

CDB BASIC

INTRODUCTION TO CBD

What is CBD? – You want to understand cannabidiol, and then you've come to the right place!

Over the past few years, we have published tons of cannabidiol (CBD)-related learning materials in our guide, helping thousands of people learn in-depth CBD knowledge and make positive changes in their lives.

The problem with other resources is that they are relatively poorly structured and incomplete. There is no easy entry or expert guide for CBD and hemp products.

That is why we have created this reference work for you. Whether you're new to cannabidiol or have already mastered the basics, you'll find everything you need to understand how CBD works and the right product for you here.

Your journey through the CBD world starts here and now.

CBD IS ONE OF MANY CANNABINOIDS

In addition to the well-known THC, CBD is one of the main active ingredients in the hemp plant. The CBD abbreviation stands for cannabidiol. Unlike THC (tetrahydrocannabinol), CBD is neither psychoactive nor intoxicating. Therefore, when asked whether CBD makes you high, it can be said unequivocally: No!

OVER 100 CANNABINOIDS IN THE HEMP PLANT

THC and CBD are organic compounds in the hemp plant known as cannabinoids. be designated. In addition to these two, there are many other cannabinoids. To date, over 100 different cannabinoids have been identified. The hemp plant consists of over 450 components. In addition to cannabinoids, terpenes, flavonoids, and other plant substances.

WHAT IS CANNABIS

According to the Swiss Narcotics Act, Cannabis is one of the prohibited narcotics. Furthermore, depending on the frequency and amount consumed, CannabisCannabis can be harmful to the health of young people in particular.



CBD EFFECTS AND BENEFITS

New clients frequently inquire about the effects and advantages of CBD, medicinal marijuana, and anecdotes about its benefits and possible health impacts through our online CBD store. The use of cannabidiol (CBD) is becoming more widespread. As a result, global demand for legal hemp products is significantly increasing.

A cannabinoid called

CBD is found in the cannabis plant. The medicinal characteristics of CBD span a wide range of advantages and impacts. The effects of CBD are extensive and all-encompassing.

You may discover information on managing mental disorders, reducing the symptoms of chronic pain, and many other health issues below. In addition, users claim that the anti-inflammatory effects of CBD are another critical impact.

BENEFITS AND POSITIVE EFFECTS OF CANNABINOIDS

Cannabinoids are particular types of chemical messengers or neurotransmitters. The cannabinoids bind specifically to the cannabinoid receptors. These receptors are found in the body of all vertebrates. In general, there are three types of cannabinoids. The ones produced by

our body are called endocannabinoids. The plants produced by plants are called phytocannabinoids. Synthetic cannabinoids are also made in the laboratory.

Cannabinoids become very special when they act as neurotransmitters. Many other neurotransmitters only send signals down the nerve pathway. However, cannabinoids act as retrograde neurotransmitters. As a result, they also allow signals to travel in the same neural way. Because of this, they can modulate messages between cells. They work like a "dimmer switch" by telling the "transmitter" cells to turn down the signal.

THE PLANTS OF CANNABIS

CANNABIS - THE PLANT AND ITS USE (2/6)

Cannabis, in English: hemp is an annual plant that propagates by self-seeding and is used in various ways.

One-minute reading time

Treatments and medicine (Level 1)

Since about 3000 BC. People made paper, clothes, and rope from hemp. Today, hemp is also used in the production of food and cosmetics. The industry mainly uses hemp plants of the Cannabis Sativa genus because they form the longest fibers.



MEDICAL USE

Due to its effect, the hemp plant has been. It is used for medicinal purposes in a similarly long tradition - first in Asia, later in the Middle East, Europe, and North and South America. For example, CannabisCannabis was supposed to fight pain, rheumatism, leprosy, diarrhea, or fever.

The most critical components of the cannabis plant for medicinal purposes are cannabinoids and terpenes or terpenoids. The most important of the 100 known cannabinoids include delta-9-tetrahydrocannabinol (THC) and cannabidiol (CBD).

Since female plants have a higher content of active ingredients, male plants are not used in medicine. However, this is different in the industry: fiber hemp varieties may contain a maximum of 0.2 percent THC in the European Union.

Medicine uses cannabis flowers and cannabis extracts. These all come from controlled and high-quality cultivation and are sold through pharmacies. It is essential that the quality of the respective herbal starting materials and their THC and CBD content are assured. This is the only way to dose medicinal CannabisCannabis in a calculable manner.

DRUG CANNABIS

Cannabis has been used as a sedative and narcotic due to its psychoactive properties. However, the intoxicating effect of specific cannabis strains has only been known in Europe since the 19th century.

Previously, hemp was only perceived as a crop for fiber production. It was not until the 1970s that consumption spread within society.

Today, CannabisCannabis is the most common addictive substance after alcohol and nicotine. According to the Narcotics Act, cannabis and cannabis products are among the prohibited addictive substances. Possessing, growing, or dealing in CannabisCannabis for non-medical purposes is a criminal offense.

The drug cannabis is usually consumed as hashish (also: hash, dope) or marijuana (also: weed). Hash refers to the pressed resin of the female flowers. It contains three to four percent THC, rarely up to 20 percent.

Marijuana is the name of the dried flowers and plant tops of the cannabis plant. Their THC content varies between one and five percent. The highest THC concentration at 20 to 60 percent is found in hash oil, a distillate of marijuana or cannabis resin.

MALE/FEMALE SEX CHARACTERISTICS

1. flowering male plant
2. fruiting female plant
 - ❖ male flower
 - ❖ anthers from different sides
 - ❖ pollen grain
 - ❖ female flower with a protective leaf
 - ❖ female flower without a protective leaf,
 - ❖ ovary in the longitudinal section
 - ❖ fruit with protective leaf
 - ❖ seeds in cross-section,
 - ❖ roots in the longitudinal section

The male sexual characteristics become visible just before flowering. Tiny pollen sacs develop in the area where twigs meet branches. They appear alone or in groups. Later, these burst open, and the pollen can spread. In the female plants, small, white hairs grow out of a small globule in the same place. Tiny hairs also grow at the ends of the branches, which later develop into the flowers. Whether a cannabis plant produces male or female sexual characteristics also depends heavily on the environmental conditions in which it grows. In unfavorable conditions, e.g., poor light conditions, a plant may develop both sexes simultaneously (hermaphrodite formation).

FEMALES

To detect a female, waiting until the plant has buds will not be necessary. Before the plant makes buds, it signals by displaying its sex. It greatly depends on when the plant reaches an altitude of approximately one foot. Two green "stigmas" can be seen at the intersections of the main stem with the branches, which will have come out a long time ago since between the stem and each stigma is where the first indication of the sex of the plant. If two white or even red hairs appear in that area, coming out of a long green bag, our plant will surely be a female. From there and later, the buds will come out, accumulating these hairs with their bags covered with trichomes, also called resin.

If a female plant is fertilized by a male, it will develop seeds inside its buds, and THC production will be reduced. However, if it is never fertilized, THC production will increase.

SEEDLESS

Seedless is the female plant that the male has not pollinated because by cultivating exclusively without the presence of males, the females grow more prominent and with more THC since

when hormones sprout, they create a tremendous amount of THC so that the males find her; that is why it grows more and with a higher concentration of THC; looking for the male it will grow more because it needs to evolve to look for him. Some usually have seeds.

HYBRID

To combine specific favorable properties of the cannabis subspecies, indicas, sativas, and ruderalis plants are crossed in various variations. In addition, numerous seed companies and so-called seed banks were established for the development, breeding, and marketing - especially of hemp containing THC. Also, for commercial reasons, there are now thousands of THC-containing cannabis varieties.

In recent years, varieties with a higher CBD content have also been increasingly bred and marketed as "medicinal" varieties.

CANNABIS INDICA AND CANNABIS SATIVA

SATIVA VS. INDICA: HOW THEY'RE THE SAME (AND HOW THEY'RE DIFFERENT)

Cannabis strains classified as indica and Sativa differ primarily because indica plants encourage deep sleep, while Sativa plants have more energizing effects when smoked. Hybrid cannabis plants are created by crossing Sativa and indica strains.



The Indian hemp variants were given the name Cannabis indica by the French naturalist Jean-Baptiste Lamarck, and the Swedish botanist Carl Linnaeus gave the name CannabisCannabis

Sativa to the hemp varieties he discovered. The molecular expression of cannabinoids and terpenes in Sativa and indica generally does not differ noticeably.

But the distinctions between indica and Sativa are subtle. For instance, Sativa plants look narrower and sparse, while indica plants have a broader, bushier appearance. Our comprehensive indica and Sativa weed guide will teach you how to tell these cannabis plants apart.

WHAT IS SATIVA?

Sativa is Cannabis from Eastern Europe, Russia, and Central Asia. Hemp varieties, often grown for their stalk and fiber rather than flower, could be classified as Cannabis Sativa. This cannabis plant is taller and has a flowering time ranging from 10 to 14 weeks. Branches are spaced out, and the buds/flowers are less dense.

CANNABINOIDS

Sativas usually contain more THC than CBD, and prominent terpene can include beta_caryophyllene and limonene. In addition, some sativas from equatorial regions are high in tetrahydrocannabivarin (THCV).

EFFECTS OF SATIVA

Sativa produces a high that could make you feel on top of the world, able to conquer any challenge. You may feel creatively inspired when using sativas or you may feel like running a marathon.

This is not always true, but our popular understanding of what a Sativa does. A more accurate way to see if a Sativa has a more uplifting effect is to look at the cultivar, the region, and the cannabinoid & terpene content.

Varieties that contain THCV combined with cannabigerol (CBG), limonene, pinene, and beta-caryophyllene may have more energizing effects. Such content can often be found in varieties from equatorial regions, such as Durban or Mozambique Poison.

WHEN TO USE

Sativas can be consumed throughout the day, particularly in the morning, perhaps in place of a cup of coffee. However, Sativas shouldn't be used right before night because the stimulating effects can cause sleeplessness.

Popular varieties

Five of the most well-liked Sativa strains are listed below:

- ❖ Trainwreck
- ❖ Strawberry
- ❖ sneeze
- ❖ Sky Dream
- ❖ Durban Toxin
- ❖ Silver Haze

SUPER DESCRIBE INDICA

Indica cannabis originates in Afghanistan and India. Cannabis indica can thrive in more moderate areas but is more likely to be shorter and stouter in size due to the harsh, mountainous environments it thrives in. The flowering period for indica plants is also faster, lasting six to nine weeks.

CANNABINOIDS

Indicas usually contain high levels of THC (similar to the amounts found in Cannabis Sativa). However, some indica varieties also have high amounts of CBD. Terpenes like limonene, linalool, beta-caryophyllene, and myrcene may be more likely present.

EFFECTS OF INDICA

Indica strains are known for producing the "couchlock" effect in which you are glued to your seat and don't want to move. However, Indica effects could feel more tolerable for some people due to the higher CBD content, leaving them feeling pleasantly sedated from head to toe.

But to say again, these are rough distinctions and do not hold all the time. Wide CBD-rich cannabis varieties are sativa, meaning that the potential for a cannabis plant to express a variety of different cannabinoids is within its genetic makeup.

The environment a plant is grown in (temperature, humidity, altitude, etc.), at what point it was harvested in its flowering cycle, and the amount of light received make a difference in which cannabinoids are ultimately expressed.

WHEN TO USE

Some people use indica strains at night as a natural sleep aid. While indica strains may or may not help you sleep, they are best to use when you've cleared your schedule and can relax.

Popular Strains

Here are 5 of the most popular indica strains:

- ❖ Hindu Kush
- ❖ Purple OG Kush
- ❖ Northern light
- ❖ Sensi star
- ❖ Blueberry and CDB Blueberry

SATIVA VS. INDICA: THE BOTTOM LINE

Without intentional breeding for specific chemical characteristics, most songs are likely to sound more alike than different, with the rare outlier.

It is well known that many strains currently in use are descendants of a limited number of genotypes initially distributed over a lengthy period.

Examining each strain more closely and taking into account any variations in the cannabinoids and terpenes contributing to the entourage effect may be the best way to get to the heart of the issue.

There could be differences we are not seeing, and maybe there are some types of CannabisCannabis from specific countries that are unique. Still, it is best to look at what compounds the CannabisCannabis contains and not what it looks like when being grown and arbitrarily labeled by the grower, dispensary, or anyone else with a potential bias.

HOW DO YOU TELL THE DIFFERENCE BETWEEN SATIVA AND INDICA?

According to our old understanding, Sativa produce more of an energizing “head” high, while indicas have more of a couchlock, “body” effect.

These distinctions are arbitrary and have no real bearing on reality. The only way to tell the difference is to grow them, and the plant is tall like a Sativa or short and bushy like an indica.

Then, we can see patterns and discern genetic similarities between strains properly. Until then, all evidence suggests that the traditional classification method is mostly wrong, and we may need to eliminate it.

ARE SATIVA HIGHS DIFFERENT FROM INDICA HIGHS?

Yes, according to previous trains of thought in the cannabis community. Sativa highs tend to be more “cerebral” and may infuse the user with a burst of fresh ideas and energy. Indica highs tend to be mellower and allow users to unwind in neutral headspace.

But to repeat, these distinctions are mostly inaccurate. The effects differ based on the plant's chemical composition, not how it grows. Therefore, regardless of Sativa or indica dominance, every individual's experience using CannabisCannabis will be unique.

Apply for a medical marijuana card if you want to explore the differences between Sativa and indica strains and get into the debate on whether there are any differences. Contact Leafwell's on-call doctors and get a medical card online today.

INDUSTRIAL HEMP

WHAT IS HEMP?

Hemp is a fast-growing and entirely usable organic raw material - one of the many vegetable all-rounders that can be used from the root to the tip of the leaf.



The cultivation of the crop hemp has a long tradition and was forgotten for many years due to the decades-long ban on cultivation. Already in ancient China, hemp was known as a medicinal plant for producing fiber, oil, and food. For example, Gutenberg's Bibles and the United States Constitution were printed on hemp paper. But in the 1930s, the universal plant fell into disrepute due to a campaign as "the most dangerous drug in the world," from which pharmaceutical companies and the cotton industry took advantage.

The cultivation of cannabis Sativa (THC content below 0.2%) only became legal again when it joined the EU in 1995. However, what is probably the oldest superfood has experienced a revival since then.

We at Hanfland know what we're talking about... our company headquarters are in Hanfthal, where hemp has had a permanent place since the 12th century.

HEMP IS A VALUABLE FOOD

The nutritional importance of hemp is fascinating:

- the high content of omega-3 fatty acids
- source of protein
- the high-quality amino acid profile
- Iron, magnesium, zinc, and fiber source
- recommended for vegetarians and vegans

Our PREMIUM HEMP products include seed (peeled or unpeeled), oil, flour, meal, protein powder, and tea. They can also be found in sweet products such as chocolate or nougat.

HOW DOES HEMP GROW?

The valuable plant *Cannabis sativa* is particularly easy to care for due to its low climatic requirements. It fits perfectly into the crop rotation, improves the soil structure, and is considered very robust and resistant, which is why it is also suitable for organic farming. In Austria, hemp cultivation follows strict criteria and only allows certified seeds with a THC content of less than 0.2% listed in the EU catalog of varieties.

As a fiber plant, hemp meets ecological and economic criteria and has excellent prospects as a rapidly renewable raw material.

Flax and hemp are suitable for agriculture, regional added value, environment, and innovative organic materials production for the transition of raw materials.

USES OF HEMP

Common applications

We can talk about the usefulness of hemp. Among its uses, we find:

- ❖ Textile fibers (tow) and cordage of excellent resistance. Easy and light to carry.
- ❖ Along with special chemical sealants to make the threaded joints of metal water pipes watertight.
- ❖ Seeds and oils are rich in fats (omega 3) and proteins (approximately 34%).
- ❖ Ecological fuels (biofuels), lubricants, and bioplastics
- ❖ Highly resistant bio construction materials
- ❖ Cellulose for paper
- ❖ Medicinal and cosmetic applications of oils.

- ❖ Insulating materials, plastic parts, and textiles for automobiles of the Audi and BMW brands, among others.
- ❖ Dope; its production and consumption are legal in some countries.

Natural medicine, clothing, food, housing, furniture, nourishing oil, animal fodder, biomass for heating, soap, shampoo, mats, sacks, insulation, plastics, felts, paints and varnishes, fuels and lubricants, geotextiles against erosion, fields of cultivation for water purification, soil enrichment, and legume tutor, etc., are some of the uses that this plant could have today. In some countries (France, Canada, and Sweden, for example) there are specific industries dedicated to the production of quality derivatives of hemp. In 2019, an Italian patent made possible the first elastic hemp, then called "H-EMP."

THE BENEFITS OF HEMP

Hemp has been with us since prehistoric times for its industrial use and nutritional and beneficial health properties. However, from the 70s of the last century, after the approval of strict regulations and the appearance of synthetic fibers, hemp was relegated to the background. In recent years, there has been a resurgence of industrial hemp cultivation in our country.

The plant came to Spain from China at the hands of the Arabs about 1,500 years ago. Since then, a great tradition of its cultivation has developed. For example, on the ships with which Christopher Columbus arrived in America, there was about 80 tons of hemp between ropes, sails, nets, etc. In the Valencian Community, the city of Callosa de Segura is considered the capital of hemp. Since the middle Ages, it was the center of a powerful thread, rope, and net industry. The various world situations and the specialization of its inhabitants made Callosa de Segura a benchmark for the work and ambition of this fiber during the 20th century. The history of the population linked to this plant can be seen at the local Hemp Museum.

Three raw materials are obtained from hemp: seeds, fiber, and pulp. The fibers are resistant, soft, insulating, and absorbent and are used in the textile sector to make clothing, nets, ropes, etc.; the pulp is used to make pulp and paper; and the seeds to make biofuels, lubricants, bioplastics, food, and cosmetics.

HEMP CULTIVATION ALSO BRINGS BENEFITS TO THE ENVIRONMENT, SUCH AS PROTECTING THE SOIL FROM EROSION

Hemp comes from the same plant as marijuana (*Cannabis sativa*), a fast-growing annual native to the Himalayas in Asia. In 1937 the United States banned its use to favor cotton and synthetic fibers, a veto that spread worldwide. The United Nations introduced hemp to the list of narcotic substances of the Single Convention of 1961, still in force today.

After years of genetic selection during the 20th century, French scientists developed varieties with a very low THC (tetrahydrocannabinol, also known as delta-9-tetrahydrocannabinol, the primary psychoactive constituent of *Cannabis*) content, and thanks to these contributions, new regulations were introduced. The mentioned varieties are destined for industrial and food use, and they are the ones we refer to when talking about industrial hemp.

Specific THC limit values for industrial hemp were established for the first time in 1984 in the European Union to "protect public health": a limit of 0.5% until 1987 and 0.3% after that year. Since then, the THC limit value of 0.3% for industrial hemp has been used internationally. However, the EU reduced the limit to 0.2% in 1999, a measure that did not please the European Industrial Hemp Association (EIHA), which urged raising the cap once more to 0.3% to prevent EU nations from suffering a competitive disadvantage. "There is no justification for a THC restriction of 0.2% from a scientific standpoint. In reality, 0.2% is just as secure as 0.3%" on their website, and they go into depth.

In Spain, the cultivation of industrial hemp has been regulated for 20 years by Royal Decree 1729/1999, of November 12, which authorizes 25 varieties of industrial hemp with a THC content below 0.2% and establishes the standards for the granting of aid for textile flax and hemp.

CANNABINOIDS (COMPOUNDS)

WHAT CANNABINOIDS ARE THERE?

As is well known, cannabinoids are inextricably linked to the cannabis plant. The cannabinoids explain the valuable health benefits of the hemp plant as value-determining ingredients.

Cannabinoids are chemical compounds that can influence the body's cannabinoid receptors.

The receptors, CB1 and CB2, are not only located in the brain but have now been found in several places in the human body. We now know about 113 isolated cannabinoids from the hemp plant, which can affect the body differently. While not all cannabinoids have been thoroughly researched, we can already differentiate the most important of them. So, besides CBD, we find other essential cannabinoids that deserve attention.

The primary cannabinoid receptors that we know of have been named CB1 and CB2. They are found in different areas of the brain and nervous system, which means they can control other functions and affect various aspects of health (although both receptors are known to work together in some instances).

The most popular cannabinoids today are THC (tetrahydrocannabinol), known for its psychoactive properties, and CBD, famous for its ever-increasing potential medical benefits. However, there are so many other cannabinoids: scientific research has identified 113 different cannabinoids.

THC – TETRAHYDROCANNABINOL

Everyone knows THC because this plant substance is probably the best known associated with CannabisCannabis. In Germany and Austria, however, the consumption of THC is prohibited and is subject to the Narcotics Act. Despite its intoxicating effects, THC also has useful functions that should not be underestimated. For example, THC can reduce pain, help with relaxation, alleviate feelings of nausea, stimulate appetite or relieve muscle spasms.

CBC – CANNABICHROMENE

The third most prevalent cannabinoid in hemp plants is CBC, a far less well-known cannabinoid. Although CBC has no intoxication effects and is therefore lawful to use, it can be more dominant than CBD. CBC has a relaxing effect, antimicrobial effects, and an impact on inflammation. It even reduces pain when combined with THC and eliminates fungus, which is essential for the plant's defense. Additionally, CBC can support bone health and emotional well-being.

CBN – CANNABINOL

Only a tiny amount of CBN is present in immature cannabis plants. Therefore, the plants need to be dried and preserved for longer to get a higher proportion. An oxidation byproduct of THC, CBN has a soothing effect. This phytocannabinoid is thought to increase hunger, function as an antimicrobial, lessen discomfort, and relax muscles. Additionally, it is claimed to have relaxing properties and the capacity to lower free radicals in the body.

CBG – CANNABIGEROL

CBG is not psychoactive and is not subject to any BTM law. The cannabinoid is found during the growth of the cannabis plant. Later, this cannabinoid breaks down again, so it is no longer present in large quantities. CBG is used for skin problems and tension, is said to stimulate the appetite, and also has benefits for emotional well-being.

THCV – TETRAHYDROCANNABIVARIN

THCV has a lower psychoactive effect, about 20%, than THC. THCV can have antispasmodic, neuroprotective, appetite suppressant, and metabolism stimulating effects. It could also be used if you are overweight since THCV has a fat-reducing effect. This substance could also be of help to people with diabetes. Recent research suggests that it can mitigate the adverse effects of THC.

THCA – TETRAHYDROCANNABINOLSÄURE

A cannabinoid acid called THCA is decarboxylated to produce THC. However, THCA may have neuroprotective properties. As a result, it may be applied to treat various illnesses. We are discussing neurodegenerative diseases.

CBL – CANNABICYCLOL

Not much is known about CBL, but researchers found that the structure of this cannabinoid differs from the others. CBL is a degradation product of CBC, although the therapeutic potential is not really known. Furthermore, CBL has only a low biological activity, as researchers and scientists from the USA were able to determine. So there may be cannabinoids that are of no use to humans or wildlife.

THERAPEUTIC POTENTIAL OF CANNABINOIDS

Due to the numerous cannabinoids, with their different modes of action, it can be said that CannabisCannabis has an extremely high potential for better well-being. Some of the cannabinoids have an anti-inflammatory effect, while others have a muscle-relaxing or balancing effect on the stomach and intestines. Really well used and available in products so far is only the CBD, which contains already known properties. THC can also be used, provided it can be used legally. The effect on mental illness is enormous, so several reports of positive experiences are becoming known.'

EFFECT BASED ON TYPE 1 AND TYPE 2 CANNABINOID RECEPTORS

The endocannabinoid system of the body's receptors is affected by the cannabinoids provided. Although particular cannabinoids have an impact, the receptors also play a part. The central nervous system has a predominance of type 1 cannabis receptors. Cannabinoids' potential effect on diseases including Parkinson's, Alzheimer's, or different types of nerve damage can be studied.

Type 2 cannabinoid receptors are found in the immune, digestive, and reproductive systems. In addition, they are also found in the bones, skin, lungs, and hormonal glands, as well as in the eyes. Diseases that involve organs or various body systems can be treated with cannabinoids when they interact with the right receptors.

However, it is also essential to know that the human body produces endocannabinoids itself, which dock to the receptors. For example, they are found in breast milk. But also, from a chemical point of view, certain cannabinoids can be reproduced. The THC can be partially simulated and used in the active ingredient dronabinol against nausea and vomiting. Synthetic cannabinoids are manufactured but have a similar effect.

THE MOST WELL-KNOWN ENDOCANNABINOIDS

When humans produce their own cannabinoids, they do so in the form of anandamide, 2-arachidonylglycerol, or O-arachidonylethanolamide. Anandamide is an unsaturated fatty acid found in the central nervous system. The structure is similar to THC but can be broken down more quickly while THC is in the body for a few hours. 2-AG activates the CB1 and CB2 receptors and consists of glycerol and arachidonic acid. 2-AG is an agonist and can stimulate bone growth by inhibiting the adrenergic system. Virodhamine acts as a CB1 antagonist and as a CB2 agonist.

FORMS OF CBD PRODUCTS

CBD OIL & CBD MOUTH SPRAYS

Essentially, CBD oils consist of a hemp extract dissolved in an oil. They are among the most popular CBD products and are administered drop by drop. Alternatively, they are often equipped with a spray attachment instead of a pipette. CBD oils come in various flavors—something full-spectrum, broad-spectrum, or isolate, each in a wide variety of CBD concentrations and optionally with added aroma.



CBD oil is part of the essential equipment of most CBD consumers due to its easy handling, immediate and long-lasting effect, and exact dosing option.

CBD oil is very suitable for most people, and we often recommend it as a basis to cover your daily CBD needs.

CBD TINCTURES

There have been tinctures for countless years. They are created by allowing a plant to sprout while immersed for days, weeks, or even months in a liquid foundation, frequently alcohol. Worldwide, tinctures are used to administer a variety of herbal medications. This is because they are reliable, simple, and allow for precise dose measurements.

The taste of CBD tinctures is comparable mainly to other powerful medicinal herbs, which are often described as bitter and pungent. Therefore, complex alcohol tinctures should not be undiluted directly on or under the tongue.

CBD FLOWERS

They are one of the purest CBD products and the "raw material" for all cannabidiol preparations. There are several ways to take them:

Inhale – The most common ways to smoke or vaporize the buds. They can be twisted into a cigarette or stuffed into a pipe. The natural product can also be enjoyed using a hookah or a vaporizer. Vaporizing offers the advantage over smoking in that gentle heating takes place - less CBD is lost as a result.

Baking and Cooking - Whether in cookies or cakes, finely chopped cannabidiol flowers are ideal for baking. The same applies to numerous dishes such as tomato sauce, pizza, and salad. In addition, mixing it with cooking oil can be used for cooking and frying without any problems.

Drinks – Many fans of CBD flower make tea or a healthy smoothie with other ingredients.

CBD CREAMS

There aren't many high-quality cannabidiol creams, pastes, and the like out there right now. The products often have the word CBD in their name, but most only contain a minimal amount. This limits their effectiveness. Furthermore, it must be expected that numerous other additives are included in addition to cannabidiol.

CBD INHALATION (SMOKING OR VAPING)

Smoking cannabis is the traditional way of consumption. It is a tried and tested method that has been practiced for centuries.

When vaping, CBD flower or concentrate is heated to a temperature below its fire point. Cannabinoids are thus released into the air without producing the potentially harmful byproducts of smoke.

Inhalation has an immediate effect either way, as the active molecules enter the bloodstream via the lungs, bypassing the digestive system.

There are various devices and methods with which one can smoke or vaporize CBD flowers or other CBD concentrates. There is something for every need, from CBD joints to bongs to direct vape pens.

CBD EDIBLES

Edibles are a fast-growing category in the burgeoning cannabis industry. CBD edibles come in varieties, sizes, and flavors and can be made from any type of CBD extract.

Because Cannabis is lipophilic, it can be dissolved in fat and added to almost any food. This makes it easy to make your own CBD edibles at home.

An advantage of CBD intake via food is the enormous possibilities for variety.

One downside is that it can be challenging to estimate the correct dose when consuming CBD edibles alone. Additionally, these edible products can tempt one to consume higher quantities than necessary or desired.

Therefore, we recommend that you cover most of your fundamental CBD needs with another form of intake and work with CBD foods.

It should also be noted that the effect can only occur after a few hours since the food must first pass through the digestive tract.

Examples of popular CBD edibles include:

- ❖ CBD tea
- ❖ CBD coffee
- ❖ CBD Chewing Gum
- ❖ CBD Cookies
- ❖ CBD syrup
- ❖ CBD drinks

CLASSIFICATION ACCORDING TO THC CONTENT

Since ancient times, tinctures have been used. They are produced by soaking a plant for days, weeks, or even months in a liquid foundation (typically alcohol) and enabling it to sprout. A variety of

FULL SPECTRUM vs BROAD SPECTRUM

THERE ARE DIFFERENT CANNABINOID SPECTRUM OPTIONS TO CHOOSE FROM WHICH ARE FULL-SPECTRUM, BROAD-SPECTRUM CBD, CBD ISOLATE AND TERPENOLATE. WHILE THESE FOUR TYPES OF PRODUCTS MAY SOUND SIMILAR BUT THERE ARE ACTUALLY APART FROM EACH OTHER.

FULL SPECTRUM
(Everything from source plant)

BROAD SPECTRUM
(Everything except THC)

A full-spectrum CBD product, manufacturers use dried hemp plant matter to extract cannabinoids. Usually, a supercritical CO2 extraction is used to draw out these plant compounds. full-spectrum CBD oil that contains all the cannabinoids that hemp has to offer.

Broad-spectrum CBD is full-spectrum CBD without any THC. It offers all the entourage benefits associated with full-spectrum CBD, without any chances of THC being ingested into the body. It is an excellent choice individuals that can't have any traces of THC in their system

Herbal medications are delivered through tinctures all over the world. This is so that precise dose measurements may be taken, and they are reliable and straightforward to use.

Companies choose to utilize a variety of cannabinoids from diverse strains according to the final product's intended application.

After the initial extraction, what happens to the cannabinoids determines whether the extract is full spectrum, broad-spectrum, or CBD isolates. Each term refers to the degree of processing of the product.

1. FULL SPECTRUM CBD

If an extract is a full spectrum, it contains all the natural photochemical in the plant, including CBD, trace amounts of cannabinoids, terpenes, and essential oils. Whole spectrum hemp extracts also have negligible THC content, below 0.2%.

The full spectrum of active compounds extracted from hemp work together to amplify the potential health benefits of each cannabinoid. This phenomenon is known as the entourage effect.

Although it is not psychotropic, although it is not normal, full-spectrum CBD contains traces of THC, and in this aspect, we would say that:

Pros:

- Allows the user to benefit from the full entourage effect.
- The least processed form of CBD.
- Contains terpenes and flavonoids for additional potential health benefits.

Cons:

- The THC content may cause problems with local legislation.
- It carries the natural aroma of hemp, which is quite strong.
- In cases where it is critical not to have contact with THC due to work, it is not recommended. They shouldn't test positive on any drug test, but better not mess with it.

Three types of users typically choose to use a broad spectrum (0% THC) over a whole range (<0.2%).

- ❖ Athletes who, due to their physical activity, may have some type of sensitivity to THC

- ❖ People with schizophrenia or any other psychological condition that THC can potentiate
- ❖ People who generally have a very high sensitivity to THC.

2. BROAD SPECTRUM CBD

All other plant constituents, excluding THC, eliminated after the initial extraction
, are present in broad-spectrum CBD and cannabidiol.

Broad-spectrum extracts provide the entourage effect because they have a variety of cannabinoids. Still, they do not contain THC, which studies show can dramatically improve the qualities of CBD when present in trace amounts.

To put it simply, full-spectrum CBD can be thought of as a combination of full-spectrum CBD and CBD isolate. Except for the THC component, it comprises the entire cannabinoid spectrum.

Pros:

- It offers almost all the advantages of the entourage effect.
- Less processed than isolate.
- There is no risk for sensitive people.

Cons:

- Less investigated.
- It does not benefit from potentiating, thanks to traces of THC.

The broad spectrum works best for:

CBD users with conditions where the isolate alone cannot help.

People are sensitive to THC.

People who live in places with strict THC regulations.

First-time CBD users fear THC.

ISOLATE

CBD

The purest version of this substance, CBD isolate, is created by eliminating all extraneous chemicals and extracting CBD from its natural environment.

The advantage of using CBD isolate over other formats is the higher concentration of CBD per serving. Isolates are typically 99% pure. However, there is no entourage effect. Instead, you can only benefit from the impact attributed to cannabidiol, hence the lower price of these products and lower demand than full-spectrum or broad-spectrum CBD.

Pros:

- ❖ The most concentrated form of CBD.
- ❖ Great versatility.
- ❖ Without smell

Cons:

- ❖ It does not offer all the benefits attributed to the entourage effect.

CBD ISOLATE IS BEST FOR:

CBD users were advised to use very high doses of CBD.

People are sensitive to THC or other cannabinoids.

People who fear failing a drug test.

CBD consumers favor odorless items.

Those who reside in areas with severe THC regulations.

New CBD users fear other cannabinoids.

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