

## SUPER SEEDS

You can buy hemp seeds, hemp protein powder, hemp seed cooking oil, hemp milk, and even hemp butter at grocery stores or online. Hemp seeds are considered a superfood because of their incredible nutritional benefits. The seed's plant-based protein is actually a complete protein, offering every single amino acid the human body needs to survive. There are approximately 10 grams of protein and 3 grams of fiber in just 3 tablespoons of hulled hemp seeds, so sprinkling even a small amount on a meal goes a long way.

**HEMP SEED** can be purchased in two forms—with the shells and without them. Both are edible and delicious, but they differ in texture. Whole (unhulled) hemp seeds means *with* the shell; they are crunchy, and the shell is an excellent source of fiber. Hulled (shelled) hemp seeds are much easier to chew. They're also known as "hemp hearts."

**HEMP PROTEIN POWDER** is the by-product of hemp seed oil that is milled into a fine, flour-like consistency. A 4-tablespoon serving has 7 to 13 grams of fiber, 13 grams of protein, 2.5 grams of omega-3 and -6, and potassium, magnesium, iron, and calcium. Unlike hemp seeds, the protein powder doesn't have much taste, so it's easily incorporated into smoothies and baked goods.

**HEMP SEED OIL** is a natural source of essential fatty acids. Cold pressed from hemp seed, this raw, organic, unrefined oil has a strong, nutty taste. It's a phenomenal source of balanced omega-3 and -6. Do not use for frying or heating above 350°F, as the omegas can burn off at high temperatures. Once opened, hemp seed oil needs to be refrigerated, so I use it mainly for recipes that require refrigeration or are meant to be consumed cold, such as smoothies.



**You can cook with hemp protein powder, hemp seeds, hemp seed oil, and hemp flower, but only hemp flower contains CBD.**

## MAKING YOUR OWN CBD BUTTER AND COOKING OIL

When I was a kid, Choose Your Own Adventure books were extremely popular. These books let the reader choose what the novel's protagonist would do next. Since there are many ways to infuse CBD into foods and drinks, I'd like you to think of this book as a Choose Your Own Adventure cookbook. If a recipe calls for CBD butter and you don't have any, there are ways to swap it out with regular butter and use CBD cooking oil or water-soluble CBD instead.

If you've cooked or baked with marijuana, the amount you used was likely *way more* than the amount you'll use to cook with CBD. While you can't overdose on CBD, it can be expensive, and we definitely don't want to waste any by going overboard on the dosage.

First and foremost, if you're looking to make your own CBD butter or oil, use a scale so you can accurately weigh the hemp flower in grams and ounces. And regardless of how much CBD you choose to infuse into butter or oil, label each batch with the date and quantity of CBD. This will help you keep track of what you've made so that you can dose up or down, depending on what you're preparing. You might choose to make butter and oil at different strengths for different kinds of recipes, and you don't want to mix up those batches!



While it may seem like an extra step to make your own cooking oil or butter when these products can be purchased with CBD already in them, I find the main benefit is that I get to choose the strength of the hemp flower and the brand of butter and oil. This means my CBD oil and CBD butter can be *stronger* in potency than store-bought, and I can go with my favorite cooking oils to ensure that I'm using something that's high-quality and organic. If you're wondering how much hemp flower to use for your infusion, see CBD Dosage Calculators on page 123.

**WASHING AND DECARBING YOUR HEMP FLOWER.** Before infusing CBD into butter or oil, the hemp flower has to go through a decarboxylation process to “activate” the CBD, or convert CBD-A to CBD. But even *before* decarbing the hemp flower, it's a good idea to put it through a rinsing process.

We wash herbs, fruits, and vegetables before eating or cooking them in order to remove dirt and microscopic bacteria. Most people *don't* wash their raw cannabis prior to decarboxylation, but the more I read up on it, the more it makes sense to do so. Both hemp flower and marijuana buds contain sticky resin. Whether the plant was harvested in a large field or inside a grow facility, just about anything that was in the air, from pollen to dust, is probably stuck on that plant. Granted, most bacteria will likely be burnt off during the decarbing process. But if you have a pollen allergy, be aware that you might be baking pollen into your medication if you don't wash it first.

While some growers do have a washing process, it is not standard practice or required. I've found the best method from Jeff the 420 Chef, who recommends:

**1. Prep:** Break the hemp flower into popcorn-size pieces. Personally, I don't break the flower apart, as it can wind up in the final product if it gets too small during the infusion process. I do look for seeds and take them out (to plant later). I also remove any large stems. Most store-bought CBD hemp flower is already “prepped,” so you can likely skip this step.

**2. Soak:** Place the hemp flower in a French press coffee maker and completely immerse in water. Distilled water is preferable. The hemp can be soaked for up to three days; change the water twice a day until it is clear. The reason to use a French press is that you can put the hemp flower at the bottom and press down on the plunger when you're ready to change the water. This keeps the flower from being thrown out with the dirty water, and it gently squeezes out the water each time.

**3. Rinse:** Transfer the hemp flower from the French press to a salad spinner. Spin for about 30 seconds to remove excess water. You don't need to worry about fully drying the hemp, as it will dry during the decarbing process.

**4. Dry and Decarb:** Preheat the oven to 240°F. Spread the hemp evenly on a rimmed baking sheet and cover loosely with aluminum foil; you can crimp the foil to the pan edges to hold in the odor. Bake for 1 to 1½ hours, until the hemp is completely dry. During this time, the hemp flower will go through the process of decarboxylation to “activate” the CBD in the raw plant (convert CBD-A to CBD).

**QUICK HEMP FLOWER DECARBING.** If you don't want to wait days to completely wash and decarb your hemp flower, Jeff the 420 Chef recommends a slightly faster process:

**1.** Soak the hemp flower overnight in distilled water.

**2.** The next day, drain the hemp in a fine-mesh strainer over the sink, then rinse with more distilled water.

**3.** Place the rinsed hemp flower in a large tea strainer (or tea infuser basket) or wrap it in cheesecloth. Bring filtered water to a boil in a saucepan and place the tea strainer with the hemp flower in the boiling water for 5 minutes.

**4.** Immediately remove after 5 minutes and place the tea strainer in ice water for 1 minute. Remove the tea strainer from the ice water and gently squeeze out excess water from the hemp. Next, remove the hemp flower from the strainer and spread it evenly on an oven-safe ceramic baking dish.

**5.** Preheat the oven to 300°F. Cover the hemp flower with foil and bake for 20 minutes.

**DECARBING WITHOUT CLEANING THE HEMP FLOWER.** If you want to forgo the cleaning, rinsing, straining, and squeezing process and go straight to decarbing your hemp, I recommend baking the hemp flower at 220°F for about 40 minutes or at 230°F for up to 30 minutes. The hemp will brown a bit as it cooks, but be sure to watch it—you don't want a black and burnt flower. You're looking for the buds to turn slightly brown and slightly crisp.

## INFUSING CBD INTO COOKING OIL

You've now cleaned and decarbed your hemp, and it's ready for infusion. After the hemp flower has cooled following the decarboxylation process, you can use a French press to create a double boiler on the stovetop. Here's what you'll need:

- Hemp flower (decarboxylated)
- Cooking oil of choice: olive oil, coconut oil, hemp seed oil, etc.

- French press (4-cup capacity or larger)
- Candy or instant-read thermometer
- Cooking pot large enough to hold the French press
- Jar for storing the infused oil

You determine how much hemp flower to use according to the percentage of CBD in the flower. Find a formula that works for you so that it's easy to calculate how much CBD is in each meal and each serving. Typical ratios of hemp flower to oil are 2:1 or 1:1 (grams: fluid ounces). If hemp flower contains 24% CBD (approximately 215 to 240 milligrams per gram), some suggested ratios are 8 grams of CBD flower to 4 or 8 ounces of oil. Whatever you decide, you should also consider how the oil will *taste*. The more raw plant material added to a cup of oil, the greater the likelihood that you'll taste it in your food.

- 1.** Place the decarbed CBD flower and 1 cup of cooking oil in a French press coffee maker. Put the lid on, but don't use the plunger yet.
- 2.** Fill the cooking pot a quarter to halfway full of water and bring to a boil. The water should come slightly above the level of the cooking oil in the French press.
- 3.** Stand the French press upright in the boiling water, essentially creating a double boiler. Place the thermometer in the water. The ideal temperature for infusing CBD into olive oil is around 200°F, so once the water is boiling, dial back the heat and simmer for 2 hours.
- 4.** Check the water level every 20 minutes or so, refilling as necessary to maintain a constant level. Using oven mitts, lift the French press out of the water occasionally to give the oil a good stir, then set it back in the water.
- 5.** After the oil has been simmering for 2 hours, carefully remove the French press from the water, using oven mitts. Press the plunger all the way down to strain the oil and keep the hemp flower and stray particles out of the final product.
- 6.** Slowly pour the infused oil into a sterile jar or container with an airtight lid. Use a glass container such as a mason jar, or simply reuse the original oil container.
- 7.** If you notice any particles in the oil, you can use cheesecloth to strain the oil again before using it. Store in a dark cabinet or pantry where the temperature is fairly consistent.

## INFUSING CBD INTO BUTTER

You can use the same CBD ratio for butter as for cooking oil—such as 1 cup (2 sticks) butter to 4 to 8 grams CBD hemp flower. Remember, the more raw plant material you use, the more the butter (and any food made with it) is likely to taste like cannabis.

Unsalted organic butter yields the best results. Otherwise you can wind up with butter that has extra water pocketed somewhere in your silicone mold or container. Buying higher quality butter means less water in your butter, and that means a higher yield with higher potency. It's best to use butter that's already softened, so leave it at room temperature for a few hours prior to infusing.

To make CBD butter, follow the same basic steps and use the same materials as for CBD cooking oil (above), but let the butter *simmer* for 3 hours. Don't let it boil, or it may burn.

Place 1 cup unsalted butter (2 sticks) in a French press. Every 20 minutes or so, lift it from the hot water to swirl the butter around. Be sure to watch the temperature on the candy thermometer—you'll want it to stay around 160°F, ideally, but never exceed 200°F.

When finished with the infusion, refrigerate or freeze your CBD butter in an airtight container or silicone mold.



**Each rectangle of this silicone mold contains ¼ cup butter (4 tablespoons). To ensure that all the sticks are the same size, pour the butter into a measuring cup, then into the mold.**

## MAKING CBD BUTTER IN THE OVEN

Making CBD butter in the oven saves you from worrying about burning your butter or maintaining consistent heat on the stovetop. You can also make a larger batch this way. Here's what you need:

- hemp flower (decarboxylated)
- 2 cups (4 sticks) unsalted butter, softened
- square or rectangular oven-safe dish
- silicone spatula
- cheesecloth, fine-mesh sieve, or tea strainer
- jar or silicone mold for storing infused butter

**1.** Preheat the oven to 225°F.

**2.** Combine the hemp and butter in the oven-safe dish (2 cups butter and 4 to 8 grams of hemp flower, or whatever ratio works best for you). Place in the oven.

**3.** Once the butter has melted, stir with the spatula to make sure the hemp is completely submerged in the butter. Bake for 4 hours, stirring once an hour.

**4.** Remove from the oven and strain the butter to remove the flower particles, using cheesecloth, a sieve, or a tea strainer. Or you can pour it into a French press to strain it—the mesh on the plunger should be fine enough to capture the particles.

5. Once all the particles are deposited in the cheesecloth/sieve, press down with the spatula or with your hand to squeeze out all the butter you can.
6. Store in an airtight container or silicone mold in the refrigerator or freezer.

## CANNABIS INFUSION MACHINES

If you're worried about your hemp flower losing its potency as it is infused into butter or oil, you can purchase a Magical Butter or LEVO infusion machine to take out the guesswork. Here are the benefits of going with a machine to create your CBD butter or oil:

- The machine does the work for you. You literally put the hemp flower and oil/butter into the machine and just wait for it to be done.
- The machine heats the CBD at the right temperatures and makes sure the medication is consistent throughout the entire batch.
- There's less cleanup required.
- The house won't smell like pot at all. If you've made cannabutter, you know the smell is quite strong and will soon move beyond the kitchen, even if you have the stove exhaust fan going at full blast.
- The infused butter and oil have a better taste, in my opinion—more refined and less earthy.
- These machines can easily infuse food and drink products with cannabis, so you can make a variety of recipes without using extra pots or pans.
- The machines are inconspicuous. The Magical Butter Machine looks like a large stainless-steel electric kettle for boiling water. The LEVO looks like a Keurig or espresso machine.



**Magical Butter Machine (top) and the LEVO II (bottom)**

The **Magical Butter Machine (MBM)** can infuse up to 5 cups of oil or butter at a time, so you can make a big batch of butter and freeze it for use later. It also has a non-heat option, so you can use it as a blender. You do have to strain the infused butter or oil through cheesecloth, so there is still some mess involved, but you don't have to stand over a hot pan to constantly move the butter or oil to make sure it's infusing properly.

The **LEVO II** is my new favorite kitchen gadget because it has a function to *decarb* the hemp flower before infusing it. The LEVO can make up to 2 cups of oil or butter at a time. That's less than the MBM, but 2 cups are more than enough for a day's cooking. The LEVO is designed for cooking with hemp flower

and other herbs so it doesn't exceed 200°F. I like to experiment by adding flavors such as garlic and rosemary to small batches; if the flavors come out too light or too strong, I can make another batch and marry the two. And what I really like is how easy it is to clean—everything goes in the dishwasher. Also, there's no straining through cheesecloth; the machine dispenses clear oil and butter with the touch of a button. There's also an app with recipes and time/temp indicators that you can access from your phone.

## HERB INFUSIONS WITH CBD BUTTER/CBD OIL

Some of the recipes in this book call for CBD butter or oil infused with herbs. Here are a couple of combinations that you can use as is or vary with your own choice of herbs. Simply add the herbs in with the hemp flower as you infuse so that the herbs and the hemp can be strained together.

### CBD CHIVE BUTTER WITH GARLIC AND THYME

- 1 cup (2 sticks) unsalted butter
- 4 to 7 grams hemp flower
- 3 tablespoons loosely packed chopped fresh chives
- 1 clove garlic, minced
- 1 tablespoon loosely packed chopped thyme

### CBD ROSEMARY COOKING OIL

- 1 cup oil of choice
- 4 to 7 grams hemp flower
- ¼ cup loosely packed fresh rosemary leaves, without stems

The benefit of using vegetable or refined coconut oil as a base is that it doesn't have a distinct taste, so it can be used in just about any recipe. However, coconut oil does congeal at cold temperatures, so it can change the consistency of a meal if you refrigerate leftovers. If you like the nutritional benefits of hemp seed oil (which can be used in foods meant to be kept chilled, such as mayonnaise) but don't like its taste, infusing rosemary or other herbs in addition to the CBD will help.

## CBD-INFUSED CONDIMENTS

To add CBD to condiments such as honey, maple syrup, or ketchup, it's best to heat the condiment first. Since cannabinoids bind best with fat, I find that the best way to put CBD into a condiment that doesn't contain a fat- or an oil-based ingredient is with water-soluble CBD. That way the CBD will be mixed evenly throughout the condiment.

You can also opt to add water-soluble CBD to an individual serving of practically any kind of food. This means that you can cook a meal *without* CBD and then add a dose to your own portion.

## DON'T OVERCOOK IT!

If you've ever cooked with marijuana, you know that THC burns off at a different temperature than CBD does. THC is completely degraded at temperatures above 392°F and starts to break down long before that. Similarly, CBD will begin to evaporate as it heats, which means less potency in your food. Whether you're adding a small amount or opting for a stronger dose, all the CBD will degrade at the same rate and in the same temperature range.

The boiling point of CBD is between 320°F and 356°F. It's best not to heat CBD for too long at 350°F. To be safe, stick with a temperature no higher than 340°F. Frying or sautéing with CBD butter or CBD oil also increases the likelihood that the CBD will lose its potency, since the CBD is directly in contact with the pan's hot surface. High heat can also bring out CBD's bitterness.

When I bake with CBD, I like to keep the temperature at or below 325°F and use recipes that call for a cooking time of one hour or less. However, you *can* bake cookies, brownies, and breads at 350°F, since the internal temperature of baked goods will be lower than the external temperature of the oven.

## MAKING CBD-INFUSED BUTTER WITHOUT HEMP FLOWER

You can infuse butter—or cooking oil, or any food or drink item—with CBD oil or CBD powder, readily purchased in a store or online. Here's what you'll need:

- 2 cups (4 sticks) unsalted butter, cut into smaller pieces
- 4 cups water
- 10 grams pure CBD oil

- 1.** Combine the butter pieces, water, and CBD oil in a medium saucepan.
- 2.** Cook uncovered over low heat for 3 to 4 hours.
- 3.** Using a metal spoon, gently stir every 30 minutes. The mixture will thicken as the water cooks off. Don't allow it to boil as this could decrease the amount of CBD.
- 4.** Once the mixture is glossy and dense, remove it from the stovetop and let cool.
- 5.** When the mixture has cooled, pour it into an airtight container. Secure the lid firmly and place the container in the refrigerator for at least 2 hours to let the butter solidify. Store it in the refrigerator until you're ready to use.



# MAKING CBD-INFUSED COOKING OIL WITHOUT HEMP FLOWER

CBD crystals or the powdered form of CBD can be infused into cooking oil. Manufacturers often recommended starting with an initial dose of 5 to 10 milligrams. Here's what you'll need:

- 1 cup cooking oil (coconut, olive, canola, etc.)
- 1 gram crushed CBD crystals or CBD powder

- 1.** Pour the oil into a medium saucepan and heat on the stovetop at the lowest temperature; bring to a simmer but do not allow to boil.
- 2.** Add the CBD crystals or powder and stir until completely dissolved.
- 3.** Place a candy thermometer in the oil; the temperature shouldn't exceed 245°F or the CBD will burn and you'll be left with just oil.
- 4.** Once the CBD is dissolved, remove from the heat and let cool, then pour the CBD-infused oil into a glass jar and secure the lid. Store at room temperature.

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For each recipe in this book, there's a suggested amount of CBD to incorporate and instructions for when to incorporate it in the cooking process. Whenever possible, I give multiple options for the source of CBD (water-soluble CBD, CBD butter, CBD coconut oil, etc.) so you can choose what works best for you. I recommend that you determine your daily dose of CBD before cooking with it, if possible. That way you won't waste any CBD by cooking with way too much or cooking with way too little (so that it has no effect).

The recipes in this book typically contain .5 to 1 milliliter of water-soluble CBD per serving. While everyone's ailments are different and a daily amount of CBD varies from person to person, it's not uncommon for people to take 1 to 2 milliliters of water-soluble CBD per day, so incorporating CBD into two meals or drinks per day could be sufficient. Most of the recipes are for one or two servings, and easy to double or triple to make family-size amounts. The smaller serving sizes can also come in handy if the CBD does wind up overpowering the flavor of the meal. It's definitely possible to add too much CBD to a recipe, so instead of wasting your medication (and your time and the meal you just prepared), you can simply double the recipe to dilute the taste and freeze or refrigerate leftovers for later. You can also opt to make these recipes without CBD and then add doses to individual portions, making the food easily shareable. And many of the meals include sauces, so you can top off one of your own recipes with a CBD sauce from this book. Remember that simply adding a store-bought water-soluble CBD or CBD oil to your meal is often the easiest solution.