

M!GHTY GREEN



CANNABLISSFUL



CBD FOR THE SKIN

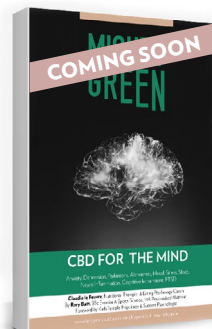
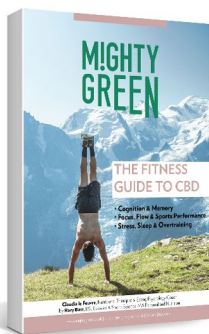
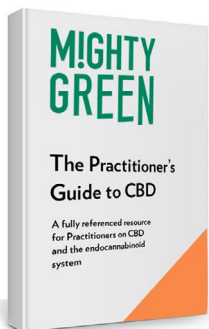
Introducing Topical CBD Products Into Your Business
Guide For Spa Owners & Therapists

Claudia le Feuvre, Nutritional Therapist & Eating Psychology Coach
Rory Batt, BSc Exercise & Sports Science, MSc Personalised Nutrition
Dr Shereen Saleh, GP & Functional Doctor with a special interest in skin & anti-ageing

SIGN UP

here: www.mightygreen.co.uk/spa to receive...

01. Access to the **highest quality CBD** products
02. **Free tools** for your clinic
03. **Free education & training** on CBD
04. **Free eBooks**
05. **Wholesale prices** for spas & therapists
06. **Commissions** on online client purchases






Absolutely fantastic! 1st time I have slept through the night in years. I'm so annoyed I didn't leave my Fitbit on to measure it. I will next time.



“The most obvious benefit of the CBD oil was the day after as the soreness and the pain around my upper back area that was irritating me for a couple of days was almost gone.

Now I feel completely refreshed! Thank you once again for the massage which I received just at the right moment when I really needed it!”



I have been suffering from rather severe bouts of anxiety over the last year and the relaxing CBD oil massage was definitely an effective therapy.

Not only did I sleep soundly but my overall emotional well-being was improved.



“I suffer with my upper back. My therapist was shocked to see how bad my back was since my last massage with her. I went for the relax oil... And just 20 minutes really helped my back - the pain settled & my back felt weightless.

I'd definitely do it again - I'd go for an hour. If 20 minutes helped I'm curious as to how I'd feel with an hour. I'd definitely recommend.”



Contents

INTRODUCTION	05
WHO THE HEMP ARE MIGHTY GREEN?	06
WHAT IS CBD?	07
HOW CBD CAN BENEFIT YOUR CLIENTS?	08
HOW CBD CAN BENEFIT YOUR BOTTOM LINE?	13
FREE TOOLS FOR YOUR CLINIC	14
HOW TO USE TOPICAL CBD	15
USING CBD INTERNALLY	16
THE CANNABLISSFUL PRODUCT RANGE	17
BASE OILS	17
SOOTHE BLEND	20
ENERGISE BLEND	21
RELAX BLEND	22
CBD BLISS BALM	23
MAGNESIUM BALM	24
A DEEPER DIVE INTO CBD, THE ENDOCANNABINOID SYSTEM & THE SKIN	25
THE ECS IN & UNDER THE SKIN	26
HOW CBD HELPS	27
REFERENCES	28

Introduction

Welcome to CBD For The Skin.

We have created this book for Spa owners, massage & beauty therapists, and health professionals with a special interest in the skin. Our aim is to give you clarity, insight and confidence in this emerging field and to share with you the latest research on CBD's potential in skincare.

With 11% of the UK population reported to have consumed a CBD product in the last year either topically or internally, it is likely your clients are asking you about CBD and if it could benefit them. As health practitioners ourselves, we understand how difficult it can be to find credible information on CBD. We have delved into all the research and gathered the latest research in CBD and skincare and collated it here for you.

Join us on a journey as we dive into what CBD is and the many benefits of using it topically. We want to emphasise that we do not make medical claims about CBD. We are simply reporting on the scientific literature. You'll always find references from scientific papers.

Thank you for signing up with Mighty Green. Look out for our newsletters brimming with the latest CBD research and clinical insights. We look forward to supporting you along the way.

Who the Hemp are Mighty Green?

We are a team of experts, passionate about helping people transform their health and live their best lives. Our unique combination of health and beauty industry knowledge, clinical experience and technical expertise helps us innovate, source, and deliver the very finest products.

We have travelled far and wide to source the very best CBD extract with a host of other beneficial cannabinoids while keeping THC well below legal limits. We're also really proud of our base massage oil which has many health benefits in its own right and has been carefully formulated to facilitate the transport of CBD into the skin.

We are health professionals and industry leaders on a mission to share our expertise with you.

Introducing...



Claudia le Feuvre, Nutritional Therapist. Eating Psychology Coach & Co Founder of Mighty Green, with 14 years clinical experience.



Rory Batt, MSc Personalised Nutrition, BSc Sports Science. Rory completed his Masters dissertation on the application of cannabinoids in Type 2 Diabetes.



Dr Shereen Saleh, General Practitioner & Functional Medicine Practitioner. Dr Shereen has a special interest in CBD, women's health, mental health & dermatology.



Mike Balfour OBE, Health Industry Pioneer, founder of Fitness First health clubs around the world and Mentor to Mighty Green.



What is CBD?

You've probably heard about CBD or even seen it in coffee shops, health food stores, spas and even your local gym - but what the heck is it? There's a lot of magic locked in this mighty molecule.

CBD is actually short for cannabidiol, and it's one of many special chemicals that naturally occur within Cannabis Sativa plants, which are a special variety of hemp.

The magic molecules in Cannabis Sativa are called cannabinoids, which each have their own special powers. The amazing thing is, you can find over 100 cannabinoids in hemp. It just so happens that CBD is one that's particularly special.

Unlike its psychoactive sibling THC, **CBD does not get you high.**

The reason you've seen CBD in everything from coffee to massage oil is because it can work its magic without making people 'high'.

CBD doesn't take you on a wild and unsuspecting ride. That means you don't feel altered, euphoric or out of control in any way whatsoever.

Instead, the feeling you get from CBD is like receiving a hug from a friend, or that feeling when you step into a nice warm bath. It's a little bit of nice, without the stuff you don't want (and neither does law enforcement).

Think of someone who enjoys drinking coffee, but doesn't like caffeine - so they drink de-caf. Coffee is still chock full of great stuff like antioxidants which are healthy and can make you feel good. It's the same with CBD. **CBD is basically the de-caf version.** Or de-THC if you like.

How CBD Can Benefit Your Clients

Combining CBD with a massage is like putting whipped cream on top of your hot chocolate.

I guarantee a lot of people will ask you, 'how do I know if its CBD or the massage that's having an effect?'

It's a great question, because CBD and massages share many of the same benefits. What you can expect though, is CBD to compound some of the benefits that already come from a massage, such as relaxation.

The great thing about using CBD topically, through **the skin is its far more bioavailable than when its taken internally**. CBD gets broken down by the liver if it's allowed to enter the bloodstream, meaning only a fraction of it is actually bioactive. When applied to a certain bodily area, topical CBD can have a more targeted and profound effect than when ingested.

When it comes to using CBD on the skin, there are two ways in which it can have a benefit. They are both direct and indirect.

Direct Effects

The obvious effects you can expect to see here are through and on the skin. For skin conditions, rashes or swelling. These claims aren't just pulled out of thin air, they're backed by scientific studies using CBD.

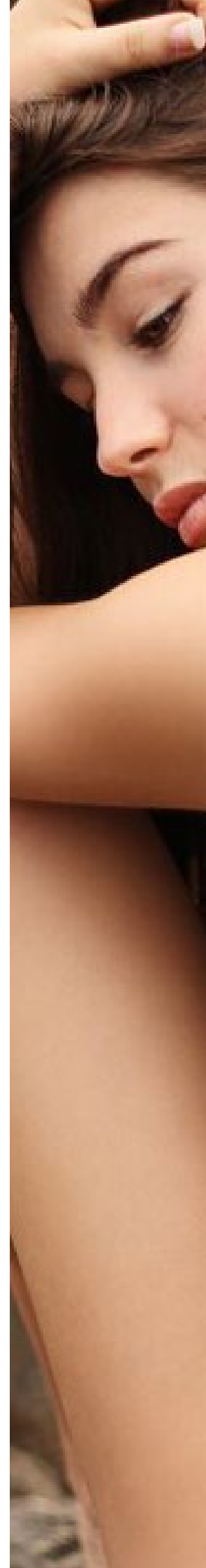
CBD & Anti-Ageing

CBD is the perfect solution for skin care, because it's an extremely potent antioxidant. This is a big deal because antioxidants are just what's needed to combat the processes that lead to visible signs of aging.

Oxidative stress is one such process, which damages skin cells (keratinocytes) producing wrinkles, dullness and skin tone issues. Certain skin diseases also involve an unhealthy amount of oxidative stress, so combating this process is vital for vibrant skin.

Antioxidants like CBD combat this process to protect the skin on many fundamental levels.

A study found that after applying CBD to skin cells (keratinocytes) and mice, it





“The skin has receptors for cannabinoids, and the most promising interactions seem to be anti-inflammatory, antioxidant activity and sebum regulation”
- Dermatologist Dr Howard Murad

encouraged processes involved in **wound healing, skin development, repair and maintenance.**

Secondly, CBD increased the expression of heme oxygenase 1 (HMOX1), a gene involved in antioxidant defence (Cesares et al., 2020).

CBD also activates Nrf2 (turns on genes) which increases production of antioxidant enzymes superoxide dismutase and thioredoxin reductase, which are used for combating oxidative stress (Jastrzab et al., 2019).

This may help protect against skin diseases, and promote healthy vibrant skin (Cesares et al., 2020).

Also, oxidative stress, as well as inflammation is increased in response to UV radiation, so CBD may also lend benefit to protecting from sunburn.

Oxidative stress is also a culprit in driving other health conditions and diseases, which is why using oral drops is also a powerful way to combat it inside the body.

Inflammation, CBD & The Skin

Inflammation is at the heart of many health conditions, and the skin is no exception.

Skin conditions, including dermatitis and psoriasis also involve a degree of inflammation. This disturbs the balance of healthy cell cycles that keep the skin youthful and vibrant.



Keeping inflammation under control is also vital for combating skin aging.

Inflammation is also painful, and can also cause aggravation and discomfort where it is active.

The ECS in the skin usually helps control inflammation, but sometimes could do with a hand from other cannabinoids like CBD.

CBD can talk to immune cells via cannabinoid receptors CB1 and CB2, and tell them to chill out on the inflammation.

It does this by reducing the levels of proinflammatory messengers (cytokines) and increasing the levels of anti-inflammatory cytokines, which brings inflammation back into balance.

CBD also stops inflammation before it has even begun, by inhibiting cues (NfKB and COX enzymes) that awaken inflammatory messengers (Pellati et al., 2018).

A CBD-rich ointment was found to boost skin hydration (by moisturizing and preventing water loss), elasticity in the skin, and quality of life in people with psoriasis and dermatitis (Palmieri et al., 2019).

Since inflammation is also a driver of aging, and CBD is a potent anti-inflammatory, it has the potential to arrest the ageing process (of the skin) and keep it looking healthy.

Topical CBD & Pain

CBD is most famously used to treat pain, and that goes for its use outside as well as inside the body.

There are pain receptors on sensory neurons in the layers under the epidermis, which can be influenced by the presence of CBD.

Usually the ECS keeps pain at bay, but may need help from time to time. CBD helps by activating pain receptors on sensory neurons (TRPV1, CB1 & 2) which corresponds to a reduction in pain signalling in the central nervous system.

Likewise, CBD can also reduce pain by turning down levels of inflammation, which is the case in conditions such as arthritis. CBD has been found to reduce inflammatory messengers, joint swelling and signs of inflammation related pain in rats given a CBD gel (Hammell et al., 2016).

A recent study also confirmed that CBD may help with muscular soreness (Nitecka-Buchta et al., 2019). CBD also has myorelaxant (muscle relaxation) properties, which may help reduce pain via reducing muscular tension.

CBD & Acne

Acne is a result of the build up of dirt, oil, and improperly recycled skin cells which leads to bacterial overgrowth and red blemishes.

The sebaceous gland is responsible for secreting oils onto the skin, however in acne this process may be disturbed. There are CB2 receptors on this gland, which enables oil production to be regulated by CBD.

A study in human skin cells found that

CBD inhibited oil production from these glands, as well as reduced any inflammation surrounding them

(Olah et al., 2014). Besides these effects, CBD is also antibacterial which adds extra anti-acne support.

CBD & Recovery

CBD may have a place in supporting recovery from injury, or hard training. There are signs it may be beneficial, so it will be interesting to see what more clinical research digs up. Most evidence is based on mechanistic science right now.

CBD can deliver fantastic results for acne by soothing the skin & balancing excess oil production

We Celebrity facialist
Michaela Bolder

CBD is what's known as a vasodilator - it can increase the flow of blood by widening blood vessels. This effect has been clinically proven (Jadoon et al., 2017).

What's missing is a direct effect of CBD on muscle recovery.

Theoretically, CBD can facilitate muscle recovery by encouraging greater flow of oxygen and nutrient rich blood to muscles, if applied directly to that area.

There are receptors below the surface of the skin, in the epidermis and subcutaneous layer that control blood vessels. The specific receptor is known as TRPV1, and when activated can widen blood vessels and encourage greater blood flow. CBD is an activator of this receptor, and its how it has this effect as a vasodilator.

Bacteria, Fungi, CBD & The Skin

The microbiome, which is a collection of microbes including bacteria and fungi, are key players in maintaining healthy skin.



“CBD coupled with stretching, icing, and foam rolling is a common treatment plan for tendonitis injuries about the knee, such as iliotibial band syndrome.”

- Charles Bush-Joseph, MD



Microbes play an incredibly important role in many aspects of skin health, in a way which preserves its functions like immune defence and skin barrier permeability. If the usual balance of microbes on the skin becomes disturbed, these processes also are, which may lead to infections and skin conditions such as Psoriasis (Stehlikova et al., 2019).

Using common cosmetic products which can contain synthetic chemical ingredients are thought to disrupt the microbial balance of the skin, and ironically do the exact opposite to what they are touted for.

Luckily, we have CBD as well as a host of supporting natural cosmetic ingredients.

CBD has shown antibacterial and antifungal activities

(Glodowska 2016), (Appendino et al., 2008). This means that when certain bacteria or fungi are overgrown, and driving skin conditions, CBD may help bring their levels back in check.

CBD was also found to be as powerful as commonly used antibiotics (ASM 2019), which speaks volumes as to the potency of CBD, and why so many people are swearing by it for use on skin conditions.

Indirect Effects

The indirect effects are tied to the direct effects. Take pain and muscle relaxation for example; by having less pain and more relaxation in the body, this may improve psychological aspects of health such as depression, anxiety and sleep.

A massage certainly helps with these, but again it's CBD that's also building on top of these effects from a massage.

It doesn't stop there, either. Cannablissful massage oils are also a cocktail of delightful aromas from some of nature's finest essential oils. These oils have been chosen specifically for their therapeutic effects, powerful aromas and subsequent ability to relax, soothe and energise.

That's what makes Cannablissful massage oils so great - the synergy between CBD and aromatic essential oils. Together, they provide an indirect way of soothing, relaxing and energising weary, stressed and overburdened minds and bodies.

How CBD Can Benefit Your Bottom Line

There are many ways to make CBD work for you, as well as your clients.

First and foremost, we've heard some great feedback from existing therapists that giving CBD massages also helps **relieve pain** and discomfort in their hands, after giving massages all day - now that's a win win if you ask me!

You can also stretch out your CBD to be profitable for your practice. Let me give you an example.

You'd typically use 20ml of Cannablissful massage oil for a full body massage. That also gives you a decent serving of CBD, around 20mg.

A 200ml bottle of cannablissful costs you £39, and contains 20 full body massages. From each treatment, you stand to be able to charge an additional £10-30 for the use of CBD. So, you nearly end up paying for your bottle of cannablissful from just one massage!

Total that up to when you finish your bottle, that's an extra £1-300 that you've earned, just from using CBD. CBD is a **premium** product, and people

are willing to pay the extra to drink in the benefits, especially if they stand to alleviate aches and pains that plague them daily.

Lots of people are riding the CBD wave at the moment, for good reason - it's awesome! What that also means is that by offering CBD massages, you stand to win more treatments as a result. More treatments not only means more money, but more **experience**, more people helped and more exposure for you and your practice.

By being one of the first wave of therapists to be offering CBD massages, you have the first mover advantage over a lot of existing therapists in the game. More time for you to get ahead of the curve, learn and experience more about CBD and its benefits.

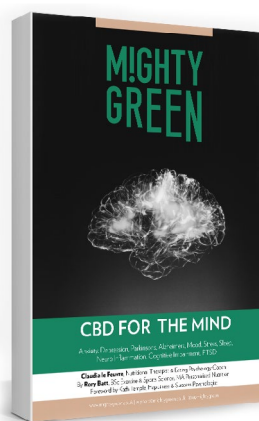
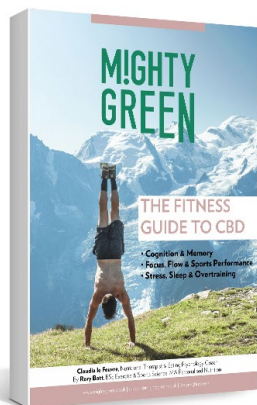
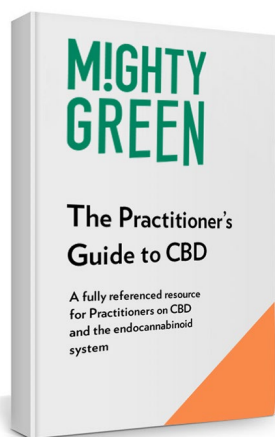
CBD is also a way to expand your expertise and understanding of the health and beauty space. It's not the first thing to explode onto the wellness scene, and it won't be the last. But one thing's for sure, CBD is going to stick around for a while, so it's **worth investing** in learning more about it, and using it hands on!

“

the synergy between CBD and aromatic essential oils... is soothing, relaxing and energising...

”

Free Tools For Your Clinic



Client Intake Form
 Training For Therapists
 Weekly Emails
 Regular Online Seminars
 Training Certification Form



Sign up here: www.mightygreen.co.uk/spa

This book is all about CBD working through the skin from the outside in. Get in touch to learn more about CBD Drops working from the inside out. support@mightygreen.co.uk

CANNABLISSFUL

This is to certify that

.....

Has completed the
Cannablissful CBD Massage Training

Signed by..... Date.....

www.mightygreen.co.uk

CANNABLISSFUL

Name: _____ Email: _____ Telephone: _____ Date of birth: _____

MEDICAL INFORMATION

Do you have a medical condition?
 Yes No

Are you taking any medications?
 Yes No

Is there anything I need to know?
 (Feel free to tell your therapist if you prefer not to write it)

Are you pregnant? Yes No Are you breastfeeding? Yes No

By signing below, you agree to the following: I have completed this form to the best of my ability and knowledge.

Client signature: _____ Date: _____ Therapist signature: _____ Date: _____

DISCLAIMER: You must inform your therapist if you have any of the following conditions which are contraindicated: open wounds or sores, cancer

For therapists use only:
 Soothe Relax Energise

How To Use Topical CBD

Using CBD topically requires a slightly different strategy to when it's used orally. When applied through the skin, CBD doesn't tend to have widespread effects in the body, but acts **locally**.

It's still a good idea to bring awareness to how much you are using, and what **doses** you apply. This way you can see how much product you need to provide you with you or your clients desired effects.

Start out to find the minimum effective dose; that is the smallest serving that provides you with the effects you are looking for. This way you make **efficient use** of your CBD whilst getting what you want out of it.

Take the **Cannablissful Balm** for example; the 30ml balm contains 10mg of bioactive CBD per ml of product.

Start off by using 2.5ml, which looks like a small dab on the end of your finger. That amounts to 25mg of CBD. See how that works for your desired outcome, and increase by 0.5ml each time until you experience your **desired effects**.

It's a similar method with the **Cannablissful Massage Oils**. They provide 1mg bioactive CBD / ml of oil.

That's an easy ratio to work with, as you can increase by increments of (10ml) 10mg CBD each time you want to explore higher doses.

We suggest starting with 10ml of oil, which can actually go quite a long way when it's **spread out** over a particular body part or area. You can then increase the serving by 10ml each time to see how you respond to higher doses of CBD.

Topicals are neither fast nor slow onset, but somewhere in between (30 -120 minutes) (MacCallum and Russo 2018). Their absorption depends on other ingredients in the formula, since some can influence the rate of CBD absorption. For example, some terpenes such as **Limonene** can boost the **absorption** of substances like CBD (Ota et al., 2003).

Cannablissful oils use additional ingredients such as Limonene and jojoba seed oil for this reason, to allow the CBD to **penetrate** the skin effectively, and work its **magic** on the tissues within. They have a high bioavailability since CBD doesn't readily enter the bloodstream and is not processed by the liver. But that also means their effects are **localised**, so although the effects are concentrated, they are limited to one area. This is an advantage if you're treating a specific area of your body.

A few examples of where you'd use topical CBD:

- Sprains
- Joint Pain
- Muscle Pain
- Tendonitis
- Psoriasis
- Dermatitis
- Infections of the skin

Some of these applications haven't been clinically proven yet, although they all involve a degree of inflammation, which CBD is well known to reduce. Anecdotally, a lot of people have found CBD to be beneficial for these applications.

So far in this book we've discussed how CBD can

be used externally, and the associated benefits. But that's just the start...

Taking CBD internally is a totally different ball game all together. Most research has been done by using CBD this way, and is where a lot of the magic happens.



Using CBD Internally

So far, there have been some encouraging findings from a handful of preliminary studies looking at CBD.

This is just the start; although there are hints of CBD supporting other health conditions such as **cancer**, **Alzheimer's**, **Parkinson's**, **diabetic complications** and **depression** in animal research (White at al., 2017), the clinical research hasn't caught up yet.

For now we have to go by what people tell us, until a congruent pattern emerges. But one thing's for sure, CBD helps take a load off, when used inside and out!

Using CBD oral drops during a massage is a way to take those feelings of **blissful creaminess** to a whole other level. It doesn't have to be a choice between the two, but a **complementary** combo for a truly awesome experience.

The evidence suggests it may be beneficial for:

- Anxiety
- Insomnia & Sleep Disorders
- Chronic Pain
- Epilepsy
- Addiction
- Multiple Sclerosis

This is just the start; although there are hints of CBD supporting other health conditions such as cancer, Alzheimer's, Parkinson's, diabetic complications and depression in animal research (White at al., 2017), the clinical research hasn't caught up yet.

Mighty Green Oral Drops are a great addition to any of the cannablissful and body care range, so you can nourish your body inside and out.



The Cannablissful Product Range

Our Massage Base Oil

We're really proud of our base oil which has a beautiful consistency and many health benefits in its own right. We have carefully formulated it to support the transport of CBD into the skin.

Hemp Seed Oil

Hemp seed oil contains a high concentration of Polyunsaturated Fats (Omega-6 and Omega-3's). They are particularly beneficial for managing levels of inflammation, which is **healing and soothing for the skin**. (McKusker and Grant-Kels 2010), (Berbis et al., 1990)

Cannabisins are other chemicals found in hemp seed oil, which also reduce inflammation, and act as antioxidants to protect the skin (Frassinetti et al., 2018), (Wang et al., 2019), (Smeriglio et al., 2016).

Hemp seed oil has been found to alleviate eczema (Callaway et al., 2005), and reduces acne, dry skin and psoriasis (Tabassum and Hamdani 2014)

Hemp seed oil is an antimicrobial, and strengthens the skin's resistance to bacterial, viral and fungal infections (Tabassum and Hamdani 2014).

Argan Oil

Naturally, argan oil is a great choice for a carrier oil. It's not just a carrier oil, though. It has many of its own benefits to add to the mix.

Its fatty composition, along with a rich nutritional composition makes it ideal for application on the skin. When used on the skin, Argan oil has been found to improve skin elasticity and skin hydration, by restoring barrier function and maintaining the water holding capacity of the skin (Lin et al., 2018).

Using argan oil has also been found to soften and relax the skin (Lin et al., 2018), which also helps enhance the delivery of topical drugs through it (such as CBD).



“

Omega-3's... are particularly beneficial for managing levels of inflammation, which is healing & soothing”

Shea Butter

Shea butter is extracted from the kernels of the sheu tree (*Vitellaria paradoxa*). **Topically, shea butter is used for hayfever, acne, arthritis, burns, dandruff, dermatitis, dry skin, eczema, insect bites, itch, muscle soreness, psoriasis, rash, scabies, scars, sinusitis, skin ulceration, stretch marks, wound healing, and wrinkled skin** (Hon et al., 2015).

Shea butter contains triterpene acetates and triterpene cinnamates that have anti-inflammatory effects. When used on the skin, triterpene esters can reduce levels of damaging inflammation.

It also contains heaps of polyphenols, like epigallocatechin gallate (EGCG) and quercetin. These are some of the compounds that can also be found in green tea. When it comes to the skin, Quercetin is thought to have skin soothing and anti-inflammatory effects which are restorative (Maranz et al., 2003).

EGCG also has its own benefits, providing skin hydration, moisture retention, and prevention of wrinkle formation, due to its antioxidant and anti-inflammatory powers (Eunji et al., 2018).

Coconut Oil

We'd be remiss to leave out one of the most widely used and well known of the oils, coconut. There's a good reason it's so popular; it's made up of about 52% to 85% medium-chain fatty acids, especially capric acid, caprylic acid, and lauric acid.

These are great antifungals and antimicrobials, which account for much of the protective qualities of coconut oil for the skin.

Coconut oil also improves skin barrier function, as well as promoting wound healing through enhancing the turnover of collagen in wounds (Lin et al., 2018). It's also a great carrier oil, since the fatty acids in coconut hold onto and deliver CBD very effectively.



great smelling oils, by using aromatherapy experts as well as the best CBD we can get our hands on.

What we've got is a broad spectrum extract, which not only contains CBD, but other beneficial cannabinoids too, all whilst keeping THC below legal limits. You'll also find a wide array of terpenes in the mix which don't just smell great, but also help cannabinoids work their magic.

Our oils are also formulated for function, which means we've considered every last detail for maximum effect. Whether you want to take a load off, seek some much needed relief or spring into action, we've got you covered.

We combine our CBD with all natural terpenes from the likes of lavender, bergamot and geranium to name a few, **to supercharge the magical effects** of our extract. Ever heard of the entourage effect? Well if you haven't you'll certainly know about it when you try our oils and balms.

Terpenes

With the CBD and combinations of essential oils, each of our blends is rich in terpenes:

Limonene is a monoterpene which is commonly found in citrus fruits, pine and mint.

Limonene, as well as other terpenes may enhance the absorption of CBD through the skin (Ota et al., 2003). **It is anti-inflammatory, has shown to accelerate wound healing and to slow aging of the skin** (d'Alessio et al., 2015).

It has also demonstrated analgesic properties (da Silveira e Sá et al., 2017).

Linalool is antiseptic, antifungal, antinociceptive, and anti-inflammatory (da Silveira e Sá et al., 2017) **and may accelerate the speed of wound healing** (Tagreed Altaei 2012).

Linalool may be useful for conditions involving pain and inflammation. Eugenol is anti-inflammatory and analgesic (Khalilzadeh et al., 2016), which may help the relief of pain in arthritis (da Silveira e Sá et al., 2017).

It's also been shown to inhibit keratitis, which may be due to its antifungal properties (Hassan et al., 2018).

Jjoba Oil

Jjoba seed oil enhances the absorption of topical drugs (Pazyar et al., 2013), which is ideal for improving the delivery of CBD through the skin.

Some studies have also shown Jjoba seed oil (Lin et al., 2018):

- Supported skin barrier repair
- Showed possible antibacterial properties
- Acted as an anti-inflammatory
- Had an antioxidant effect
- Supported wound healing
- Protected against skin ageing
- Broad spectrum hemp distillate (0.37g of 55% CBD)

CBD Distillate

We've searched far and wide for the very best CBD extract Europe has to offer. Our CBD is sourced from EU certified strains of industrial Hemp, so we know exactly where our CBD comes from, and its quality. We use Co2 extraction to obtain our CBD, which is the cleanest method and leaves no residual impurities. We've also gone the extra mile to produce super pure and



Cannablissful soothe blend has been specially formulated, by combining some of the best ingredients nature has to offer.

Soothe Blend



Geranium Essential Oil

A key constituent of our soothe blend, geranium oil is particularly good for **pain relief**. Research shows that a single topical application of rose geranium oil can significantly reduce pain in patients with postherpetic neuralgia. It appears that this effect is dose dependent, since a double dose was twice as effective (Greenway et al., 2003).

Bergamot Essential Oil

Another key player in the **soothing** mix is bergamot, known for its naturally **calming** scent. Smells can have powerful effects, and act on the limbic system in the brain which can induce physiological effects, such as release feel good chemicals **serotonin** and **dopamine**, as well as **regulate** emotions.

Bergamot essential oil, when inhaled has been shown to **reduce anxiety** (Saiyudthong and Marsden 2010), and induce a sense of **positivity** (Xuesheng et al., 2017). It's also thought to ease pain when inhaled, as well as **improve** mood.

When applied to the skin, Bergamot also helps fight skin infections (Lazarotto et al., 2018) with its **antifungal** and **antibacterial** effects.

Summary of Effects

Analgesic (Pain relieving)
Anti-anxiety
Soothes and regenerates skin



Lavender Essential Oil

This is perhaps one of the most well known and well studied ingredients in our soothe blend. Much like bergamot, the scent of lavender can have profound effects on mental and physical wellbeing when inhaled. Inhaling lavender oil has been found to **improve** subjective ratings of sleep quality (Lewith et al., 2005).

Lavender oil aromatherapy may reduce the time it takes to fall asleep, **improve** sleep, and reduce sleepiness at awakening. When combined with a great massage, you'll bet your chances of getting a good night's sleep are increased.

Lavender oil may also **soothe** the pain that comes with a migraine, as well as pain in general (Sasanejad et al., 2012).

Most well known for its psychological effects, Lavender has a soothing effect on the mind, and has been found to improve **psychological wellbeing** when inhaled. It doesn't stop there, Lavender also reduces stress and anxiety, due to its naturally **soothing** constituents.

One of those is the terpene, Linalool. This is well known for its **calming** effects on the mind, due to its ability to enhance the signalling of the calming GABA neurotransmitter in the brain (Harada et al., 2018).





Energise Blend



Lemon Essential Oil

Lemon is used in aromatherapy for its uplifting scent. One of the main constituents that gives lemon its smell is the terpene **Limonene**, which also has some pretty great effects when inhaled.

Limonene was found to boost two brain chemicals, **dopamine** and **serotonin** which may account for its uplifting and anti-anxiety effects seen after inhaling it (Shah et al., 2011).

It's also a great stimulator of **creativity**, **concentration**, attention and cognitive performance (Dosoky and Setzer 2018). These are all typical effects of a **stimulating** aroma, which is great for giving you that extra boost.

Peppermint Essential Oil

Peppermint oil is a complex mixture of compounds, including 30% to 70% menthol, 15% to 30% menthone, 4% to 32% menthyl acetate, and 1% to 4% pulegone.

When applied topically, peppermint oil (10% Menthol) reduced **neuropathic pain** for 4-6 hours (Davies et al., 2002).

Patients with chronic pruritus (itch) using peppermint oil had significant improvement in all symptoms after 2 weeks (Elsaie et al., 2016).

Summary of Effects

- Uplifting
- Analgesic (Pain Relieving)
- Anti-inflammatory
- Stimulating



Peppermint oil is also said to have stimulating effects, which has been shown by reducing sleepiness (Ilmberger et al., 2003). This may also be coupled to peppermints ability to enhance aspects of mental performance when it is inhaled, such as improved cognition, **attention**, **alertness**, and tactile performance (Barker et al., 2003).

Eucalyptus Essential Oil

Eucalyptus oil, which is made from the leaves and branches of eucalyptus, contains 60% to 90% eucalyptol.

Eucalyptol is an **anti-inflammatory** and **analgesic** (Silva et al., 2003). One of the most popular topical applications for eucalyptus oil is for **inflammation** of the skin, and even for arthritis. We've got eucalyptol to thank for that!

Inhaled Eucalyptus oil was found to relieve pain following knee replacements surgeries when used 3 days post op (Jun et al., 2013). It also increases circulation when applied to the skin, suggesting it may **ease muscle soreness** as well (Hong and Shellock 1991).

Eucalyptus oil is also **antibacterial**, **antifungal** and **antiviral** (Takahashi et al., 2004), (Brezáni et al., 2018).

Lavender Essential Oil

See soothe blend





Chamomile Essential Oil

Chamomile is well known for its **calming** and relaxing qualities. It's usually taken as a tea or extract. But it can also be used as an oil, and is popular in aromatherapy. In fact, a blend of Roman Chamomile, Lavender and Neroli was found to **reduce anxiety levels** in patients in **intensive** care (Cho et al., 2013).

Like Lavender, chamomile also helps promote better sleep. A case study where roman chamomile was inhaled, volunteers experienced more drowsiness and **calmness**, in addition to reducing the levels of adrenocorticotrophic **hormone**, which when lower helps promote sleep (Moss et al., 2006).

Chamomile contains compounds which act like benzodiazepine drugs, which are well known relaxants and also have **hypnotic** like effects. They share a similar mechanism of action, both by enhancing the chemical signalling in the brain and body which induces relaxation - **the GABA** system.

Lavender Essential Oil

Perhaps one of the most well known and well studied ingredients in the relax blend is Lavender.

Much like chamomile, the scent of lavender can have profound pro-relaxation effects when inhaled, to **ease the mind** as well. The body is already getting some love from a massage, so the mind gets some attention too.

Inhaling lavender oil has been found to improve subjective ratings of sleep quality (Lawith et al., 2005). Lavender oil aromatherapy may reduce the time it takes to fall asleep, **improve** sleep, and reduce sleepiness at awakening. When combined with a great massage, your chances of getting a good night's sleep are increased.

College students inhaling lavender oil found their sleep was better, as well as increasing their



next day energy and vibrancy (Lillehei et al., 2015). Lavender oil may also soothe the pain that comes with a migraine, as well as pain in general (Sasannejad et al., 2012).

Lavender has a **naturally relaxing effect** on the mind, and has been found to improve psychological wellbeing when inhaled. It doesn't stop there, Lavender also reduces stress and anxiety, due to its calming constituents.

After 2x 15 minute aromatherapy sessions a week for 4 weeks, Lavender oil was found to reduce levels of anxiety and depression in **postpartum** women (Conrad and Adams 2012).

The terpene, Linalool is well known for its calming effects on the mind, due to its ability to enhance the signalling of the calming GABA neurotransmitter in the brain (Harada et al., 2018).

Jasmine Essential Oil

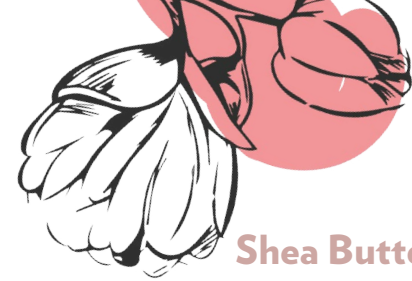
Jasmine is best known for its silky smooth aroma. As well as smelling great, it also has some functional properties that lend well to relaxation. The aroma of jasmine has been shown to slow down **heart rate** and improve mood (Kuroda et al., 2005). Another study found that an aromatherapy massage with jasmine improved the mood of participants afterwards (Hongratanaworakit 2010).

Again, the effects of jasmine may be due to the impact that aromas can have in the limbic system in the brain, the place where emotions arise. This area also corresponds to the nervous system, which may enable physiological changes after smelling the oil, like physical relaxation.

Relax Blend

Summary of Effects

Sleep inducing
Analgesic
Mood enhancing
Anti-anxiety



Shea Butter + Argan Oil + CBD Distillate

See base oil

Beeswax

Beeswax, mixed with honey and olive oil reduced psoriasis and dermatitis after 2 weeks (Al-Waili 2003).

Beeswax, mixed with honey and olive oil reduced tinea versicolor (fungal infection) in 86% patients after 4 weeks (Al-Waili 2004).

Effects of Beeswax are: (Fratini et al., 2016):

Antibacterial | Antifungal
Anti-inflammatory | Antioxidant

Orange Essential Oil

Orange peel contains essential oils and terpenes, the main one being Limonene which is the most abundant. Much of the psychological benefits of orange essential oil can be attributed to Limonene, which has a strong influence on hormone and neurotransmitter activity (Zhang et al., 2019).

When combined with massage therapy with lavender and bergamot, sweet orange improves symptoms of depression in 65% of patients when compared with control (Lehmer et al., 2005). Even without a massage, inhaling the same oils twice weekly improves symptoms of depression in 55% of patients when compared with control (Xiong et al., 2018).

Inhaling sweet orange and lavender oil nightly before bed for one month improves overall sleep quality by 72% and fatigue by about 78% compared to no treatment (Muz and Taşçı 2017).

Using up to 10 drops of sweet orange essential oil in aromatherapy helps prevent some anxiety and tension associated with stressful tasks (Goes et al., 2012)

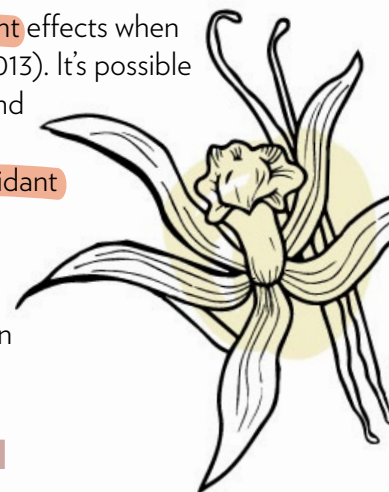


Vanilla Essential Oil

The scent of vanilla is sweet, relaxing and uplifting which is why it's an essential ingredient in the bliss balm.

A component of vanilla, vanillin has been found to have antidepressant effects when taken orally (Shoeb et al., 2013). It's possible this is why a lot of people find smelling vanilla relaxing.

Vanilla is also a great antioxidant and antimicrobial. These properties make it great for topical application, to help maintain healthy, vibrant skin (Fitzgerald et al., 2004).



Arnica Essential Oil

Very few things could be as blissful as pain relief, which is why arnica is a great ingredient. Arnica is touted as an analgesic for its effects on pain, much of which is due to its sesquiterpene lactones.

Arnica gel was found to be as effective as ibuprofen for reducing the intensity of pain and improvement in hand function in osteoarthritis (Widrig et al., 2007). The same gel also reduced pain, stiffness, and restriction-of-function compared with baseline symptom scores (Knuesel et al., 2002).

Arnica may also be effective for reducing (post operation) bruising and swelling. (Simsek et al., 2016). These effects may be due to the anti-inflammatory potential that arnica holds, again thought to be due to its sesquiterpene lactones.

Summary of Effects

Analgesic	Relaxing
Anti-Inflammatory	Antimicrobial
Antidepressant	Antioxidant





Magnesium Balm

Magnesium Chloride

Magnesium salts are famously added to baths to enhance relaxation and tend to **muscle soreness**. That's why pairing CBD with magnesium is a synergy of nature, for tired and aching bodies.

There's no clinical evidence for topical magnesium's effectiveness for muscle relaxation yet. However, a magnesium cream was found to **enhance serum** and urinary magnesium levels (Kass et al., 2017). This may mean topical application of magnesium may indeed provide a legit supply to act on tense muscles.

Topical magnesium has been shown to also have a beneficial effect on a particular type of skin discolouration called **melasma**. Using a magnesium cream was met with an excellent response, with significant improvements in amount of skin discoloured after 12 weeks (Shaikh et al., 2014).

Camphor

Camphor is FDA-approved for topical use as an analgesic and **anesthetic**. It's used in many topical products for pain, **insect stings** and bites, minor burns, and **hemorrhoids**.

A topical cream containing camphor, glucosamine sulfate, and chondroitin sulfate reduces the severity of symptoms of **osteoarthritis** by ~ 50% (Cohen et al., 2003). This is largely due to camphor's counterirritant properties. It stimulates nerve endings in the skin, which may mask deeper **visceral pain** with milder pain at the surface of the skin.

Camphor also reduces inflammation, which may further aid in **pain relief**. It's also an anti-fungal, which can help preserve skin health through staving off infections and skin irritation.

Summary of Effects

Analgesic
Anti-inflammatory
Anti-itch

Anti bruising +
Swelling
Relaxing

Camphor is also FDA approved for reducing sensations of itch, otherwise known as **pruritus** (Rub 1994).

Cedarwood

Cedarwood has anti-inflammatory and **antimicrobial** properties, which may be helpful for maintaining healthy skin. Its proven effective against acne (Hassoun et al. 2016), but may also be beneficial for other skin conditions such as **eczema**.

Cedrol, a major constituent of cedarwood oil was found to have **sedative** effects when inhaled (Kagawa et al. 2003). In aromatherapy, cedarwood is known for its **stress relieving** effects. Its been found to enhance relaxation and **reduce anxiety** in animals (Zhang et al., 2018).

Frankincense

The essential oil of frankincense is used as an **analgesic** both topically and by inhalation.

In aromatherapy, frankincense is thought to stimulate a **parasympathetic** response through its smell, encouraging relaxation at a deep level, which alters **perception of pain**.

The main constituent of frankincense is boswellic acid, which is a terpene with analgesic, **tranquilising** and anti-bacterial effects. Frankincense also quells inflammation on may levels, which is responsible for some of its pain reducing effects (Al-Yasiry 2016).

Hemp Seed Oil & Shea Butter

See Base oil

Beeswax

See Bliss Balm



A Deeper Dive into CBD, The ECS & The Skin

In order to understand how CBD works on and through the skin, we've gotta take a look at the system it interacts with that's responsible for its effects.

The human body is home to a widespread system that maintains equilibrium throughout its entirety.

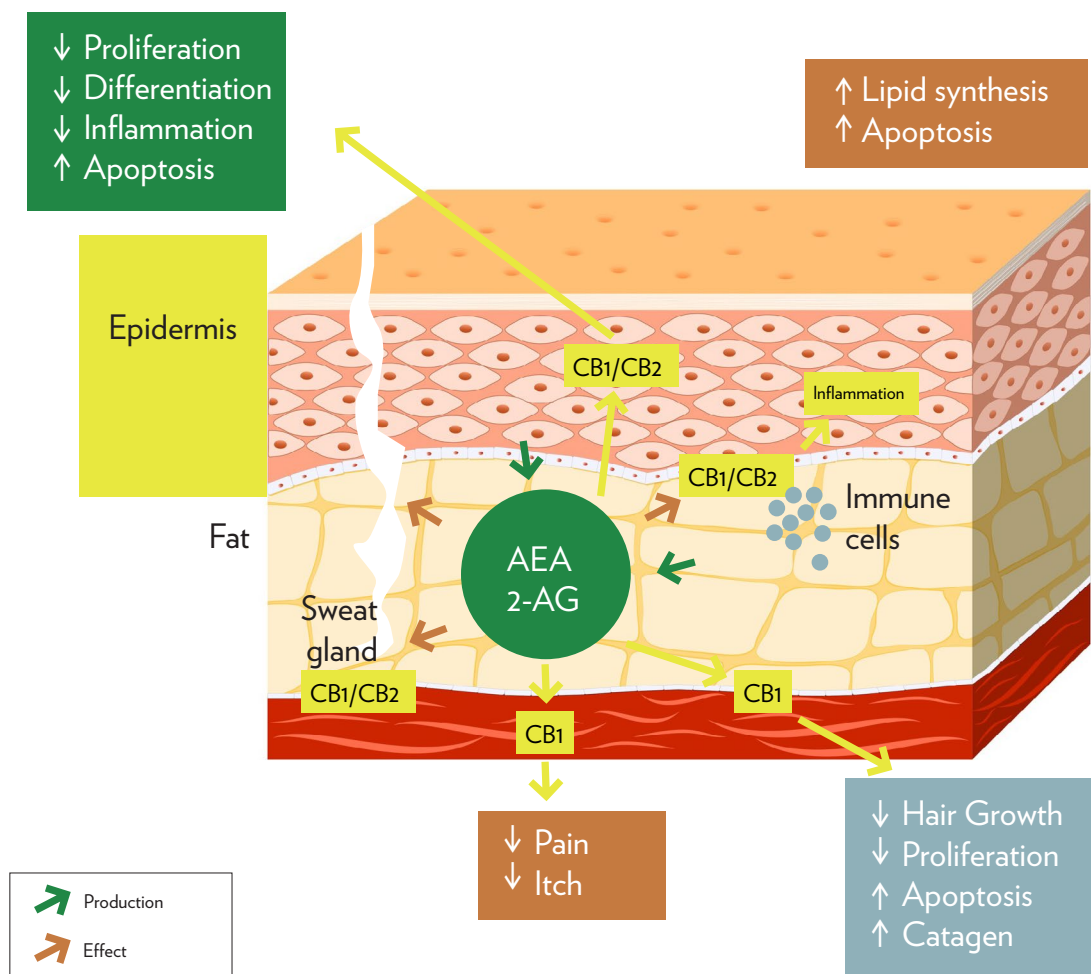
This system is responsible for balancing core bodily processes to maintain health and prevent disease at many levels, including the skin. It's called the **Endocannabinoid System (ECS)**.

It's a mouthful right!?

The ECS uses chemical messengers called **Endocannabinoids** to continuously ensure balance is maintained across bodily systems and processes. An example would be telling the immune system to increase or decrease inflammation in response to an external signal.

To do this, endocannabinoids turn on switches across the body, which are called **cannabinoid receptors (CBR's)**. When turned on, these switches cause changes in biological function such as inflammation.

THE ECS IN AND UNDER THE SKIN



The ECS In & Under the Skin

Both the dermis and the epidermis are home to cannabinoid receptors (CB1 & CB2). The two main endocannabinoids 2-AG and AEA activate these receptors.

This is how the ECS naturally maintains skin health, inflammation, pain sensitivity and blood flow through cannabinoid and other, non-cannabinoid receptors.

Interestingly, the ECS actually controls how skin tissues regenerate, and ensures they are well maintained. The ECS delicately balances the growth and recycling of skin cells to maintain healthy skin.

In a similar way, the ECS also instructs a healthy balance in levels of inflammation. It usually ensures an appropriate response to things like infections, skin irritants and even foods and/or substances that can lead to skin reactions.

This is done through activation of cannabinoid (CB1 & CB2) receptors by endocannabinoids on epidermal cells, which regulate:

- Normal function of the skin barrier
- Inflammatory tone (healthy vs excessive levels of inflammation)
- Sensation of pain
- Sensation of Itch
- Cell cycle architecture - differentiation, proliferation and apoptosis

When CB1 or CB2 are activated, the functions above are altered.

Under normal conditions the skin's ECS maintains homeostasis. That involves preventing the activation of the immune system when its not required, ensuring the skin barrier is tight against microbes, and turning over old skin cells for new ones.

However, sometimes the ECS can become dysregulated, and lose its ability to regulate inflammation, cell cycle architecture, skin barrier permeability, pain.....etc. The result is greater risk of skin, itch and pain conditions.

For example, in certain skin diseases such as dermatitis and psoriasis, epidermal keratinocyte (skin cell) proliferation is increased, and cell differentiation reduced as well as increased levels of inflammation (Jeong et al., 2019). This means the ECS is dysregulated in these conditions, as the processes that ensure healthy skin function are running awry.

Similarly, skin barrier permeability and apoptosis (programmed cell death) are out of whack in similar conditions. For example, stimulating apoptosis helps reduce acne (Jeong et al., 2011), and the skin barrier is dysfunctional in psoriasis (Shigetoshi 2015).

There are a few things (that we know about), like infections and environmental toxicity which can cause the ECS to become disrupted in the skin. It may also be that certain individuals have ECS imbalance as a result of a negative synergy between

their (cannabinoid) genetics, lifestyle and environmental factors.

When an ECS is over or underactive in the skin, it can cause problems.

How CBD Helps

This is where CBD comes in; it helps support an ECS that's dysregulated, helping to rebalance it so it can perform its protective roles once again.

CBD can be thought of as a tonic regulator of the ECS, both buffering over or underactive ECS activity in an attempt to restore homeostasis in and under the skin.

1

CBD can increase ECS activity by inhibiting the enzyme(s) which breakdown endocannabinoids, and temporarily increases their availability in synapses (Papagianni and Stevenson 2019). This alters neurological function.

2

At the same time, when endocannabinoids are overproduced and cause excessive CB1 receptor activation, CBD steps in to block the effects of too many endocannabinoids (Chung et al., 2019).

This see-saw mechanism is how CBD acts as an adaptogen, to balance each and every individual's ECS in the way they most need, whether it's under or overactive.

There's plenty more to CBD than just its effect on the ECS, but given the role the ECS plays in maintaining skin health, we will largely focus on this relationship.

Alopecia areata
Effluvium
Acne
Seborrhea

Skin tumours
Psoriasis
Hirsutism
Dry skin
Dermatitis
Pain
Itch



To ↓ ECS tone

The balance:
Fine-tuned skin ECS tone



To ↑ ECS tone

(No Title). (n.d.). <https://doi.org/10.1155/2018/1691428>

(PDF) Cannabis sativa L. and its antimicrobial properties – A review. (n.d.). Retrieved February 24, 2020, from https://www.researchgate.net/publication/317185536_Cannabis_sativa_L_and_its_antimicrobial_properties_-_A_review

Al-Waili, N. S. (2003). Topical application of natural honey, beeswax and olive oil mixture for atopic dermatitis or psoriasis: Partially controlled, single-blinded study. *Complementary Therapies in Medicine*, 11(4), 226–234. [https://doi.org/10.1016/S0965-2299\(03\)00120-1](https://doi.org/10.1016/S0965-2299(03)00120-1)

Al-Yasiry, A. R. M., & Kiczorowska, B. (2016). Frankincense – Therapeutic properties. *Postępy Higieny i Medycyny Doświadczalnej*, 70, 380–391. <https://doi.org/10.5604/17322693.1200553>

Altaei, D. T. (2012). Topical lavender oil for the treatment of recurrent aphthous ulceration. *American Journal of Dentistry*, 25(1), 39–43. <http://www.ncbi.nlm.nih.gov/pubmed/22558691>

Anti-inflammatory and skin repair treatments with d-limonene | PRIME Journal. (n.d.). Retrieved February 24, 2020, from <http://www.prime-journal.com/anti-inflammatory-and-skin-repair-treatments-with-d-limonene/>

Appendino, G., Gibbons, S., Giana, A., Pagani, A., Grassi, G., Stavri, M., Smith, E., & Mukhlisur Rahman, M. (n.d.). Antibacterial Cannabinoids from Cannabis sativa: A Structure-Activity Study. <https://doi.org/10.1021/np8002673>

Aromatherapy: The Doctor Of Natural Harmony Of Body and Mind | Insight Medical Publishing. (n.d.). Retrieved February 25, 2020, from <http://www.ijdr.in/drug-development/aromatherapy-the-doctor-of-natural-harmony-of-body-mind.php?aid=5529>

Barker, S., Grayhem, P., Koon, J., Perkins, J., Whalen, A., & Raudenbush, B. (2003). Improved performance on clerical tasks associated with administration of peppermint odor. *Perceptual and Motor Skills*, 97(3 1), 1007–1010. <https://doi.org/10.2466/pms.2003.97.3.1007>

Brezáni, V., Leláková, V., Hassan, S. T. S., Berchová-Bímová, K., Nový, P., Klouček, P., Maršík, P., Dall'Acqua, S., Hošek, J., & Smejkal, K. (2018). Anti-infectivity against herpes simplex virus and selected microbes and anti-inflammatory activities of compounds isolated from *Eucalyptus globulus* labill. *Viruses*, 10(7). <https://doi.org/10.3390/v10070360>

Callaway, J., Schwab, U., Harvima, I., Halonen, P., Mykkänen, O., Hyvönen, P., & Järvinen, T. (2005). Efficacy of dietary hempseed oil in patients with atopic dermatitis. *Journal of Dermatological Treatment*, 16(2), 87–94. <https://doi.org/10.1080/09546630510035832>

Camphor revisited: focus on toxicity. Committee on Drugs. American Academy of Pediatrics. (1994). *Pediatrics*, 94(1), 127–128. <http://www.ncbi.nlm.nih.gov/pubmed/8008522>

Cannabidiol is a Powerful New Antibiotic | ASM.org. (n.d.). Retrieved February 24, 2020, from <https://www.asm.org/Press-Releases/2019/June/Cannabidiol-is-a-Powerful-New-Antibiotic>

Casares, L., García, V., Garrido-Rodríguez, M., Millán, E., Collado, J. A., García-Martín, A., Peñarando, J., Calzado, M. A., de la Vega, L., & Muñoz, E. (2020). Cannabidiol induces antioxidant pathways in keratinocytes by targeting BACH1. *Redox Biology*, 28, 101321. <https://doi.org/10.1016/j.redox.2019.101321>

Chung, H., Fierro, A., & David Pessoa-Mahana, C. (2019). Cannabidiol binding and negative allosteric modulation at the cannabinoid type 1 receptor in the presence of delta-9-tetrahydrocannabinol: An in Silico study. *PLoS ONE*, 14(7). <https://doi.org/10.1371/journal.pone.0220025>

Cohen, M., Wolfe, R., Mai, T., & Lewis, D. (2003). A randomized, double blind, placebo controlled trial of a topical cream containing glucosamine sulfate, chondroitin sulfate, and camphor for osteoarthritis of the knee. *The Journal of Rheumatology*, 30(3), 523–528. <http://www.ncbi.nlm.nih.gov/pubmed/12610812>

Conrad, P., & Adams, C. (2012). The effects of clinical aromatherapy for anxiety and depression in the high risk postpartum woman - A pilot study. *Complementary Therapies in Clinical Practice*, 18(3), 164–168. <https://doi.org/10.1016/j.ctcp.2012.05.002>

Davies, S. J., Harding, L. M., & Baranowski, A. P. (2002). A novel treatment of postherpetic neuralgia using peppermint oil. *Clinical Journal of Pain*, 18(3), 200–202. <https://doi.org/10.1097/00002508-200205000-00011>

de Cássia da Silveira e Sá, R., Lima, T. C., da Nóbrega, F. R., de Brito, A. E. M., & de Sousa, D. P. (2017). Analgesic-like activity of essential oil constituents: An update. In *International Journal of Molecular Sciences* (Vol. 18, Issue 12). MDPI AG. <https://doi.org/10.3390/ijms18122392>

Dosoky, N. S., & Setzer, W. N. (2018). Biological activities and safety of citrus spp. Essential oils. In *International Journal of Molecular Sciences* (Vol. 19, Issue 7, p. 1966). MDPI AG. <https://doi.org/10.3390/ijms19071966>

Effect of Eucalyptus Oil Inhalation on Pain and Inflammatory Responses after Total Knee Replacement: A Randomized Clinical Trial. (n.d.). Retrieved February 25, 2020, from <https://www.hindawi.com/journals/ecam/2013/502727/>

Effects of Aromatherapy on the Anxiety, Vital Signs, and Sleep Quality of Percutaneous Coronary Intervention Patients in Intensive Care Units. (n.d.). Retrieved February 25, 2020, from <https://www.hindawi.com/journals/ecam/2013/381381/>

Elsaie, L. T., El Mohsen, A. M., Ibrahim, I. M., Mohey-Eddin, M. H., & Elsaie, M. L. (2016). Effectiveness of topical peppermint oil on symptomatic treatment of chronic pruritus. *Clinical, Cosmetic and Investigational Dermatology*, 9, 333–338. <https://doi.org/10.2147/CCID.S116995>

Fitzgerald, D. J., Stratford, M., Gasson, M. J., Ueckert, J., Bos, A., & Narbad, A. (2004). Mode of antimicrobial of vanillin against *Escherichia coli*, *Lactobacillus plantarum* and *Listeria innocua*. *Journal of Applied Microbiology*, 97(1), 104–113. <https://doi.org/10.1111/j.1365-2672.2004.02275.x>

Frassinetti, S., Moccia, E., Caltavuturo, L., Gabriele, M., Longo, V., Bellani, L., Giorgi, G., & Giorgetti, L. (2018). Nutraceutical potential of hemp (*Cannabis sativa* L.) seeds and sprouts. *Food Chemistry*, 262, 56–66. <https://doi.org/10.1016/j.foodchem.2018.04.078>

Frattini, F., Cilia, G., Turchi, B., & Felicioli, A. (2016). Beeswax: A minireview of its antimicrobial activity and its application in medicine. In *Asian Pacific Journal of Tropical Medicine* (Vol. 9, Issue 9, pp. 839–843). Elsevier (Singapore) Pte Ltd. <https://doi.org/10.1016/j.apjtm.2016.07.003>

Geneva. (n.d.). CANNABIDIOL (CBD) Pre-Review Report Agenda Item 5.2 Expert Committee on Drug Dependence Thirty-ninth Meeting.

Goes, T. C., Antunes, F. D., Alves, P. B., & Teixeira-Silva, F. (2012). Effect of sweet orange aroma on experimental anxiety in humans. *Journal of Alternative and Complementary Medicine*, 18(8), 798–804. <https://doi.org/10.1089/acm.2011.0551>

Greenway, F. L., Frome, B. M., Engels, T. M., & McLellan, A. (2003). Temporary relief of postherpetic neuralgia pain with topical geranium oil [2]. In *American Journal of Medicine* (Vol. 115, Issue 7, pp. 586–587). Elsevier Inc. [https://doi.org/10.1016/S0002-9343\(03\)00434-0](https://doi.org/10.1016/S0002-9343(03)00434-0)

Haag, M. (2003). Essential fatty acids and the brain. In *Canadian Journal of Psychiatry* (Vol. 48, Issue 3, pp. 195–203). Canadian Psychiatric Association. <https://doi.org/10.1177/070674370304800308>

Hammell, D. C., Zhang, L. P., Ma, F., Abshire, S. M., McLwrath, S. L., Stinchcomb, A. L., & Westlund, K. N. (2016). Transdermal cannabidiol reduces inflammation and pain-related behaviours in a rat model of arthritis. *European Journal of Pain* (United Kingdom), 20(6), 936–948. <https://doi.org/10.1002/ejp.818>

Han, X., Gibson, J., Eggett, D. L., & Parker, T. L. (2017). Bergamot (*Citrus bergamia*) Essential Oil Inhalation Improves Positive Feelings in the Waiting Room of a Mental Health Treatment Center: A Pilot Study. *Phytotherapy Research*, 31(5), 812–816. <https://doi.org/10.1002/ptr.5806>

Harada, H., Kashiwadani, H., Kanmura, Y., & Kuwaki, T. (2018a). Linalool Odor-Induced Anxiolytic Effects in Mice. *Frontiers in Behavioral Neuroscience*, 12, 241. <https://doi.org/10.3389/fnbeh.2018.00241>

Harada, H., Kashiwadani, H., Kanmura, Y., & Kuwaki, T. (2018b). Linalool Odor-Induced Anxiolytic Effects in Mice. *Frontiers in Behavioral Neuroscience*, 12, 241. <https://doi.org/10.3389/fnbeh.2018.00241>

Hassan, H. A., Geniady, M. M., Abdelwahab, S. F., Abd-Elghany, M. I., Sarhan, H. A., Abdelghany, A. A., Kamel, M. S., Rodriguez, A. E., & Alio, J. L. (2018). Topical Eugenol Successfully Treats Experimental *Candida albicans*-Induced Keratitis. *Ophthalmic Research*, 60(2), 69–79. <https://doi.org/10.1159/000488907>

Hassoun, L. A., Ornelas, J. N., & Sivamani, R. K. (2016). Cedarwood Oil as Complementary Treatment in Refractory Acne. *The Journal of Alternative and Complementary Medicine*, 22(3), 252–253. <https://doi.org/10.1089/acm.2015.0208>

Hon, K. L., Tsang, Y. C., Pong, N. H., Lee, V. W. Y., Luk, N. M., Chow, C. M., & Leung, T. F. (2015). Patient acceptability, efficacy, and skin biophysiology of a cream and cleanser containing lipid complex with shea butter extract versus a Ceramide product for eczema. *Hong Kong Medical Journal*, 21(5), 417–425. <https://doi.org/10.12809/hkmj144472>

Hong, C. Z., & Shellock, F. G. (1991). Effects of a topically applied counterirritant (Eucalyptmint) on cutaneous blood flow and on skin and muscle temperatures. A placebo-controlled study. *American Journal of Physical Medicine and Rehabilitation*, 70(1), 29–33. <https://doi.org/10.1097/00002060-199102000-00006>

Hongratanaworakit, T. (2010). Stimulating effect of aromatherapy massage with Jasmine oil. *Natural Product Communications*, 5(1), 157–162. <https://doi.org/10.1177/1934578x1000500136>

Jadoon, K. A., Tan, G. D., & O'Sullivan, S. E. (2017). A single dose of cannabidiol reduces blood pressure in healthy volunteers in a randomized crossover study. *JCI Insight*, 2(12). <https://doi.org/10.1172/jci.insight.93760>

Jastrzb, Ggotek, & Skrzyslewska. (2019). Cannabidiol Regulates the Expression of Kerat-

inocyte Proteins Involved in the Inflammation Process through Transcriptional Regulation. *Cells*, 8(8), 827. <https://doi.org/10.3390/cells8080827>

Jeong, E., Won Hong, J., Min, J. A., Won Lee, D., Sohn, M. Y., Lee, W. J., Lee, J. Y., & Park, Y. M. (2011). Topical ALA-photodynamic therapy for acne can induce apoptosis of sebocytes and down-regulate their TLR-2 and TLR-4 expression. *Annals of Dermatology*, 23(1), 23–32. <https://doi.org/10.5021/ad.2011.23.1.23>

Jeong, S., Kim, M. S., Lee, S. H., & Park, B. D. (2019). Epidermal endocannabinoid system (EES) and its cosmetic application. In *Cosmetics* (Vol. 6, Issue 2, p. 33). MDPI AG. <https://doi.org/10.3390/COSMETICS6020033>

Kagawa, D., Jokura, H., Ochia, R., Tokimitsu, I., & Tsubone, H. (2003). The sedative effects and mechanism of action of cedrol inhalation with behavioral pharmacological evaluation. *Planta Medica*, 69(7), 637–641. <https://doi.org/10.1055/s-2003-41114>

Kass, L., Rosanoff, A., Tanner, A., Sullivan, K., McAuley, W., & Plesset, M. (2017). Effect of transdermal magnesium cream on serum and urinary magnesium levels in humans: A pilot study. *PLoS ONE*, 12(4), e0174817. <https://doi.org/10.1371/journal.pone.0174817>

Khalilzadeh, E., Hazrati, R., & Saiah, G. V. (2016). Effects of topical and systemic administration of *Eugenia caryophyllata* buds essential oil on corneal anesthesia and analgesia. *Research in Pharmaceutical Sciences*, 11(4), 293–302. <https://doi.org/10.4103/1735-5362.189297>

Kim, E., Hwang, K., Lee, J., Han, S. Y., Kim, E. M., Park, J., & Cho, J. Y. (2018). Skin protective effect of epigallocatechin gallate. *International Journal of Molecular Sciences*, 19(1). <https://doi.org/10.3390/ijms19010173>

Knuesel, O., Weber, M., & Suter, A. (2002). Arnica montana gel in osteoarthritis of the knee: An open, multicenter clinical trial. *Advances in Therapy*, 19(5), 209–218. <https://doi.org/10.1007/BF02850361>

Kuroda, K., Inoue, N., Ito, Y., Kubota, K., Sugimoto, A., Kakuda, T., & Fushiki, T. (2005). Sedative effects of the jasmine tea odor and (R)-(-)-linalool, one of its major odor components, on autonomic nerve activity and mood states. *European Journal of Applied Physiology*, 95(2–3), 107–114. <https://doi.org/10.1007/s00421-005-1402-8>

Lazarotto, M., Valério, A., Boligon, A., Tres, M. V., Scapinello, J., Dal Magro, J., & Oliveira, J. V. (2018). Chemical Composition and Antibacterial Activity of Bergamot Peel Oil from Supercritical CO₂ and Compressed Propane Extraction. *The Open Food Science Journal*, 10(1), 16–23. <https://doi.org/10.2174/1874256401810010016>

Lehrner, J., Marwinski, G., Lehr, S., Jöhren, P., & Deecke, L. (2005). Ambient odors of orange and lavender reduce anxiety and improve mood in a dental office. *Physiology and Behavior*, 86(1–2), 92–95. <https://doi.org/10.1016/j.physbeh.2005.06.031>

Lewith, G. T., Godfrey, A. D., & Prescott, P. (2005). A single-blinded, randomized pilot study evaluating the aroma of *Lavandula angustifolia* as a treatment for mild insomnia. *Journal of Alternative and Complementary Medicine*, 11(4), 631–637. <https://doi.org/10.1089/acm.2005.11.631>

Lillehei, A. S., Halcón, L. L., Savik, K., & Reis, R. (2015). Effect of Inhaled Lavender and Sleep Hygiene on Self-Reported Sleep Issues: A Randomized Controlled Trial. *The Journal of Alternative and Complementary Medicine*, 21(7), 430–438. <https://doi.org/10.1089/acm.2014.0327>

Lin, T. K., Zhong, L., & Santiago, J. L. (2018). Anti-inflammatory and skin barrier repair effects of topical application of some plant oils. In *International Journal of Molecular Sciences* (Vol. 19, Issue 1). MDPI AG. <https://doi.org/10.3390/ijms19010070>

MacCallum, C. A., & Russo, E. B. (2018). Practical considerations in medical cannabis administration and dosing. In *European Journal of Internal Medicine* (Vol. 49, pp. 12–19). Elsevier B.V. <https://doi.org/10.1016/j.ejim.2018.01.004>

Maranz, S., Wiesman, Z., & Garti, N. (2003). Phenolic constituents of shea (*Vitellaria paradoxa*) kernels. *Journal of Agricultural and Food Chemistry*, 51(21), 6268–6273. <https://doi.org/10.1021/jf034687t>

McCusker, M. M., & Grant-Kels, J. M. (2010). Healing fats of the skin: The structural and immunologic roles of the Ω -6 and Ω -3 fatty acids. *Clinics in Dermatology*, 28(4), 440–451. <https://doi.org/10.1016/j.clindermatol.2010.03.020>

Moss, M., Howarth, R., Wilkinson, L., & Wesnes, K. (2006). Expectancy and the aroma of Roman chamomile influence mood and cognition in healthy volunteers. *International Journal of Aromatherapy*, 16(2), 63–73. <https://doi.org/10.1016/j.ijat.2006.04.002>

Muz, G., & Taşçı, S. (2017). Effect of aromatherapy via inhalation on the sleep quality and fatigue level in people undergoing hemodialysis. *Applied Nursing Research*, 37, 28–35. <https://doi.org/10.1016/j.apnr.2017.07.004>

Nitecka-Buchta, A., Nowak-Wachol, A., Wachol, K., Walczyńska-Dragon, K., Olczyk, P., Batoryna, O., Kempa, W., & Baron, S. (2019). Myorelaxant Effect of Transdermal Cannabidiol Application in Patients with TMD: A Randomized, Double-Blind Trial. *Journal of Clinical Medicine*, 8(11), 1886. <https://doi.org/10.3390/jcm8111886>

Oláh, A., Tóth, B. I., Borbíró, I., Sugawara, K., Szöllösi, A. G., Czifra, G., Pál, B., Ambrus, L., Klopper, J., Camera, E., Ludovici, M., Picardo, M., Voets, T., Zouboulis, C. C., Paus, R., & Bíró, T. (2014). Cannabidiol exerts sebostatic and antiinflammatory effects on human sebocytes. *Journal of Clinical Investigation*, 124(9), 3713–3724. <https://doi.org/10.1172/JCI64628>

Ota, Y., Hamada, A., Saito, H., & Nakano, M. (2003a). Evaluation of Percutaneous Absorption of Midazolam by Terpenes. *Drug Metabolism and Pharmacokinetics*, 18(4), 261–266. <https://doi.org/10.2133/dmpk.18.261>

Ota, Y., Hamada, A., Saito, H., & Nakano, M. (2003b). Evaluation of Percutaneous Absorption of Midazolam by Terpenes. *Drug Metabolism and Pharmacokinetics*, 18(4), 261–266. <https://doi.org/10.2133/dmpk.18.261>

Palmieri, B., Laurino, C., & Vadala, M. (2019). A therapeutic effect of cbd-enriched ointment in inflammatory skin diseases and cutaneous scars. *Clinica Terapeutica*, 170(2), E93–E99. <https://doi.org/10.7417/CT.2019.2116>

Papagianni, E. P., & Stevenson, C. W. (2019). Cannabinoid Regulation of Fear and Anxiety: an Update. *Current Psychiatry Reports*, 21(6), 38. <https://doi.org/10.1007/s11920-019-1026-z>

Saiyudthong, S., & Marsden, C. A. (2011). Acute effects of bergamot oil on anxiety-related behaviour and corticosterone level in rats. *Phytotherapy Research*, 25(6), 858–862. <https://doi.org/10.1002/ptr.3325>

Sano, S. (2015). Psoriasis as a barrier disease. In *Dermatologica Sinica* (Vol. 33, Issue 2, pp. 64–69). Elsevier Ltd. <https://doi.org/10.1016/j.dsi.2015.04.010>

Sasannejad, P., Saeedi, M., Shoebi, A., Gorji, A., Abbasi, M., & Foroughipour, M. (2012). Lavender essential oil in the treatment of migraine headache: A placebo-controlled clinical trial. *European Neurology*, 67(5), 288–291. <https://doi.org/10.1159/000335249>

Shaikh, Z. I., & Mashood, A. A. (2014). Treatment of refractory melasma with combination of topical 5% magnesium ascorbyl phosphate and fluorescent pulsed light in Asian patients. *International Journal of Dermatology*, 53(1), 93–99. <https://doi.org/10.1111/ijd.12195>

Shoeb, A., Chowta, M. N., Pallemati, G., Rai, A., & Singh, A. (2013). Evaluation of antidepressant activity of vanillin in mice. *Indian Journal of Pharmacology*, 45(2), 141–144. <https://doi.org/10.4103/0253-7613.108292>

Silva, J., Abebe, W., Sousa, S. M., Duarte, V. G., Machado, M. I. L., & Matos, F. J. A. (2003). Analgesic and anti-inflammatory effects of essential oils of *Eucalyptus*. *Journal of Ethnopharmacology*, 89(2–3), 277–283. <https://doi.org/10.1016/j.jep.2003.09.007>

Simsek, G., Sari, E., Kilic, R., & Bayar Muluk, N. (2016). Topical Application of Arnica and Mucopolysaccharide Polysulfate Attenuates Periorbital Edema and Ecchymosis in Open Rhinoplasty: A Randomized Controlled Clinical Study. *Plastic and Reconstructive Surgery*, 137(3), 530e–535e. <https://doi.org/10.1097/01.prs.0000479967.94459.1c>

Smeriglio, A., Galati, E. M., Monforte, M. T., Lanuzza, F., D'Angelo, V., & Circosta, C. (2016). Polyphenolic Compounds and Antioxidant Activity of Cold-Pressed Seed Oil from *Finola Cultivar of Cannabis sativa L.* *Phytotherapy Research*, 30(8), 1298–1307. <https://doi.org/10.1002/ptr.5623>

Stehlikova, Z., Kostovcik, M., Kostovcikova, K., Kverka, M., Juzlova, K., Rob, F., Hercogova, J., Bohac, P., Pinto, Y., Uzan, A., Koren, O., Tlaskalova-Hogenova, H., & Jiraskova Zakostelska, Z. (2019). Dysbiosis of Skin Microbiota in Psoriatic Patients: Co-occurrence of Fungal and Bacterial Communities. *Frontiers in Microbiology*, 10(MAR), 438. <https://doi.org/10.3389/fmicb.2019.00438>

Tabassum, N., & Hamdani, M. (2014). Plants used to treat skin diseases. In *Pharmacognosy Reviews* (Vol. 8, Issue 15, pp. 52–60). <https://doi.org/10.4103/0973-7847.125531>

Takahashi, T., Kokubo, R., & Sakaino, M. (2004). Antimicrobial activities of eucalyptus leaf extracts and flavonoids from *Eucalyptus maculata*. *Letters in Applied Microbiology*, 39(1), 60–64. <https://doi.org/10.1111/j.1472-765X.2004.01538.x>

Widrig, R., Suter, A., Saller, R., & Melzer, J. (2007). Choosing between NSAID and arnica for topical treatment of hand osteoarthritis in a randomised, double-blind study. *Rheumatology International*, 27(6), 585–591. <https://doi.org/10.1007/s00296-007-0304-y>

Xiong, M., Li, Y., Tang, P., Zhang, Y., Cao, M., Ni, J., & Xing, M. (2018). Effectiveness of aromatherapy massage and inhalation on symptoms of depression in Chinese community-dwelling older adults. *Journal of Alternative and Complementary Medicine*, 24(7), 717–724. <https://doi.org/10.1089/acm.2017.0320>

Zhang, K., & Yao, L. (2018). The anxiolytic effect of *Juniperus virginiana L.* essential oil and determination of its active constituents. *Physiology and Behavior*, 189, 50–58. <https://doi.org/10.1016/j.physbeh.2018.01.004>

Zhang, L. L., Yang, Z. Y., Fan, G., Ren, J. N., Yin, K. J., & Pan, S. Y. (2019). Antidepressant-like Effect of Citrus sinensis (L.) Osbeck Essential Oil and Its Main Component Limonene on Mice. *Journal of Agricultural and Food Chemistry*, 67(50), 13817–13828. <https://doi.org/10.1021/acs.jafc.9b00650>

MIGHTY GREEN

Reach out to us at support@mightygreen.co.uk with your questions. **RRP £9.95**