considered to address interstate commerce.

The FY2018 CJS appropriation (Division B of P.L. 115-31) states that “none of the funds made available by this Act may be used in contravention of section 7606 (‘Legitimacy of Industrial Hemp Research’) of the Agricultural Act of 2014 (P.L. 113-79) by the Department of Justice or the Drug Enforcement Administration.” The enacted FY2017, FY2016, and FY2015 CJS appropriation contained similar language to block federal law enforcement from interfering with state agencies, hemp growers, and agricultural research.

Other proposed appropriations bills had also addressed industrial hemp. For example, the Senate FY2018 Energy and Water Development and Related Agencies appropriations proposed to prohibit regulators from denying hemp growers access to water if hemp is grown or cultivated in accordance with the laws of the state in which such use occurs. The provision was not enacted as part of the omnibus appropriation.

In prior appropriations debates, the House CJS bills also included provisions stating that no funds be used to prevent a state from implementing its own state laws that “authorize the use, distribution, possession, or cultivation of industrial hemp” as defined in the 2014 farm bill. These provisions were not adopted. In addition, as part of the FY2017 Agriculture appropriations debate, the Senate committee report urged USDA “to clarify the Agency’s authority to award Federal funds to research projects deemed compliant with Section 7606 of the Agricultural Act of 2014.” The latter provision addressed questions by a number of state and private research institutions about the extent to which industrial hemp initiatives might be eligible for U.S. federal grant programs (both USDA and non-USDA program funds). This action built on previous efforts by several Members of Congress who sent a letter to USDA in November 2015 requesting clarification of the agency’s research funds for industrial hemp.

Additional information on the legislative intent behind the 2014 farm bill provision and a congressional response to DEA has taken actions that are in contravention of the farm bill.

---

52 P.L. 115-141, Division A, §729.
53 P.L. 115-31, Division A, §773, and P.L. 115-141, Division A, §729, respectively.
54 P.L. 115-31, §538, P.L. 113-235, Division B, §539; and P.L. 114-113, Division B, §543, respectively.
55 S. 1609, §204 (115th Congress).
56 H.R. 4660, §557 (113th Congress); H.R. 2578, §557 (114th Congress).
57 H.Rept. 114-259.
58 Letter to USDA Secretary Tom Vilsack signed by 37 Representatives and 12 Senators, November 20, 2015.
59 HIA, et al., v. DEA, et al., amicus brief of Members of the U.S. Congress, 9th Circuit, No. 17-70162, https://polis.house.gov/uploadedfiles/amicus_brief.pdf. This amicus brief was written by attorneys for Members of the U.S. Congress. The court case was ultimately dismissed by the Ninth Circuit in April 2018 on procedural grounds.
State Laws

Since the mid-1990s, there has been a resurgence of interest in the United States in producing industrial hemp. Farmers in regions of the country that are highly dependent upon a single crop, such as tobacco or wheat, have shown interest in hemp’s potential as a high-value alternative crop, although the economic studies conducted so far paint a mixed profitability picture. Beginning around 1995, an increasing number of state legislatures began to consider a variety of initiatives related to industrial hemp. Most of these have been resolutions calling for scientific, economic, or environmental studies, and some are laws authorizing planting experimental plots under state statutes.

Following enactment of the 2014 farm bill provision, several states have quickly been adopting new state laws to allow for cultivation. To date, nearly 40 states or territories have enacted or introduced legislation favorable to hemp cultivation (Figure 6). Other states reportedly considering hemp legislation include Arizona, Georgia, Iowa, Kansas, Mississippi, New Mexico, Oklahoma, South Dakota, and Texas.60 (The status of state actions regarding hemp is changing rapidly, and information differs depending on source.61)

Requirements differ among the states, and some states have enacted laws that are considered more comprehensive than others.62 Some common provisions across these state laws include

- defining industrial hemp (based on the percentage of THC it contains) and excluding hemp from the definition of “controlled substances” under state law;
- authorizing the growing and possessing of industrial hemp by creating an advisory board or commission;
- establishing or authorizing a state licensing or registration program for growers and/or seed breeders;
- requiring recordkeeping;
- requiring waivers or changes to federal law;
- establishing or authorizing fee structures;
- establishing inspection procedures;
- allowing state departments to collect funds for research programs;
- promoting research and development of markets for industrial hemp;
- establishing certified seed requirements63 or, in some states, “heritage hemp seeds” (e.g., in Colorado and Kentucky); and
- establishing penalties.

60 Information from the National Hemp Association, http://nationalhempassociation.org/.
61 Resources for updated information include the National Conference of State Legislatures (NCSL), “State Industrial Hemp Statutes,” and the advocacy group Vote Hemp.
62 National Agricultural Law Center, “Production of Industrial Hemp in the U.S.”
63 Certified seed varieties are those proven to produce mature hemp plants with a THC below 0.3% in variety test plots across a range of climatic conditions. See, for example, Colorado Department of Agriculture, “Industrial Hemp: An Emerging Agricultural Crop in Colorado,” February 2, 2016; and Oregon State University, Oregon Seed Certification Service, “Certification Standards: Industrial Hemp (Cannabis sativa L.),” December 2014. Seed certification standards and procedures are generally based on national standards adopted for industrial hemp by the Association of Official Seed Certifying Agencies (AOSCA) and follow state guidelines for all other agricultural crops.
Some states have well-developed guidelines for growers, covering issues such as registration and reporting requirements, inspection, THC testing and threshold determination, seed availability and certification, pesticide use, production standards, and other information. Other general requirements may apply under some circumstances. For example, in 2016, USDA published guidance on organic certification of industrial hemp products. Some are calling for the need to develop more far-reaching consensus standards for a range of cannabis varieties given concerns about the general lack of standards and test methods. Production of industrial hemp has been reported in several states (Table 2).

Figure 6. State Laws Related to Industrial Hemp


Notes: Darker shade indicates “allows cultivation of hemp for commercial, research or pilot programs.” Lighter-shaded states indicate “does not allow cultivation of hemp.”

Among the states that have enacted taxation and/or fees for industrial hemp are California, Colorado, Indiana, Kentucky, Maine, Montana, Nevada, North Dakota, Oregon, Tennessee, Vermont, and West Virginia.

---

66 Based on information collected in September 2015 provided by state analyst Brittany Dement.
DEA Policy Statements and Other Federal Guidance

DEA Permit Requirements

Federal law prohibits cultivation of cannabis without a permit, and DEA enforces standards governing the security conditions under which the crop must be grown. In other words, a grower needs to get permission from DEA to grow cannabis or faces the possibility of federal charges or property confiscation, regardless of whether the grower has a state-issued permit.\(^{57}\)

Prior to the 2014 farm bill, although many states had established programs under which a farmer may be able to grow industrial hemp under certain circumstances, a grower would still need to obtain a DEA permit and abide by DEA’s strict production controls. This situation resulted in some high-profile cases in which growers have applied for permits but DEA has not approved (or has denied) permits to grow hemp, even in states that authorize cultivation under state laws.

Even if DEA were to approve a permit, production might be discouraged because of the perceived difficulties of working through DEA licensing requirements and installing the types of structures necessary to obtain a permit. Obtaining a DEA permit required that the applicant demonstrate that an effective security protocol will be in place at the production site, such as security fencing around the planting area, a 24-hour monitoring system, controlled access, and possibly armed guards to prevent public access.\(^{68}\) DEA application requirements also include a nonrefundable fee, FBI background checks, and extensive documentation. It could also be argued that the necessary time-consuming steps involved in obtaining and operating under a DEA permit, the additional management and production costs from installing structures, and other business and regulatory requirements could ultimately limit the operation’s profitability.

During this time there was ongoing tension between federal and state authorities over state hemp policies. After North Dakota passed its own state law authorizing industrial hemp production in 1999,\(^{69}\) researchers repeatedly applied for, but did not receive, a DEA permit to cultivate hemp for research purposes in the state.\(^{70}\) Also in 2007, two North Dakota farmers were granted state hemp farming licenses and, in June 2007, filed a lawsuit in U.S. District Court (North Dakota) seeking “a declaratory judgment” that the CSA “does not prohibit their cultivation of industrial hemp pursuant to their state licenses.”\(^{71}\) The case was dismissed in November 2007.\(^{72}\) The case was appealed to the U.S. Court of Appeals (Eighth Circuit) but was again dismissed in December 2009.\(^{73}\) The farmers filed an appeal in May 2010.\(^{74}\)

As some states began to allow U.S. producers to grow hemp under state law, some growers were foregoing the requirement to obtain a federal permit. For example, in 2009, Montana’s

---

\(^{57}\) Registration requirements are at 21 C.F.R. 823. DEA’s registration procedures and applications are at http://www.deadiversion.usdoj.gov/drugreg/process.htm.


\(^{69}\) The North Dakota Department of Agriculture issued final regulations in 2007 on licensing hemp production.

\(^{70}\) See, for example, letter from North Dakota State University to DEA, July 27, 2007.


\(^{72}\) Monson v. DEA, 522 F. Supp. 2d 1188 (D. N.D. 2007).

\(^{73}\) Monson v. DEA, 589 F.3d 952 (8th Cir. 2009).

\(^{74}\) S. Roesler, “ND Farmers File Another Industrial Hemp Appeal in District Court,” Farm and Ranch Guide, June 4, 2010.
Agriculture Department issued its first state license for an industrial hemp-growing operation in the state, and media reports indicated that the grower did not intend to request a federal permit. Such cases posed a challenge to DEA of whether it is willing to override the state’s authority to allow for hemp production in the state.

Other Earlier DEA Policies Regarding Industrial Hemp

DEA documentation illustrates how DEA has reviewed inquiries about the legal status of hemp-based products, including inquiries from U.S. customs inspectors regarding the need for guidance regarding imported hemp products:

- DEA took the position that it would follow the plain language of the Controlled Substances Act (CSA), which expressly states that anything that contains “any quantity” of marijuana or THC is a schedule I controlled substance. However, as a reasonable accommodation, DEA exempted from control legitimate industrial products that contained THC but were not intended for human consumption (such as clothing, paper, and animal feed).
- DEA’s position that “anything that contains ‘any quantity’ of marijuana or THC” should be regarded as a controlled substance is further supported by reports published by the National Institute on Drug Abuse, which is part of the National Institutes of Health. Although it does not have a formal position about industrial hemp, its research tends to conflate all cannabis varieties, including marijuana and hemp. For example, it reports: “All forms of marijuana are mind-altering (psychoactive),” and “they all contain THC (delta-9-tetrahydrocannabinol), the main active chemical in marijuana.” DEA further maintains that the CSA does not differentiate between different varieties of cannabis based on THC content.

Regarding interest among growers in some states to cultivate hemp for industrial use, DEA claims that the courts have supported the agency’s current policy that all hemp growers—regardless of whether a state permit has been issued and of the THC content—are subject to the CSA and must obtain a federal permit:

- Under the CSA, anyone who seeks to grow marijuana for any purpose must first obtain a DEA registration authorizing such activity. However, several persons have claimed that growing marijuana to produce so-called “hemp” (which purportedly contains a relatively low percentage of THC) is not subject to CSA control and requires no DEA registration. All such claims have thus far failed, as every federal court that has addressed the issue has ruled that any person who seeks to grow any form of marijuana (no matter the THC content or the purpose for which it is grown) must obtain a DEA registration.

Regarding states that have enacted laws legalizing cannabis grown for industrial purposes, DEA had stated “these laws conflict with the CSA, which does not differentiate, for control purposes, between marijuana of relatively low THC content and marijuana of greater THC content.”


There is limited information about DEA’s permit process and on facilities that are licensed to grow hemp, even for research purposes. Previous reports indicate that DEA had issued a permit for an experimental quarter-acre plot at the Hawaii Industrial Hemp Research Program during the period from 1999 to 2003 (now expired). Most reports indicate that DEA was reluctant to grant licenses to grow hemp, even for research purposes. Some land grant university researchers have been granted licenses to conduct hemp research under certain conditions.

---

Dispute Over Hemp Imports (1999-2004)

Starting in late 1999, DEA acted administratively to demand that the U.S. Customs Service enforce a zero-tolerance standard for the THC content of all forms of imported hemp—and hemp foods in particular. Development of DEA’s rules to support its actions sparked a fierce battle over the permissibility of imported hemp-based food products that lasted from 1999 until 2004.

DEA followed up, in October 2001, with publication of an interpretive rule in the Federal Register explaining the basis of its zero-tolerance standard. It held that when Congress wrote the statutory definition of marijuana in 1937, it “exempted certain portions of the Cannabis plant from the definition of marijuana based on the assumption (now refuted) that such portions of the plant contain none of the psychoactive component now known as THC.”

In March 2003, DEA issued two final rules addressing the legal status of hemp products derived from the cannabis plant. It found that hemp products “often contain the hallucinogenic substance tetrahydrocannabinols (THC) ... the primary psychoactive chemical found in the cannabis (marijuana) plant.” Although DEA acknowledged that “in some cases, a Schedule I controlled substance may have a legitimate industrial use,” such use would be allowed only under highly controlled circumstances. These rules set forth what products may contain “hemp” and also prohibit “cannabis products containing THC that are intended or used for human consumption (foods and beverages).”

Both the proposed rule (which was published concurrently with the interpretive rule) and the final 2003 rule gave retailers of hemp foods a date after which DEA could seize all such products remaining on shelves. On both rules, hemp trade associations requested and received court-ordered stays blocking enforcement of that provision. DEA’s interpretation made hemp with any THC content subject to enforcement as a controlled substance.

Hemp industry trade groups, retailers, and a major Canadian exporter filed suit against DEA, arguing that congressional intent was to exempt plant parts containing naturally occurring THC at non-psychoactive levels, the same way it exempts poppy seeds containing trace amounts of naturally occurring opiates. Industry groups maintain that (1) naturally occurring THC in the leaves and flowers of cannabis varieties grown for fiber and food is already at below-psychoactive levels (compared with drug varieties); (2) the parts used for food purposes (seeds and oil) contain even less; and (3) after processing, the THC content is at or close to zero. U.S. and Canadian hemp seed and food manufacturers have in place a voluntary program for certifying low, industry-determined standards in hemp-containing foods. Background information on the TestPledge Program is available at http://www.TestPledge.com. The intent of the program is to assure that consumption of hemp foods will not interfere with workplace drug testing programs or produce undesirable mental or physical health effects.

On February 6, 2004, the U.S. Court of Appeals for the Ninth Circuit permanently enjoined the enforcement of the final rule. The court stated that “DEA’s definition of ‘THC’ contravenes the

---

79 66 Federal Register 51530, October 9, 2001.
80 DEA, “DEA History in Depth,” 1999-2003, and other DEA published resources.
81 21 U.S.C. §802 (19) and (20).
unambiguously expressed intent of Congress in the CSA and cannot be upheld.”

In late September 2004 the Bush Administration let the final deadline pass without filing an appeal. In late 2004, HIA petitioned the U.S. Court of Appeals for the Ninth Circuit to block DEA’s implementation of its December final rule on marijuana extracts, which would designate certain hemp-derived nonpsychotropic products, such as CBD, as a “marihuana extract” subject to the CSA. Then, in January 2017, HIA again petitioned the court alleging that DEA violated the court’s 2004 order when it indicated that a North Dakota hemp company would need a DEA registration and would be subject to other requirements before it could ship processed hemp products outside the state, even though these products were in accordance with state law and the 2014 farm bill.

In May 2018, DEA issued an internal directive to further clarify the ruling in the 2004 court case. The directive acknowledges that products and materials made from the cannabis plant that fall outside the CSA’s definition of marijuana—such as sterilized seeds incapable of germination, oil or cake made from the seeds, mature stalks, and fiber from mature stalks—are exempt from CSA and may be “sold and otherwise distributed throughout the United States without restriction under the CSA or its implementing regulations.” Exempt cannabis plant material also includes “any other compound, manufacture, salt, derivative, mixture, or preparation” of the above items, despite the presence of cannabinoids. The directive further acknowledges that such exempt products and materials may be imported into the United States without restriction (under the Controlled Substances Import and Export Act, 21 U.S.C. §§951-971) or exported from the United States (“provided further that it is lawful to import such products under the laws of the country of destination”). The directive does not address marijuana extracts and resins.

Some are interpreting the 2018 directive as providing an indication of DEA’s position regarding extracts such as CBD from exempt plant materials, including industrial hemp. They claim this could provide an indication that CBD extracted from hemp could be considered exempt from CSA regulation and DEA’s jurisdiction. They also acknowledge that some research indicates

---

83 HIA v. DEA, 357 F.2d (9th Circuit 2004).
84 Regarding DEA’s issuance of its 2003 rules and the import dispute that followed, the agency has maintained that the courts have expressed conflicting opinions on these issues:

Despite the plain language of the statute supporting DEA’s position, the ninth circuit ruled in 2004 that the DEA rules were impermissible under the statute and therefore ordered DEA to refrain from enforcing them.
Subsequently, in 2006, another federal court of appeals (the eight circuit) took a different view, stating, as DEA had said in its rules: “The plain language of the CSA states that schedule I(c) includes ‘any material ... which contains any quantity of THC’ and thus such material is regulated.”... Thus, the federal courts have expressed conflicting views regarding the legal status of cannabis derivatives.
See, for example, DEA, “DEA History in Depth,” 1999-2003, and other DEA published resources.
85 HIA; Centuria Natural Foods, Inc.; and RMH Holdings, LLC v. DEA, Petition for Review, January 13, 2017. The DEA final rule is at 81 Federal Register 90194, December 14, 2016.
87 HIA v. DEA, 357 F.2d (9th Circuit 2004).
that meaningful levels of CBD might not be readily extracted from exempt plant materials such as industrial hemp.90

2013 DEA Guidance Outlined in “Cole Memo”

In August 2013, the Department of Justice (DOJ) updated its federal marijuana enforcement policy following 2012 state ballot initiatives in Washington and Colorado that “legalized, under state law, the possession of small amounts of marijuana and provide for the regulation of marijuana production, processing, and sale.”91 The guidance—commonly referred to as the “Cole memo”—outlines DOJ’s policy, clarifying that “marijuana remains an illegal drug under the Controlled Substances Act and that federal prosecutors will continue to aggressively enforce this statute.” DOJ identified eight enforcement areas that federal prosecutors should prioritize:

1. Preventing the distribution of marijuana to minors,
2. Preventing revenue from the sale of marijuana from going to criminal enterprises, gangs, and cartels,
3. Preventing the diversion of marijuana from states where it is legal under state law in some form to other states,
4. Preventing state-authorized marijuana activity from being used as a cover or pretext for the trafficking of other illegal drugs or other illegal activity,
5. Preventing violence and the use of firearms in the cultivation and distribution of marijuana,
6. Preventing drugged driving and the exacerbation of other adverse public health consequences associated with marijuana use,
7. Preventing the growing of marijuana on public lands and the attendant public safety and environmental dangers posed by marijuana production on public lands, and
8. Preventing marijuana possession or use on federal property.

Although the Cole memo does not specifically address industrial hemp, because DOJ regards all varieties of the cannabis plant as “marijuana” and does not distinguish between low- and high-THC varieties, the August 2013 guidance appears to cover industrial hemp production as well. Accordingly, some are interpreting the guidance as allowing states to proceed to implement their laws regulating and authorizing the cultivation of hemp.92

Changes to Colorado’s state laws in November 2012 now allow for industrial hemp cultivation. Industrial hemp was reported as being grown in Colorado in 2013.93 However, growers and state authorities continue to face a number of challenges implementing Colorado’s law, including sampling, registration and inspection, seed availability and sourcing, disposition of non-complying plants, and law enforcement concerns, as well as production issues such as hemp agronomics, costly equipment, and limited manufacturing capacity, among other grower and

90 Ibid.
92 Letter to interested parties from Joe Sandler, counsel for Vote Hemp, November 13, 2013.
processor concerns. There is also general uncertainty about how federal authorities will respond to production in states where state laws allow cultivation.

In November 2012, state authorities in Colorado requested clarification from DOJ about how federal enforcement authorities might respond to its newly enacted laws and forthcoming regulations. Since federal law regards all varieties of the cannabis plant as “marijuana,” many continue to regard DOJ’s August 2013 guidance as also likely applicable to the regulation of industrial hemp. In November 2013, Colorado officials requested further clarification regarding the cultivation of industrial hemp specifically. It is not known whether either federal agency has responded to the state’s requests.

In September 2013, Representative Blumenauer sent a letter to Oregon state officials urging them to implement that state’s hemp laws. In response, DOJ officials in Oregon reiterated that since “industrial hemp” is marijuana, under the CSA, these eight enforcement priorities apply to hemp just as they do for all forms of cannabis and that “federal prosecutors will remain aggressive” when it comes to protecting these eight priorities. They further indicated that they do not intend to interfere with their state’s hemp production so long as it is well-regulated and subject to enforcement. Some regard that correspondence as further indicative of how federal authorities might respond to production in states that permit growing and cultivating hemp.

In January 2018, Attorney General Jeff Sessions sent a memorandum to all U.S. Attorneys rescinding previous nationwide guidance specific to marijuana enforcement, including the 2013 Cole Memo. Since both the Cole Memo and the 2018 Sessions memorandum are focused on marijuana enforcement, some maintain that this action does not impact ongoing industrial hemp efforts in some states.

---


95 Letter from the governor and attorney general of the state of Colorado to Eric Holder Jr., U.S. Attorney General, November 13, 2012.

96 Letter from Joe Sandler, counsel for Vote Hemp, to interested parties, November 13, 2013.

97 Letter from the commissioner of the Colorado Department of Agriculture to Tom Vilsack, Secretary of Agriculture, November 13, 2013.

98 Letter from Representative Earl Blumenauer to Oregon Department of Agriculture and State Board of Agriculture officials, September 17, 2013.


101 CRS communication with representatives of Vote Hemp, Inc., January 2014.


DEA’s Blocking of Imported Viable Hemp Seeds

In response to the enactment of the 2014 farm bill provision allowing for the cultivation of industrial hemp by research institutions and state departments of agriculture, several states made immediate plans to initiate new hemp pilot projects.

Kentucky announced plans for several pilot projects through the Kentucky Department of Agriculture. However, in May 2014, U.S. Customs officials blocked the department’s shipment of 250 pounds of imported viable hemp seed from Italy at Louisville International Airport. DEA officials contend that the action was warranted since the “importation of cannabis seeds continues to be subject to the Controlled Substances Import and Export Act (CSIEA)”104 and to the implementing regulations, which restrict persons from importing viable cannabis seed unless they are registered with DEA and have obtained the necessary Schedule I research permit, among other requirements.

Viable seeds are seeds that are alive and have the potential to germinate and develop into normal reproductively mature plants, under appropriate growing conditions. DEA has required that seeds be either heat sterilized or steam sterilized to remove any naturally occurring traces of THC, which makes the seeds mostly incapable of germination. DEA regulates the importation, sterilization, and commercial distribution of hemp seed pursuant to CSIEA.105

To facilitate release of the hemp seeds, the Kentucky Department of Agriculture filed a lawsuit in U.S. District Court against DEA, DOJ, U.S. Customs and Border Protection, and the U.S. Attorney General.106 In the lawsuit, the department contends that its efforts to grow industrial hemp are authorized under both state and federal law and that DEA should not seek to impose “additional requirements, restrictions, and prohibitions” on hemp production beyond requirements in the 2014 farm bill or otherwise interfere with its delivery of hemp seeds.

Kentucky’s seeds were eventually released and planted; however, these actions resulted in uncertainty for U.S. hemp growers. Some in the industry claim that DEA continues to initiate policy changes specifically to block hemp cultivation.107 In response, Congress enacted additional legislation to stop DEA from intervening in implementation of the 2014 farm bill provision. (For more information, see “Selected Appropriations Actions”.)

Although hemp production is now allowed in accordance with the requirements under the 2014 farm bill provision, the importation of viable seeds still requires DEA registration according to CSIEA (21 U.S.C. §§951-971). This requirement was reinforced in a 2016 joint “Statement of Principles” on industrial hemp from DEA, USDA, and FDA.108 Purchasing viable seed for germination continues to be a complicated process. It can be difficult to locate a seed source, since there are no U.S. cultivars, and any seed must be sourced internationally. Also, the grower

---

106 Kentucky Department of Agriculture v. DEA, U.S. Customs and Border Protection, U.S. Justice Department, and Eric Holder (Western District of Kentucky, Louisville Division), May 2014.
108 81 Federal Register 156: 53395-53396, August 12, 2016; also DEA/USDA/FDA joint “Statement of Principles on Industrial Hemp,” August 2016. The statement reads: “Section 7606 specifically authorized certain entities to “grow or cultivate” industrial hemp but did not eliminate the requirement under the Controlled Substances Import and Export Act that the importation of viable cannabis seeds must be carried out by persons registered with the DEA to do so.” For more information, see “2016 Joint “Statement of Principles” on Industrial Hemp”.
must submit a DEA 357 import form, and any seed source must be pre-screened by DEA and also meet USDA phytosanitary rules. Once the permit is obtained, a copy of the permit is then sent to the seed supplier and may be shipped by air freight. Other requirements include entry approval and ground transport to field sites and field site security.

2016 Joint “Statement of Principles” on Industrial Hemp

In August 2016, DEA issued three major decisions on marijuana and industrial hemp. Regarding marijuana, DEA announced it was rejecting a petition to reschedule marijuana (affirming its continued status as an illegal Schedule I controlled substance). It also announced certain policy changes regarding authorized marijuana cultivators for research. Regarding industrial hemp, DEA issued a joint statement with USDA and FDA on the principles on industrial hemp.

The three federal agencies acknowledged that the 2014 farm bill provision regarding industrial hemp “left open many questions regarding the continuing application of Federal drug control statutes to the growth, cultivation, manufacture, and distribution of industrial hemp products, as well as the extent to which growth by private parties and sale of industrial hemp products are permissible.” The 2014 farm bill also “did not remove industrial hemp from the controlled substances list.” Federal law continues to restrict hemp-related activities that were not specifically legalized under the farm bill provision, which did not amend CSA requirements regarding the manufacture and distribution of “drug products” containing controlled substances. The farm bill provision also did not amend the Federal Food, Drug, and Cosmetic Act regarding the approval process for new drug applications.

The joint statement restates the 2014 farm bill’s requirement that hemp be grown and cultivated “in accordance with an agricultural pilot program ... established by a State department of agriculture or State agency ... in a State where the production of industrial hemp is otherwise legal under State law.” It further notes that “state registration and certification of sites used for growing or cultivating industrial hemp” were not addressed in the 2014 farm bill and recommends that “such registration should include the name of the authorized manufacturer, the period of licensure or other time period during which such person is authorized by the State to manufacture industrial hemp, and the location, including Global Positioning System coordinates, where such person is authorized to manufacture industrial hemp.”

Among the noted positive aspects of the joint statement is clarification by the federal agencies about who is able to grow or cultivate industrial hemp as part of a state’s agricultural research

---

109 NC-FAR Capitol Hill seminar, April 29, 2016 (“Purdue University Industrial Hemp Initiative”).
110 81 Federal Register 156: 53395-53396, August 12, 2016; also DEA/USDA/FDA joint “Statement of Principles on Industrial Hemp,” August 2016. For more information, see CRS Legal Sidebar WSLG1667, DEA Will Not Reschedule Marijuana, But May Expand Number of Growers of Research Marijuana.
111 For more information on marijuana’s current status and on rescheduling, see CRS Report R43034, State Legalization of Recreational Marijuana: Selected Legal Issues; and CRS Legal Sidebar WSLG1423, The Legal Process to Reschedule Marijuana (available from the author).
113 81 Federal Register 53395-53396, August 12, 2016.
114 21 U.S.C. §301 et seq.
115 81 Federal Register 53395-53396, August 12, 2016.
pilot program and the applicability of USDA research and other programs to support industrial hemp. Other aspects of the joint statement, however, have raised concerns regarding how the federal agencies view the statutory definition of industrial hemp and also possible restrictions on the sale of industrial hemp products and the importation of viable seeds for growing and cultivation. Each of these is discussed in the following sections.

Many in Congress and in the industry anticipated that the joint statement would clarify DEA’s position on industrial hemp, given ongoing uncertainty about that notwithstanding support for hemp cultivation in the 2014 farm bill. The joint statement provides guidance to “individuals, institutions, and states” on a number of issues pertaining to the growing and cultivation of industrial hemp. While some in Congress and the U.S. hemp industry are encouraged by parts of the joint statement, they have also expressed concerns about other aspects of the joint statement.116 A summary of these issues is as follows.

- **Clarification regarding who can grow/cultivate hemp.** The joint statement acknowledges that the 2014 farm bill authorized “State departments of agriculture, and persons licensed, registered, or otherwise authorized by them” and “institutions of higher education or persons employed by or under a production contract or lease with them” to grow or cultivate industrial hemp as part of an agricultural pilot program in accordance with the 2014 farm bill. This seemingly clears up confusion regarding the potential participation of private farmers licensed or under contract with authorized state departments of agriculture and institutions of higher learning.

- **Clarification regarding USDA research support for hemp.** The joint statement clarifies that institutions of higher education and other authorized participants “may be able to participate in USDA research or other programs to the extent otherwise eligible for participation in those programs.” This seemingly addresses questions raised in November 2015 by some Members of Congress as part of a letter sent to USDA requesting clarification on the extent to which federal funds may be used to support research on industrial hemp.

- **Confusion regarding the definition of industrial hemp.** Some in the hemp industry worry that the joint statement reinterprets the statutory definition of industrial hemp to cover fiber and seed only, excluding flowering tops, which they believe is covered by the farm bill definition.117 The flowering heads of the plant have the greatest cannabinoid content. They also worry that the joint statement expands upon inherent restrictions to the statutory definition in that it broadly highlights the term THC, which is defined to include “all isomers, acids, salts, and salts of isomers of tetrahydrocannabinols,” whereas the statutory definition in the 2014 farm bill specifies delta-9 THC, the dominant psychoactive cannabinoid of cannabis. Some in Congress claim that the executive branch is defining industrial hemp more narrowly than that defined in statute in that it “drops the ‘delta-9’ when describing tetrahydrocannabinol” and “adds isomers, acids, and salts of isomers of THC to count against the 0.3% THC threshold.”118

---

116 Letter from several House and Senate Members of Congress to officials at DEA, USDA, and FDA, October 27, 2016; and HIA press releases, August 15 and August 17, 2016.

117 See, for example, HIA press releases, August 2016; and J. Beckerman, “The Curious Legal Status of CBD and Industrial Hemp-Derived Cannabinoids,” The Seminar Group webinar, September 13, 2016.

118 Letter from House and Senate Members of Congress to DEA, USDA, and FDA officials, October 27, 2016.
These Members of Congress have asked that the definition be removed from the guidance.

- **Confusion regarding possible restrictions on commerce.** Some in Congress note that the 2014 farm bill defined “agricultural pilot program” to mean “a pilot program to study the growth, cultivation, or marketing of industrial hemp” (italics added). These Members of Congress have asked for confirmation that “general commercial activity” does not prevent any types of sale from occurring from the framework of an approved pilot program. Likewise, the hemp industry remains concerned about the inclusion of language in the joint statement indicating that “industrial hemp products ... may not be sold in States where such sale is prohibited.” Broadly speaking “industrial hemp products” are already widely marketed, sold, and distributed. Some claim that this restriction on sales is contrary to provisions in both the CSA and the 2014 farm bill.

- **Confusion regarding the transportation and sales of hemp.** The joint statement also emphasizes that “industrial hemp plants and seeds may not be transported across State lines,” and restates DEA’s position that the importation of viable cannabis seeds be carried out by DEA-registered persons, in accordance with CSIEA, seemingly to limit the sale of hemp products only in states with industrial hemp pilot programs. This remains a contentious issue following DEA’s blocking of viable hemp seed in 2014. Some in Congress maintain that federal agencies do not have the authority to limit hemp sales or prohibit the transport of plants or seed under the 2014 farm bill.

The joint statement’s guiding principles are provided in the Appendix B.

Additional confusion remains, however, since the joint statement explicitly says it “does not establish any binding legal requirements,” further raising questions about whether guidance in the statement could influence future DEA policies and enforcement action regarding industrial hemp cultivation and marketing.

### 2018 Restrictions on SBA Loans

In April 2018, the Small Business Administration (SBA) prohibited banks from issuing SBA-backed loans to any “business that grows, produces, processes, distributes or sells products purportedly made from ‘hemp’ … unless the business can demonstrate that its business activities and products are legal under federal and state law. Examples of legal hemp products include paper, clothing and rope.” Given the continued uncertainty about the legality of the marketing of industrial hemp products, it may be difficult for SBA to determine if a business’s activities and products are legal under federal law, which could restrict hemp businesses from obtaining SBA-backed loans.

### Other Federal Agency Actions

In 1994, President Clinton issued Executive Order 12919, “National Defense Industrial Resources Preparedness,” which was intended to strengthen the U.S. industrial and technology base for

---

119 Ibid.

120 See, for example, HIA press releases, August 2016; and Beckerman, “The Curious Legal Status of CBD.”

121 Letter from House and Senate Members of Congress to DEA, USDA, and FDA officials, October 27, 2016.
meeting national defense requirements. The order included hemp among the essential agricultural products that should be stocked for defense preparedness purposes. Some hemp supporters have argued that the executive order gives hemp a renewed value as a strategic crop for national security purposes in line with its role in World War II.

USDA has supported research on alternative crops and industrial uses of common commodities since the late 1930s. Some alternative crops have become established in certain parts of the United States—kenaf (for fiber) in Texas, jojoba (for oil) in Arizona and California, and amaranth (for nutritious grain) in the Great Plains states. Many have benefits similar to those ascribed to hemp but are not complicated by having a psychotropic variety within the same species.

The Critical Agricultural Materials Act of 1984 (P.L. 98-284, 7 U.S.C. §178) supports the supplemental and alternative crops provisions of the 1985 and 1990 omnibus farm acts and other authorities and funds research and development on alternative crops at USDA and state laboratories. In addition, Section 1473D of the National Agricultural Research, Extension, and Teaching Policy Act of 1977 (7 U.S.C. §3319d(c)) authorizes USDA to make competitive grants toward the development of new commercial products derived from natural plant material for industrial, medical, and agricultural applications. To date, these authorities have not been used to develop hemp cultivation and use.

The United States is a signatory of the United Nations Single Convention on Narcotic Drugs, 1961. The principal objectives of the convention are to “limit the possession, use, trade in, distribution, import, export, manufacture and production of drugs exclusively to medical and scientific purposes and to address drug trafficking through international cooperation to deter and discourage drug traffickers.” The convention requires that each party control cannabis cultivation within its borders. However, Article 28.2 of the convention states, “This Convention shall not apply to the cultivation of the cannabis plant exclusively for industrial purposes (fibre and seed) or horticultural purposes.” Thus the convention need not present an impediment to the development of a regulated hemp farming sector in the United States.

Ongoing Congressional Activity

2018 Farm Bill Debate

Congress has continued to introduce legislation to further advance industrial hemp and address continued perceived obstacles to hemp production in the United States. Specifically, an expanded version of the Industrial Hemp Farming Act—first introduced in the 109th Congress—was introduced in the 115th Congress in both the House and Senate (H.R. 5485; S. 2667). These bills are further discussed in “Industrial Hemp Farming Act”. Many of the provisions in these bills are included in the Senate-passed 2018 farm bill (H.R. 2).

122 Hemp is included under the category of “food resources,” which is defined to mean, in part, “all starches, sugars, vegetable and animal or marine fats and oils, cotton, tobacco, wool, mohair, hemp, flax, fiber and other materials, but not any such material after it loses its identity as an agricultural commodity or product.”
124 In 2014, funding for the program totaled $1.1 million, but no funding was requested for subsequent years.
126 Information posted on International Narcotics Control Board website.
House Farm Bill (H.R. 2)

A number of amendments to the House committee bill (Agriculture and Nutrition Act of 2018, H.R. 2) were proposed and/or considered but not adopted.

During House committee markup, Representative Comer considered but did not propose an amendment to H.R. 2 that would clarify that federally recognized Indian tribes are eligible to grow hemp in accordance with the conditions specified in the 2014 farm bill; it would have also required USDA to develop guidance on standardized testing procedures for the THC concentration for industrial hemp.

Amendments regarding hemp were also submitted for consideration by the House Rules Committee but were not made in order and allowed to proceed during the House floor debate on H.R. 2. One bipartisan proposal submitted by Representatives Massie and Polis proposed to remove industrial hemp from the CSA definition of marihuana. Another proposal submitted by Representatives Comer and Blumenauer, among others, also proposed to remove industrial hemp from the CSA definition and place hemp in the jurisdiction of the USDA as an agricultural commodity. Another amendment proposed by Representative Barr would create a safe harbor for financial institutions that provide services to hemp businesses authorized under the 2014 farm bill. None of these amendments or other provisions regarding industrial hemp are included in H.R. 2.

Senate Farm Bill (H.R. 2)

The Senate-passed farm bill (Agriculture and Nutrition Act of 2018, H.R. 2) includes a number of provisions regarding industrial hemp within the bill’s Horticulture title, Research title, Crop Insurance title, and Miscellaneous title. Many of these provisions originated in the Industrial Hemp Farming Act of 2018 (S. 2667; H.R. 548).

Chief among these is a provision that would amend the CSA to exclude from the statutory definition of marijuana industrial hemp, as defined in the 2014 farm bill as containing no more than a 0.3% THC concentration. The Senate farm bill also creates a new hemp program under the Agricultural Marketing Act of 1946 (7 U.S.C. § 1621 et seq.), expanding the existing statutory definition of hemp and expanding eligibility to other producers and groups, including tribes and territories. States or Indian tribes wanting primary regulatory authority over hemp production would be required to implement a “plan” to further monitor and regulate hemp production. Other provisions in the Crop Insurance title would make hemp producers eligible to participate in federal crop insurance programs, while provisions in the Research title of the bill would make hemp production eligible for certain USDA research and development programs.

127 Some studies have raised issues related to hemp production and cultivation on tribal lands. See, for example, A Review of Hemp as a Sustainable Agricultural Commodity: Tools and Recommendations for Winona LaDuke’s Hemp Farm and Sovereign Native American Tribes, Task Force report by the University of Washington’s Henry M. Jackson School of International Studies, 2018; and J. S. Hipp and C. D. Duren, Regaining Our Future: An Assessment of Risks and Opportunities for Native Communities in the 2018 Farm Bill, University of Arkansas School of Law, June 2017.

128 Prior to the Senate farm bill (H.R. 2), media reports indicated that S. 2667 was planned to be fast-tracked in the Senate through a procedural move (Rule 14), allowing the bill to skip over the committee process and go directly to the Senate floor for consideration. J. Carney, “Senate Fast-Tracks Bill Legalizing Hemp As Agriculture Product,” The Hill, April 16, 2018.
Table 3. Provisions Addressing Industrial Hemp in House and Senate Farm Bills, Compared with Current Law
<table>
<thead>
<tr>
<th>Current Law/Policy</th>
<th>House Passed Bill (H.R. 2)</th>
<th>Senate Passed Bill (H.R. 2)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Conforming changes to the Controlled Substances Act (CSA).</strong> Schedule I of the CSA (21 U.S.C. §§801 et seq.) includes all cannabis varieties under the term <em>marihuana</em> that is defined to mean “all parts of the plant <em>Cannabis sativa</em>,” covering both marijuana and industrial hemp. (21 U.S.C. §802(16))</td>
<td>No comparable provision.</td>
<td>Amends Section 102 of the CSA (21 U.S.C. 802(16)) to exclude “industrial hemp” from the statutory definition of marijuana. Industrial hemp is defined as containing a delta-9 tetrahydrocannabinol (THC, marijuana’s primary psychoactive chemical) concentration of not more than 0.3% on a dry weight basis content. (§12608)</td>
</tr>
<tr>
<td><strong>Legitimacy of industrial hemp research.</strong> Allows an institution of higher education or state department of agriculture to grow or cultivate industrial hemp for research purposes if allowed under the laws of the state in which the institution is located. Establishes a definition for <em>industrial hemp</em> to mean the plant <em>Cannabis sativa</em> with a delta-9 tetrahydrocannabinol (THC) concentration of not more than 0.3% on a dry weight basis. (7 U.S.C. §5940)</td>
<td>No comparable provision.</td>
<td>Creates a new “Hemp Production” subtitle under the Agricultural Marketing Act of 1946 (7 U.S.C. §1621 et seq.). The new program expands upon the existing statutory definition to include any part of the cannabis plant, including “the seeds thereof and all derivatives, extracts, cannabinoids, isomers, acids, salts, and salts of isomers, whether growing, or not cannabinoids, isomers, acids, salts, and salts of isomers, whether growing or not, with a delta-9 tetrahydrocannabinol concentration of not more than 0.3 percent on a dry weight basis.” It clarifies that allowable cultivation includes—in addition to states—tribal governments, the District of Columbia, the Commonwealth of Puerto Rico, and any U.S. territory or possession. Eligibility of “state department of agriculture” would be amended to mean the “agency, commission, or department of a state government responsible for agriculture in the state.” State or Indian tribes wanting primary regulatory authority over hemp production would be required to implement a “plan” under which the state or Indian tribe monitor and regulate hemp production. State and tribal plans would require grower information collection and procedures for testing, disposal (of hemp grown in violation and the law), and compliance. Authorize appropriations (“such sums as are necessary”) for USDA to support and enforce state and tribal plans and further specifies requirements regarding the plan approval process, USDA technical assistance to develop plans, and necessary corrective action for plan violations. (§10111, §10112) Requires USDA to conduct a study of an agricultural pilot program assessing the economic viability of the domestic production and sale of industrial hemp and review the hemp pilot program and any other agricultural or academic research relating to industrial hemp. (§7415)</td>
</tr>
<tr>
<td><strong>Supplemental and alternative crops.</strong> Section 1473D of the National Agricultural Research, Extension, and Teaching Policy Act of 1977 authorized appropriations through FY2018 to “develop and implement a research project program for the development of supplemental and alternative crops.” Authorizes $1 million in appropriations for each of FY2014-FY2018. (7 U.S.C. 3319d)</td>
<td>Extends program and funding levels through FY2023. Amends the program to include canola and alternative crops “for agronomic rotational purposes and for use as a habitat for honey bees and other pollinators,” among other changes. (§7123)</td>
<td>Extends program and funding levels through FY2023. Amends the program to include canola and alternative crops “for agronomic rotational purposes and for use as a habitat for honey bees and other pollinators,” among other changes. Expands eligibility to for industrial hemp. (§7125)</td>
</tr>
<tr>
<td>---</td>
<td>---</td>
<td>---</td>
</tr>
<tr>
<td><strong>Critical Agricultural Materials Act.</strong> Section 5(b)(9) of the act provides for basic and applied research, technology development, and technology transfer. (7 U.S.C. 178c(b)(9))</td>
<td>No comparable provision.</td>
<td>Expands scope of the program to study the economic feasibility of developing native agricultural crops to include industrial hemp. (§7401)</td>
</tr>
<tr>
<td><strong>Federal crop insurance program.</strong> The federal crop insurance program makes available subsidized crop insurance to producers who purchase a policy to protect against individual farm losses in yield, crop revenue, or whole farm revenue. In general, policies offer a guarantee at the individual farm level or area-wide (e.g., county) level. The producer selects coverage level and absorbs the initial loss through the deductible. The insurance guarantee is based on the expected market price (i.e., no statutory minimum prices as in some farm programs).</td>
<td>No comparable provisions.</td>
<td>Amends the Federal Crop Insurance Act (7 U.S.C. 1501 et seq.) to (1) expand eligibility to hemp producers, (2) define hemp in accordance with Section 10111 (“Hemp Production”) of the bill, (2) include an insurance period for hemp from which to cover loss in value due to a change in market price, and (3) allows the Federal Crop Insurance Corporation to waive certain viability and marketability requirements related to new policy submissions. (§§11101, 11106, 11112, 11120, 11101, 11121)</td>
</tr>
</tbody>
</table>

**Source:** CRS from H.R. 2.
Industrial Hemp Farming Act

The Industrial Hemp Farming Act of 2018 (Comer/H.R. 5485; McConnell/S. 2667) is intended to facilitate the possible commercial cultivation of industrial hemp in the United States. The bills would amend Section 102 of the CSA (21 U.S.C. 802(16)) to exclude “industrial hemp” from the statutory definition of *marijuana*. Industrial hemp would be defined based on its THC content and not a threshold of 0.3% THC. Such a change could remove low-THC hemp from being covered by the CSA as a controlled substance subject to DEA regulation, thus allowing for industrial hemp to be grown and processed under some state laws. The bill could grant authority to any state permitting industrial hemp production and processing to determine whether any such cannabis plants met the limit on THC concentration as set forth in the CSA. In any criminal or civil action or administrative proceeding, the state’s determination may be conclusive and binding.

H.R. 5485 and S. 2667 would repeal the hemp pilot program established in the 2014 farm bill and replace it with a new program as part of a new “Hemp Production” subtitle under the Agricultural Marketing Act of 1946 (7 U.S.C. § 1621 et seq.). The new program expands upon the existing statutory definition to include any part of the *Cannabis* plant, including “the seeds thereof and all derivatives, extracts, cannabinoids, isomers, acids, salts, and salts of isomers, whether growing, or not.”

It would clarify that allowable cultivation includes, in addition to states, tribal governments, the District of Columbia, the Commonwealth of Puerto Rico, and any U.S. territory or possession. Eligibility of “state department of agriculture” would be amended to mean the “agency, commission, or department of a state government responsible for agriculture in the state.” State or Indian tribes wanting primary regulatory authority over hemp production would be required to implement a “plan” under which the state or Indian tribe monitor and regulate hemp production. State and tribal plans would require grower information collection and procedures for testing, disposal (of hemp grown in violation and the law), and compliance. H.R. 5485 and S. 2667 authorize appropriations (“such sums as are necessary”) for USDA to support and enforce state and tribal plans and further specifies requirements regarding the plan approval process, USDA technical assistance to develop plans, and necessary corrective action for plan violations.

H.R. 5485 and S. 2667 further address industrial hemp as part of the federal crop insurance program and include hemp as eligible for research funding under the Supplemental and Alternative Crops Act and the Critical Agricultural Materials Act, which are authorized to receive $1 million in annual appropriations through FY2018. Finally, the bills require that USDA conduct a study of USDA agricultural pilot programs, including the hemp pilot program, which would be repealed one year after enactment. USDA would also be required to conduct a study of USDA agricultural pilot programs, including the hemp pilot program in the 2014 farm bill.

Earlier in the 115th Congress, Representative Comer introduced a different version of the bill as part of the Industrial Hemp Farming Act of 2017 (H.R.3530). In addition to exempting industrial hemp from definitions of *marijuana* in CSA, this version of the bill proposed to further expand the statutory definition of *hemp* to include viable seeds and to clarify that allowable cultivation

---

129 Amends the Agricultural Marketing Act of 1946 (7 U.S.C. §1621 et seq.) by adding “Subtitle G—Hemp Production” with a new statutory definition at section 297A and other program requirements.

130 As defined in Section 4 of the Indian Self-Determination and Education Assistance Act, 25 U.S.C. §5304.

131 Additional recommendations to H.R. 3530 are noted in a March 2018 statement by the U.S. Hemp Roundtable.


133 7 U.S.C. §178c(b)(9).
includes Native American tribes in addition to states. It also includes a new definition for research hemp to include any part or derivative of the Cannabis plant (including viable seeds) that has a delta-9 THC concentration of more than 0.3% on a dry weight basis but less than 0.6% on a dry weight basis and that is used in scientific, medical, or industrial research conducted by an institution of higher education or a state department of agriculture. H.R. 3530 would also require that states and tribes, upon the request of the U.S. Attorney General, submit information regarding hemp production, storage, distribution, or use.

Each of these versions of the Industrial Hemp Farming Act greatly expand upon previous versions of the bill. The Industrial Hemp Farming Act was first introduced in the 109th Congress by former Representative Ron Paul and was reintroduced in subsequent legislative sessions (H.R. 1831, 112th Congress; H.R. 1866, 111th Congress; H.R. 1009, 110th Congress; H.R. 3037, 109th Congress). In the 112th Congress, Senator Ron Wyden introduced S. 3501 in the Senate. Versions of these same bills were also introduced in the 113th and 114th Congresses by Representative Massie and Senator Wyden. Some in Congress believe that industrial hemp production could result in economic and employment gains in some states and regions.

Legislation Regarding Possible Medical Applications of Hemp

Legislation introduced in both the House and Senate has addressed the potential therapeutic uses of industrial hemp to allow for its production and use as CBD. CBD is a non-psychoactive compound in Cannabis that is low in delta-9 THC. CBD is sold as an extract and marketed as helping to address various ailments, including neuropathic pain, epilepsy, post-traumatic stress disorder, nausea as a result of chemotherapy, and other disorders. Most CBD extracts currently being marketed for certain therapeutic purposes are generally formulated from strains of medical cannabis with THC levels higher than 0.3% but generally less than 1% THC. Some hemp-based CBD products—mostly dietary supplements—have been marketed as being rich in CBD and as having comparable therapeutic uses to CBD extracts. Fraudulent marketing claims by

---

134 As defined at 18 U.S.C. §1151 (“Indian country”).
135 Required information would include the name of the person engaged in such authorized activity, the period of time authorized, and the specific location of authorized activity.
136 Previous versions of the bill have differed. Section 3 of the 2009 bill would apply when a state has an industrial hemp regulatory scheme, whereas the 2011 bills would apply whenever state law permits “making industrial hemp,” which a state might do by exempting hemp making from its controlled substance regulatory scheme. Section 3 of the 2009 bill would have afforded state officials “exclusive authority” to construe the proposed hemp exclusion from the definition of marijuana (amending 21 U.S.C. §802(16)(B)), whereas the 2011 bills would include within the proposed industrial hemp exclusion (amending 21 U.S.C. §802(57)) any industrial hemp grown or possessed in accordance with state law relating to making industrial hemp.
137 113th Congress (H.R. 525, S. 359); 114th Congress (H.R. 525, S. 134). In the 114th Congress, the House and Senate bills differ in that S. 134 includes a provision that would allow states to override this determination if the U.S. Attorney General determines that the state law does not “reasonably” comply with the requirements of the proposed CSA amendments. H.R. 525 does not include this language.
139 For more information, see CRS Report R44742, Defining “Industrial Hemp”: A Fact Sheet.
140 CRS communication with Project CBD representatives, September 22, 2014.
some hemp-based CBD products have resulted in the FDA issuing a series of warning letters to several companies since 2015.141

In the 115th Congress, the Therapeutic Hemp Medical Access Act of 2017 (S. 1008) and the Charlotte’s Web Medical Access Act of 2017 (H.R. 2273)142 would amend CSA by excluding cannabidiol and cannabidiol-rich plants, defined as having a delta-9 THC concentration of no more than 0.3% on a dry weight basis. Similar versions of these bills were introduced in the 114th Congress and 113th Congress.143 The House and Senate bills are related but are not identical. In addition to removing cannabidiol and cannabidiol-rich plants, as defined, from regulation under CSA, the House bill would further exclude these from being applicable to requirements under the Federal Food, Drug, and Cosmetic Act, which broadly regulates the quality and safety of foods and dietary supplements. This provision is not part of the Senate bill.

There is also growing concern that hemp-based CBD products, derived from industrial hemp, are being marketed as being rich in CBD and as having comparable therapeutic uses to CBD extracts. Medicine-grade CBD is not produced or pressed from hemp seeds. Hemp seed oil, marketed as “hemp oil,” is made by pressing hemp seeds that contain low levels of CBD (typically less than 25 parts per million). Most of the CBD extracts currently being marketed for certain therapeutic purposes are generally formulated from strains of cannabis with THC levels higher than 0.3% but generally less than 1% THC.144 Some claim that scientific research shows that meaningful levels of CBD cannot be extracted from hemp.145 Also, FDA has continued to issue a number of notices and warning letters regarding its concerns about CBD, which is being marketed across a range of therapeutic/medicinal products.146 For more information, see CRS In Focus IF10391, Potential Use of Industrial Hemp in Cannabidiol Products.

To date, FDA has not approved any drug product containing CBD for any indication and has issued warning letters to several companies that market CBD products to treat health conditions for both humans and pets. According to FDA, these products are not “generally recognized as safe and effective,” and the companies marketing these products are engaging in illegal interstate commerce.147 FDA has further determined that products containing CBD cannot be sold as dietary supplements and are excluded from the dietary supplement definition in the Federal Food, Drug, and Cosmetic Act.148 As such, FDA may consult with its federal and state partners about whether to initiate a federal enforcement action against the manufacturers of CBD products that are marketed as dietary supplements. In June 2015, the Senate Caucus on International Narcotics Control held a hearing on the barriers to research and the potential medical benefits of CBD. (Additional information is provided in the text box below.)

---

142 Named after Charlotte Figi, who suffers from a rare pediatric seizure disorder and has reportedly experienced relief from seizures with this strain of medical marijuana that is high in CBD and low in THC.
143 S. 1333 and H.R. 5226 (114th Congress), and H.R. 2273 (113th Congress).
144 CRS communication with Project CBD representatives, September 22, 2014.
Many agriculture-based groups continue to advocate for the need for additional research into the possible benefits and uses of industrial hemp-derived CBD. Some states continue to conduct research on the potential uses for industrial hemp-derived CBD.

In February 2017, the National Academies of Sciences, Engineering, Medicine (NASEM) published a comprehensive review of existing cannabis research. The study provides a broad set of evidence-based research conclusions on the health effects of cannabis and cannabinoids and provides recommendations to support advancing future research and inform public health decisions. It claims that there is conclusive or substantial evidence that oral cannabinoids are effective antiemetics in the treatment of chemotherapy-induced nausea and vomiting and for improving patient-reported multiple sclerosis spasticity symptoms. Others have also documented possible medical uses of cannabis. The study, however, does not distinguish between cannabinoids from low and high THC strains or between hemp-derived cannabinoids and cannabinoids from other cannabis strains.

### Senate Caucus on International Narcotics Control (June 2015 Hearing)

In June 2015, the Senate Caucus on International Narcotics Control, led by Senators Chuck Grassley and Dianne Feinstein, held a hearing on the barriers to research and the potential medical benefits of CBD. The caucus leaders claimed that many leading medical organizations have called for further research into the potential medical use of CBD. The hearing addressed the complexities involved with conducting CBD research as well as its potential medical benefits and risks in treating serious illnesses. The hearing provided a follow-up to letters sent by the caucus leaders to DOJ and to the Department of Health and Human Services (HHS) to ask these agencies to evaluate CBD using the appropriate scientific and medical factors to make a scheduling determination for it that is separate from the whole marijuana plant. The caucus anticipates that “if it turns out that CBD may be classified on a lower schedule than the entire marijuana plant, and then research on it may proceed somewhat more easily.” The caucus reported that DOJ and HHS have agreed to undertake this evaluation, representing that “for the first time, the federal government will conduct a comprehensive analysis to determine whether cannabidiol has scientific and medical value.”


### Other Introduced Legislation

A number of other bills regarding industrial hemp have been introduced in the 115th Congress. The Industrial Hemp Banking Act (H.R. 4711) would identify hemp production as a legitimate business. It would similarly exempt hemp production from CSA’s definition of *marijuana* and

---

149 See, for example, Kentucky Hemp Industries Council, “Industrial Hemp-Derived Cannabidiol (Hemp CBD).”

150 See, for example, PHYS.org, “Research on Industrial Hemp Continues to Progress,” August 2015. See also “The Kentucky Department of Agriculture Industrial Hemp Pilot Projects—2014 Summary” (includes KDA CBD Project: “This project is focusing on the production of a very specific type of hemp to develop a nutritional supplement containing cannabidiol (CBD) and evaluate its health benefits”).


153 See, for example, comments submitted by the American Botanical Council to FDA on Rescheduling of Cannabis, Docket No. FDA-2018-N-1072, April 23, 2018.
would also prohibit regulators from denying banking services to hemp producers. In addition, the Industrial Hemp Water Rights Act (H.R. 4164, S. 1576) would prohibit regulators from denying hemp growers access to water—regardless of whether the water is part of a federal water project—if the hemp cultivation is authorized under the laws of the state where it is grown.

**Congressional Action on USDA Hemp Research Support**

In November 2015, several Members of Congress sent a letter to USDA requesting clarification of the agency’s research funds for industrial hemp. This action was in response to questions by a number of state and private research institutions on the extent to which industrial hemp initiatives were eligible for U.S. federal grant awards (both USDA and non-USDA program funds). These questions arose, in part, given mixed messages received by some land grant universities about whether they would qualify for USDA competitive grants to do industrial hemp research and initial indications that they would be denied such support. Some groups feared they could jeopardize eligibility for other grants if they pursued research into industrial hemp.

In late 2015, CRS staff attempted to get further clarification on USDA’s policy regarding industrial hemp and federal grants and loans to support research of industrial hemp with limited success. Information provided from USDA was not always consistent and often conflicting. According to USDA’s National Institute of Food and Agriculture (NIFA), the agency had not awarded any competitive research grants for industrial hemp (as of September 2015). However, subsequent searches of USDA’s Current Research Information System (CRIS) database indicate that NIFA formula-funded grants were used at Colorado State University for 2015 under available Hatch Act funding to study hemp cultivation as part of bigger grants about profitability of alternative agriculture in southern Colorado. Other available information, including correspondence between USDA and various congressional staff, suggests that USDA has no record of any application for industrial hemp research being denied. No additional information is available on whether any such applications had been proposed or would or could be approved.

A USDA memo dating back to December 2014 states that “NIFA supports” grants for industrial hemp research so long as that research meets existing state requirements consistent with the requirements in the 2014 farm bill (P.L. 113-79, §7606; 7 U.S.C. 5940). However, USDA staff indicated that the December 2014 memo pertains only to what the statutory provision authorizes.

---

154 See also H.R. 1823 and S. 776, Marijuana Revenue and Regulation Act.

155 This section was written with contributions from (name redacted), who has issues regarding USDA’s research programs.

156 Letter to USDA Secretary Tom Vilsack signed by 37 Representatives and 12 Senators, November 20, 2015.

157 CRS communications during 2015 with USDA, including the department’s Office of Congressional Relations and program offices with USDA’s National Institute of Food and Agriculture (NIFA) and Rural Development agencies.

158 CRS communications with USDA, September 2015. NIFA provides funding for programs and grants to researchers and land grant universities that advance agriculture-related sciences. For more information on USDA research programs, see CRS Report R40819, Agricultural Research: Background and Issues.

159 USDA’s searchable CRIS database is at http://cris.nifa.usda.gov/search.html.

160 Includes (1) “Research and Education to Enhance the Sustainability of Farming in Southwestern Colorado” (COL00615A) and (2) “Field Crop Testing and Management in Southwestern Colorado” (COL00615). The Hatch Act of 1887 provides for multistate research funding to conduct agricultural research programs at State Agricultural Experiment Stations across all 50 states, the District of Columbia, and the territories.

161 Letter from NIFA director Ramaswamy to Eric Young, executive director of the Southern Association of Agriculture Experiment Station Directors, December 23, 2014.
and does not say anything explicitly about federal funding of industrial hemp research.  
Although this response did not address the underlying issue regarding federal funding, it likely indicates that researchers working on industrial hemp may carry on with this work at least on their own (according to requirements specified in the 2014 farm bill) without threatening their status and working relationship with USDA.

Other communication with USDA’s Rural Development Agency indicated that the agency’s Rural Business-Cooperative Service has initiated conversation with USDA’s Office of the General Counsel to review whether its programs could potentially support the industrial hemp industry.  
There does not appear to be any legal reason why USDA would not be able to provide grant funding for research activities on industrial hemp within the language of the 2014 farm bill provision, and the question remains about whether USDA will fund such applications in the future. Specifically, clarification is needed regarding whether industrial hemp research projects are eligible for USDA competitive grants (e.g., under USDA’s Agriculture and Food Research Initiative program) and/or for Hatch Act formula funds, as well as clarification about whether hemp producers are eligible for other types of agricultural support from other USDA agencies (such as loans and grants administered by USDA’s Rural Development Agency).

Some have suggested that perhaps industrial hemp might qualify under certain other USDA grant programs, such as NIFA’s Specialty Crop Research Initiative or USDA’s Specialty Crop Block Grant Program. However, industrial hemp is not included among the crops that are considered “specialty crops” and technically would not qualify for any grant specifically designated for specialty crop producers.  
Other potential programs include the Organic Transitions Integrated Research Program and the Value-Added Producer Grant Program.

Some constituent groups have also expressed an interest in applying for other non-USDA grants, such as the Small Business Innovation Research program intended to help certain small businesses conduct research and development and is coordinated by the Small Business Administration. CRS has not contacted other federal agencies aside from USDA.

Some of the questions raised by Congress’s November 2015 letter were addressed in the 2016 joint statement, but some questions remain, which were again posed in a follow-up letter by several Members of Congress.  
(For additional discussion, see “2016 Joint “Statement of Principles” on Industrial Hemp”.)

Groups Supporting/Opposing Further Legislation

In addition to industry groups as well as various state commissions and organizations that are actively promoting reintroducing hemp as a commodity crop in the United States, some key agricultural groups also support U.S. policy changes regarding industrial hemp. For example

---

162 CRS communications with USDA, October 2015.
163 CRS communications with USDA, August 2015. USDA’s Rural Development Agency administers both business loans and grants.
164 “Specialty crops” are defined in statute as “fruits and vegetables, tree nuts, dried fruits, and horticulture and nursery crops (including floriculture)” (7 U.S.C. §1621 note). Industrial hemp is considered among the “List of Ineligible Commodities” (http://www.ams.usda.gov/services/grants/scbpg/specialty-crop).
165 For more information on these USDA programs, see CRS Report R42771, Fruits, Vegetables, and Other Specialty Crops: Selected Farm Bill and Federal Programs.
166 Letter from House and Senate Members of Congress to officials at DEA, USDA, and FDA, October 27, 2016.
In 2018, the National Association of State Departments of Agriculture (NASDA) sent a letter to Senate Majority Leader Mitch McConnell and Representative James Comer in support of the Hemp Farming Act of 2018 (S. 2667/H.R. 5485). NASDA claims that the bill addresses “numerous issues hindering the success of industrial hemp pilot programs allowed under the 2014 farm bill.”

In 2017, the Wisconsin Farm Bureau Federation (WFBF) sent a letter to USDA Secretary Sonny Perdue recommending that the Trump Administration consider hemp to be an agricultural crop. A reported 27 other Farm Bureau presidents supported the initiative.

The bipartisan Congressional Cannabis Caucus—launched in February 2017 by Representatives Dana Rohrabacher, Don Young, Earl Blumenauer, and Jared Polis—is focused on policy reforms regarding federal drugs laws and issues regarding legalization in some states.

The National Farmers Union (NFU) updated its 2013 farm policy regarding hemp to urge the President, Attorney General, and Congress to direct DEA to “reclassify industrial hemp as a non-controlled substance and adopt policy to allow American farmers to grow industrial hemp under state law without affecting eligibility for USDA benefits.” Previously NFU’s policy advocated that DEA “differentiate between industrial hemp and marijuana and adopt policy to allow American farmers to grow industrial hemp under state law without requiring DEA licenses.”

In 2010, NASDA stated it “supports revisions to the federal rules and regulations authorizing commercial production of industrial hemp” and has urged USDA, DEA, and the Office of National Drug Control Policy to “collaboratively develop and adopt an official definition of industrial hemp that comports with definitions currently used by countries producing hemp.” NASDA also “urges Congress to statutorily distinguish between industrial hemp and marijuana and to direct DEA to revise its policies to allow USDA to establish a regulatory program that allows the development of domestic industrial hemp production by American farmers and manufacturers.” NASDA first adopted a policy on industrial hemp in 2002.

In 2014, the American Farm Bureau Federation, from efforts led by the Indiana Farm Bureau, endorsed a policy to support the “production, processing, commercialization, and utilization of industrial hemp” and reportedly also passed a policy resolution to oppose the “classification of industrial hemp as a controlled substance.” Previously, in 1995, the Farm Bureau had passed a resolution supporting “research into the viability and economic potential of industrial hemp production in the United States ... [and] further recommend that

---

such research includes planting test plots in the United States using modern agricultural techniques.”

- Regional farmers’ organizations also have policies regarding hemp. For example, the North Dakota Farmers Union, as part of its federal agricultural policy recommendations, has urged “Congress to legalize the production of industrial hemp.” The Rocky Mountain Farmers Union has urged “Congress and the USDA to re-commit and fully fund research into alternative crops and uses for crops” including industrial hemp. Also, they “support the decoupling of industrial hemp from the definition of marijuana” under the CSA and “demand the President and the Attorney General direct the U.S. Drug Enforcement Agency (DEA) to differentiate between industrial hemp and marijuana and adopt a policy to allow American farmers to grow industrial hemp under state law without requiring DEA licenses” to “legalize the production of industrial hemp as an alternative crop for agricultural producers.”

- The National Grange voted in 2009 to support “research, production, processing and marketing of industrial hemp as a viable agricultural activity.”

- In California, ongoing efforts to revise the definition of marijuana to exclude “industrial hemp” (SB 566) are supported by the state’s sheriffs’ association. The county farm bureau and two sheriffs’ offices supported previous efforts in 2011 to establish a pilot program to grow industrial hemp in selected counties (although the state’s governor later vetoed the bill, SB 676).

- North American Industrial Hemp Council—a coalition of farmers, state legislators, former officials, scientists, merchants, entrepreneurs, and environmentalists—filed a petition in June 2016 asking DEA to “remove industrial hemp from the federal drug schedules.”

Despite support by some, other groups continue to oppose policy changes regarding cannabis. For example, the National Alliance for Health and Safety, as part of Drug Watch International, claims that proposals to reintroduce hemp as an agricultural crop are merely a strategy by “the international pro-drug lobby to legalize cannabis and other illicit substances.” The California Narcotic Officers’ Association claims that allowing for industrial hemp production would undermine state and federal enforcement efforts to regulate marijuana production, since, they claim, the two crops are not distinguishable through ground or aerial surveillance but would require costly and time-consuming lab work to be conducted. This group also claims that these

---

173 See, for example, J. Patton, “American Farm Bureau Calls for End to Federal Ban on Hemp Production,” *Lexington Herald-Leader*, January 22, 2014; and *Lane Report*, “Farm Bureau Passes Policy Urging Removal of Industrial Hemp Classification as Controlled Substance,” January 22, 2014.


176 National Grange, “Legislative Policies” and “Hemp Policy.”

177 Letter from the California State Sheriffs’ Association to Chairwoman Cathleen Galgiani of the State Senate Agriculture Committee, March 21, 2013.

178 Letters of support for SB 678 to California State Senator Mark Leno from the Imperial County Farm Bureau (June 16, 2011), Office of Sheriff, Kings County (July 19, 2011), and Office of Sheriff, Kern County (July 21, 2011).


181 Letter from the California Narcotic Officers’ Association to Governor Arnold Schwarzenegger, September 18, 2007.
similarities would create an incentive to use hemp crops to mask illicit marijuana production, since marijuana is such a lucrative cash crop. Concerns about the potential linkages to the growing and use of illegal drugs are also expressed by some parent and community organizations, such as the Drug Free America Foundation and PRIDE. Given DEA’s current policy positions and perceived DEA opposition to changing its current policies because of concerns over how to allow for hemp production without undermining the agency’s drug enforcement efforts and regulation of the production and distribution of marijuana, hemp proponents say that further policy changes regarding industrial hemp are likely not forthcoming absent congressional legislative action.

Concluding Remarks

Hemp production in the United States faces a number of obstacles in the foreseeable future, such as U.S. government drug policies and DEA concerns about the ramifications of U.S. commercial hemp production. These concerns are that commercial cultivation could increase the likelihood of covert production of high-THC marijuana, significantly complicating DEA’s surveillance and enforcement activities and sending the wrong message to the American public concerning the government’s position on drugs. DEA officials and a variety of other observers also express the concern that efforts to legalize hemp—as well as those to legalize medical marijuana—are a front for individuals and organizations whose real aim is to see marijuana decriminalized.

Hemp production in the United States also faces competition from other global suppliers. The world market for hemp products remains relatively small, and China, as the world’s largest hemp fiber and seed producer, has had and likely will continue to have major influence on market prices and thus on the year-to-year profits of producers and processors in other countries. Canada’s lead start in the North American market for hemp seed and oil would also likely affect the profitability of a start-up industry in the United States.

Nevertheless, the U.S. market for hemp-based products has a highly dedicated and growing demand base, as indicated by recent U.S. market and import data for hemp products and ingredients, as well as market trends for some natural foods and body care products. Given the existence of these small-scale, but profitable, niche markets for a wide array of industrial and consumer products, commercial hemp industry in the United States could provide opportunities as an economically viable alternative crop for some U.S. growers.

---

182 CRS conversation with John Coleman, former DEA official, August 22, 2011.
183 Information and comments provided to CRS by Jeanette McDougal, National Alliance for Health and Safety, August 22, 2011, and March 26, 2017.
Appendix A. Listing of Selected Hemp Studies

- L. Lane et al., *Industrial Hemp: Legal, Political/Social and Economic Issues Raised Over Time*, University of Arkansas, 2016.
- E. C. Thompson et al., *Economic Impact of Industrial Hemp in Kentucky*, University of Kentucky, July 1998.
Appendix B. Joint DEA/USDA/FDA “Statement of Principles on Industrial Hemp”

As noted in the joint DEA/USDA/FDA “Statement of Principles on Industrial Hemp,” published August 12, 2016, which is excerpted below:

USDA, having consulted with and received concurrence from the U.S. Drug Enforcement Administration (DEA) and the U.S. Food and Drug Administration (FDA), therefore, is issuing this statement of principles to inform the public regarding how Federal law applies to activities involving industrial hemp so that individuals, institutions, and States that wish to participate in industrial hemp agricultural pilot programs can do so in accordance with Federal law.

The growth and cultivation of industrial hemp may only take place in accordance with an agricultural pilot program to study the growth, cultivation, or marketing of industrial hemp established by a State department of agriculture or State agency responsible for agriculture in a State where the production of industrial hemp is otherwise legal under State law.

The State agricultural pilot program must provide for State registration and certification of sites used for growing or cultivating industrial hemp. Although registration and certification is not further defined, it is recommended that such registration should include the name of the authorized manufacturer, the period of licensure or other time period during which such person is authorized by the State to manufacture industrial hemp, and the location, including Global Positioning System coordinates, where such person is authorized to manufacture industrial hemp.

Only State departments of agriculture, and persons licensed, registered, or otherwise authorized by them to conduct research under an agricultural pilot program in accordance with section 7606, and institutions of higher education (as defined in section 101 of the Higher Education Act of 1965 (20 U.S.C. 1001)), or persons employed by or under a production contract or lease with them to conduct such research, may grow or cultivate industrial hemp as part of the agricultural pilot program.

The term “industrial hemp” includes the plant Cannabis sativa L. and any part or derivative of such plant, including seeds of such plant, whether growing or not, that is used exclusively for industrial purposes (fiber and seed) with a tetrahydrocannabinols concentration of not more than 0.3 percent on a dry weight basis. The term “tetrahydrocannabinols” includes all isomers, acids, salts, and salts of isomers of tetrahydrocannabinols.

For purposes of marketing research by institutions of higher education or State departments of agriculture (including distribution of marketing materials), but not for the purpose of general commercial activity, industrial hemp products may be sold in a State with an agricultural pilot program or among States with agricultural pilot programs but may not be sold in States where such sale is prohibited. Industrial hemp plants and seeds may not be transported across State lines.

Section 7606 specifically authorized certain entities to “grow or cultivate” industrial hemp but did not eliminate the requirement under the Controlled Substances Import and Export Act that the importation of viable cannabis seeds must be carried out by persons registered with the DEA to do so. In addition, any USDA phytosanitary requirements that normally would apply to the importation of plant material will apply to the importation of industrial hemp seed.

Section 7606 did not amend the Federal Food, Drug, and Cosmetic Act. For example, section 7606 did not alter the approval process for new drug applications, the requirements
for the conduct of clinical or nonclinical research, the oversight of marketing claims, or any other authorities of the FDA as they are set forth in that Act.

The Federal Government does not construe section 7606 to alter the requirements of the Controlled Substances Act (CSA) that apply to the manufacture, distribution, and dispensing of drug products containing controlled substances. Manufacturers, distributors, dispensers of drug products derived from cannabis plants, as well as those conducting research with such drug products, must continue to adhere to the CSA requirements.

Institutions of higher education and other participants authorized to carry out agricultural pilot programs under section 7606 may be able to participate in USDA research or other programs to the extent otherwise eligible for participation in those programs.

Author Contact Information

(name redacted)
Specialist in Agricultural Policy
[redacted]@crs.loc.gov, 7-....
The Congressional Research Service (CRS) is a federal legislative branch agency, housed inside the Library of Congress, charged with providing the United States Congress non-partisan advice on issues that may come before Congress.

EveryCRSReport.com republishes CRS reports that are available to all Congressional staff. The reports are not classified, and Members of Congress routinely make individual reports available to the public.

Prior to our republication, we redacted names, phone numbers and email addresses of analysts who produced the reports. We also added this page to the report. We have not intentionally made any other changes to any report published on EveryCRSReport.com.

CRS reports, as a work of the United States government, are not subject to copyright protection in the United States. Any CRS report may be reproduced and distributed in its entirety without permission from CRS. However, as a CRS report may include copyrighted images or material from a third party, you may need to obtain permission of the copyright holder if you wish to copy or otherwise use copyrighted material.

Information in a CRS report should not be relied upon for purposes other than public understanding of information that has been provided by CRS to members of Congress in connection with CRS’ institutional role.

EveryCRSReport.com is not a government website and is not affiliated with CRS. We do not claim copyright on any CRS report we have republished.