

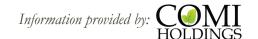
Growing Healthy Alternatives

Our mission is to provide as much information and resources based on actual cultivation experience.

We aim to ensure only healthy and safe practices and products are used while ensuring hemp becomes a fair and marketable commodity for alternative means to both the medical and industrial services industry.

We want to ensure everyone has a chance to become a leader in hemp cultivation, with the highest concentrations of CBD's, seeds and biomass in the country.





INDUSTRY OUTLOOK IN NORTH AMERICA

800-2,000 lbs.

Estimated average yields per acre for raw industrial hemp biomass.

\$3-\$25 p/lbs.

Estimated average revenue per pound for raw industrial hemp biomass.

\$2,000-\$4,000

Average input per acre based on historical cultivation and harvesting of raw industrial hemp biomass

\$2,000-\$50,000

Estimated average return per acre for raw industrial hemp material.

8%-500%

Estimated growth in Industrial Hemp upon passing of Hemp Farming Act 2018.

SUCCESS

Information provided by:



OPTIMIZING YOUR YIELDS

MINERALS Calcium Iron Sodium Zinc

Industrial Hemp Recommended Avg. PPM

(Ensure soil samples are taken periodically)

Seedling	Clones	Vegetative	Flowering
200-300 PPM	500-600 PPM	800-900 PPM	1000-1100 PPM

Hemp Plants

- Prefer semi-humid conditions with temperatures between 60° - 80° F
- Prefer well-drained loam soils
- Prefer soil pH of 7.0-7.5, but will grow in a pH of 6.0
- Require an abundant amount water for early plant development
- Are cross-pollinated by wind
- Have greater mass for fiber production when planted early
- Have less stem length and mass when planted later for seed production





Hemp can reach heights of up to 16 feet; average hemp plant growth can be up to 4 - 12 inches per week (which outcompetes normal weeds).

Hemp is very similar to corn in its nutrient requirements. A lack of nitrogen greatly decreases mass for fiber production, but too much could cause your crop to go "hot" which is a spike in the levels.

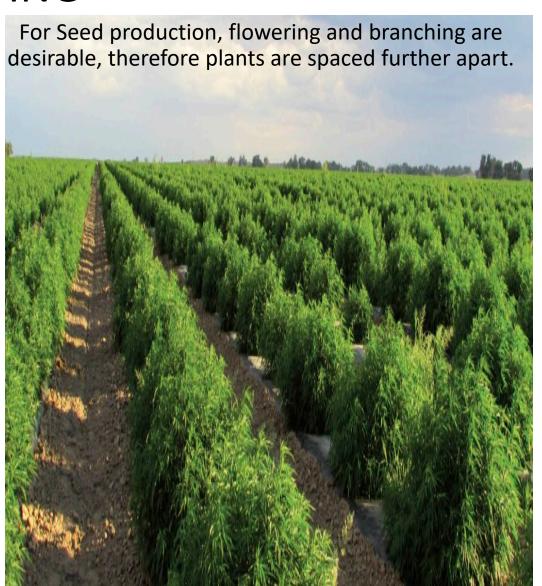
There are no labeled herbicides for hemp; however, hemp germinates quickly if there is sufficient moistures which helps with weed suppression.

- Hemp grows best in well-drained loam soils; avoid compact soils.
- Plant in late April or early May; best to plant after the danger of a killing frost or when soil temperatures are 50° or above
- Ideal seeding depth is ½ 1 inch, but no deeper than 1 inch.
- A standard grain drill can be used for planting conventionally or no-till
- Hemp requires 12-15 inches of water throughout the growing season.



PLANTING

For fiber, plantings are closer together to promote height and discourage branching and flowering.



Planting Methods



Planting Methods



HARVESTING METHODS

At this time there are no 100% proven CBD Hemp Cultivation Machines in operations within the United States. It is important to be mindful of this when planning your future cultivations. All methods mentioned below were done in Colorado, Late-September climates, with winds averaging 10 - 20 mph, for CBD Biomass Production.

Windrowing

• This 80 acre circle showed to lose an average of 2-4% trichome production, having a negative effect for the purchase of the Biomass at the point-of-sale.

Wet Baling

• This 80 acre circle proved to be a 70% loss due to mold, having a negative effect for the purchase of the Biomass at the point-of-sale.

Combining

• This 80 acre circle showed to lose an average of 3-5% trichome production, having a negative effect for the purchase of the Biomass at the point-of-sale.







CBD BIOMASS

- 8% OR HIGHER CBD YIELDS OPTIMAL
- \$3.00-\$7.00 P/%(POINT) FOR CBD PRODUCTION
- BE MINDFUL OF TRICOMES SPOILAGE (*ie. heavy equipment harvesting, wind damage, rough handling, mold, etc.)

TEXTILE BIOMASS

- THIS WILL DEPEND ON WHAT INDUSTRY THE FARMER IS GROWING FOR
- \$.50 \$5.00 p/lbs. Fiber Production
- THIS CAN RANGE FROM ROW CROPPING 6" X 4"-6" TO 72" X 72"
- ENSURE YOU ARE WELL EQUIPPED AND AWARE OF THE INDUSTRY AND MARKET



MODERN USES FOR THE HEMP PLANT



FACTORS TO CONSIDER

Like so many other commodities, there are many more considerations to industrial hemp cultivation than the actual cultivation itself, such as:

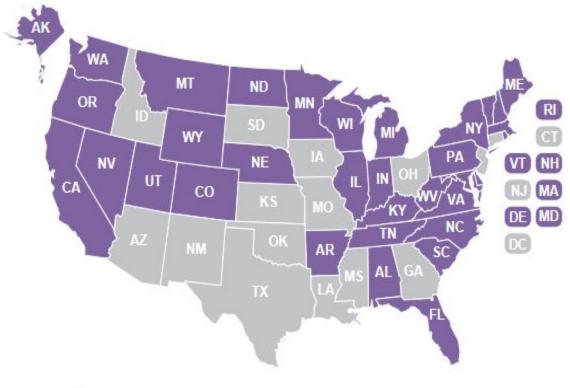
- What type of industry will the farmer be cultivating hemp for?
- What strains are recommended to optimize yields?
- Whose a reputable seed provider?
- Where do I take the product and who purchases the product?

Please Note: It is heavily advised against the purchase of any seed without a germination test and Certificate of Analysis.



State Action





Up until the beginning of 2018, 38 states and Puerto Rico have considered legislation related to industrial hemp. These bills ranged from clarifying existing laws to establishing new licensing requirements and programs. At least 15 states enacted legislation in 2017 — Arkansas, Colorado, Florida, Hawaii, North Dakota, Nevada, New York, Oregon, South Carolina, Tennessee, Virginia, Washington, West Virginia, Wisconsin and Wyoming. Florida, Wisconsin and Nevada authorized new research or pilot programs.

Farm Bill Act 2018 also known as H.R. 5485 has been signed by President Trump, removing Hemp from a Schedule I controlled substance and making it an ordinary agricultural commodity.















A BILL

- To amend the Agricultural Marketing Act of 1946 to provide for State and Tribal regulation of hemp production, and for other purposes.
 - 1 Be it enacted by the Senate and House of Representa-
- 2 tives of the United States of America in Congress assembled,
- 3 SECTION 1. SHORT TITLE.
- 4 This Act may be cited as the "Hemp Farming Act
- 5 of 2018".

Federal Action

HEMP.—The term 'hemp' means the plant Cannabis sativa L. and any part of that plant, including the seeds thereof and all derivatives, extracts, 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.

IMPORTANT information

- Sec. 7125. Supplemental and alternative crops; hemp.
- <u>Sec. 7415. Legitimacy of industrial</u> hemp research.
- Sec. 10111. Hemp production.



S.W.O.T. Analysis

Strengths

- Early stages of research and development
- Rapidly growing industry
- Variety of U.S. state certified seed & strains
- Variety of Industries to pursue

Weaknesses

- Early stages of research and development
- Rapidly growing industry
- Mother nature
- Limited amount of available resources and support

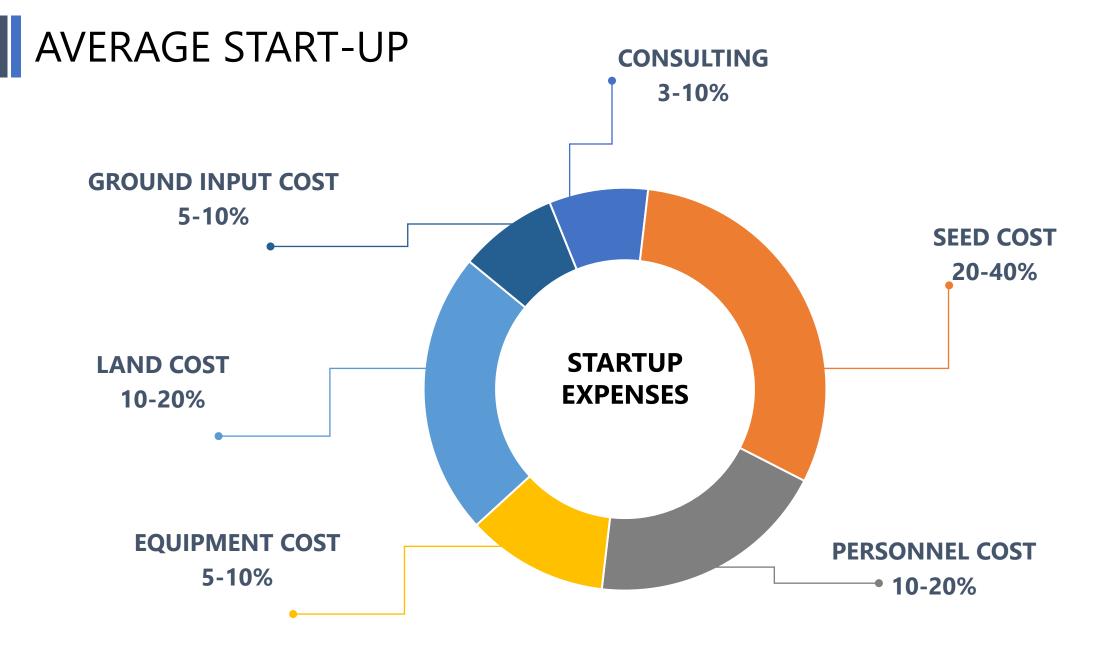
Opportunities

- New industry to grow into
- Federal Support for industrial hemp growth
- Becoming a pioneer in the Industrial hemp cultivation industry
- Assist other farmers and peers in proper means and methods for successful harvest

Threats

- Mother Nature/Weather
- Theft
- Industry Competitors
- Bad Seed Stock
- Hot Harvest







FOR MORE INFORMATION

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