

MASSAGE FOR HEADACHES

Breaking the Cycle of Pain

Continuing Education E-book



Melissa Wood, ND, MTI, LMT

MASSAGE FOR HEADACHES

BREAKING THE CYCLE OF PAIN



6-HOUR CONTINUING EDUCATION UNIT CLASS

Approved by the Texas Department of Licensing and Regulation (TDLR) & The National Certification Board for Therapeutic Massage & Bodywork (NCBTMB)



MASSAGE FOR HEADACHES: BREAKING THE CYCLE OF PAIN

Welcome!

Class Objective: This online class has been developed to educate Licensed Massage Therapists on Headaches and how people that suffer from them, are impacted greatly in their life. This e-book discusses the many different types of headaches, what causes them, as well as massage modalities and other healing modalities that can help to alleviate them. This will benefit not only the therapist in their own life but will help them to better help their clients and give them tips to help their clients manage their headaches. It is my hope this material will be interesting, educational and a valuable resource to assist you with working with massage therapy clients.



About the Instructor

My name is Melissa Wood and I am a Naturopathic Doctor, Massage Therapy Instructor and Licensed Massage Therapist located in San Antonio, Texas. I have been studying alternative and natural medicine for over 25 years.

My mission is to enable everyone on this

planet to be healthy and to be actively involved in their health and healing. My goal is to offer information that will provide you with new insights that are useful in your path to wellness. I envision a time when everyone will seek out herbs, essential oils, vitamins, minerals, nutritional supplements, and whole foods (not processed food!) to help heal themselves, as these are very powerful tools for enhancing your health and well-being.

APPROVED MASSAGE THERAPY INSTRUCTOR

MELISSA WOOD, ND, MTI, LMT 718 Highway 82 East, Ste 226 Sherman, TX 75090

National Website: www.onlinemassagececlasses.com

Texas Website: www.texasmassageceu.com

- NCBTMB Approved Provider: <u>28</u>.
- Texas Licensed Massage Therapist: MT029757
- Texas Continuing Education Provider: CE1384
- South Carolina Continuing Education Provider: 38
- Texas Massage Therapy Instructor: MI2424
- CE Broker Provider: 50-20346

Follow Our Facebook Page:

https://www.facebook.com/OnlineMassageCEClasses







Copyright Information

This e-book class is copyrighted, and thus all information enclosed within is the property of the owner (Melissa M. Wood, ND, MTI, LMT) and copying or distributing said material is against the law. All rights reserved. Reproduction, distribution, or replication of this e-book class is strictly prohibited unless specific prior written consent of Melissa M. Wood, ND, MTI, LMT has been made.

All photographs, charts, and other graphics herein are the property of their respective owners and have been obtained legally through royalty-free images and other permissible works.

Disclaimer

I am a Naturopathic Doctor (N.D.), Massage Therapy Instructor (MTI), Licensed Massage Therapist (LMT), Approved CE Provider in the State of Texas and am an Approved Provider for NCBTMB (National Certification Board for Therapeutic Massage & Bodywork). I am NOT a Medical Doctor (M.D.). I have been trained in holistic and natural therapies for the body and do not diagnose any medical condition, nor prescribe any medications. Should you need immediate medical or psychiatric assistance, please telephone 911 or seek immediate treatment at an emergency room hospital. Nothing listed within this e-book class should be considered as medical advice for dealing with a given problem. You should consult your health care professional for individual guidance for specific health problems. It is understood that the author is solely responsible for the content of this work and is **NOT** responsible for your usage of said information either personally or professionally with your clients. In addition, you should ALWAYS encourage your clients to see their health care professionals for help with any medical issues they are having.

This is an educational e-book class designed to be instructive and informative in nature. I encourage you to make your own health care decisions based upon your research and in partnership with a qualified healthcare professional. The use of this information, suggestions, recommendations, products or services should be based on your own due diligence and you agree I am not liable for your success or failure.

Melissa M. Wood, ND, MTI, LMT



MASSAGE FOR HEADACHES:

BREAKING THE CYCLE OF PAIN

TABLE OF CONTENTS

CHAPTER 1: INTRODUCTION	7
CHAPTER 2: UNDERSTANDING HEADACHES	10
CHAPTER 3: HEADACHE TRIGGERS	27
CHAPTER 4: DRUG-FREE HEADACHE REMEDIES	41
CONCLUSION	66
SOURCES, REFERENCES, & ENDNOTES	67

CHAPTER 1: INTRODUCTION



Very few people escape the occasional headache. In fact, it's *abnormal* for someone to never have one. A recent study found that 95% of women and 91% of men experienced at least one headache during the past year.¹ Family physicians report that headaches are on their Top 20

list of most common complaints from their patients.

But for millions of people across the United States, headaches are far more than an inconvenience. These people suffer from much more serious and debilitating types of headaches that can put a major strain on their work and personal life. An estimated 45 million Americans have chronic headaches – more than diabetes, asthma and coronary heart disease combined!²

As massage therapists, we want to understand the broad range of experiences of people who live with chronic headaches. We can also help our clients to make the needed changes – by implementing a combination of lifestyle modifications, exercise and massage therapy in order to get relief. Your clients may tell you that they feel like headaches are running their lives; but the purpose of this class is to reveal effective ways of breaking the cycle so they can enjoy more pain-free days and regain control of the life they had before.

This class will equip you with a roadmap of the common pitfalls that headache sufferer's experience. If you personally do not experience frequent headaches, keep in mind that living with constant pain takes a huge personal toll for your client. Not knowing when the pain will strike can mean that a person misses important deadlines at work, or that they can't go out for a special anniversary dinner with their mate, or play with their children on a bright, sunny day. It's no wonder that severe headaches can cause people to plunge into depression. Since headaches can have so much social impact, having this understanding is essential in helping your clients to find specific directions and the right treatment.

Did You Know?



Even just looking at buildings can give you a headache!!

Research from the University of Essex has discovered that looking at urban landscapes may be another cause of headaches. Professor Arnold J. Wilkins explains: "Because the repetitive patterns of urban architecture break the rule of nature, it is more difficult for the human brain to process them efficiently. And because urban landscapes are not as easy to process, they are less comfortable to look at. Some patterns, such as the stripes on door mats, carpets and escalator stair treads can trigger headaches and even epileptic seizures.³

CHAPTER 2: UNDERSTANDING HEADACHES



This chapter will help you to understand what headaches are in general, how they happen within the body and provide an overview of the most common types of headaches.

The medical term for headache is *cephalgia*, from the Greek words that literally mean "head pain." The word *headache*, which we hear more commonly, can be used to describe almost any pain felt in the head. The pain may strike in a number of areas – not only in the temples and forehead where people normally associate headache pain, but also at the back of the head, the neck and in the jaw.

Why do people experience headaches? Science has not discovered all of the answers yet, but studies indicate most headaches come from the complex interactions between the brain, nerves and blood vessels. Since brain chemistry predisposes people to headaches, it's not surprising that many scientists and physicians agree that most headaches have a strong genetic component. However, there are a host of other factors that we will examine in this class that can result in chronic headaches – such as stress, injuries or car accidents, and lifestyle choices.

Copyright © All Rights Reserved

One strange thing about headaches is that although they often begin in the brain, our brain tissue can't actually ache. Patients who have undergone brain surgery can confirm that no pain is felt during the procedure even though they were conscious the entire time.⁴ The reason is that there are no pain receptors in brain tissue. However, the surrounding structures (like the membranes, eyes, sinuses, teeth and nerves) that are connected to the spinal cord and cranium all have highly sensitive areas that DO respond to pain.



The next logical question is then, why do headaches hurt so much? During migraine headaches in particular, scientists have found that the levels of neurotransmitters (substances that transmit nerve impulses across brain synapses) fluctuate. The most noticeable change is in serotonin, a chemical that is responsible for sending and regulating pain signals to

the brain. Endorphins, which act as the body's natural pain killers may also decrease during migraines which explains the sharp increase in pain and other symptoms when the headache strikes.

Headaches come in as many shapes and sizes as there are people. The pain can range from mild to intense, from a dull throbbing to a stabbing sensation. There are also a number of accompanying symptoms like nausea and sensitivity to light and sound.



Did You Know?

Even the world's most famous and influential people cannot escape headaches. Historians believe that the unique techniques used in Vincent van Gogh's famous masterpieces may have been due to visual auras caused by a migraine. Many famous people have suffered from migraines including Einstein, Thomas Jefferson, Elvis Presley, Napoleon, Hugh Jackman, and Serena Williams. Migraines have caused NFL stars to be sidelined during the Super Bowl, celebrity concerts to be canceled, Olympic dreams to end, and many other opportunities lost.

There are a number of celebrities who have spoken out about their pain in order to raise awareness about how debilitating headaches can be. Realizing that famous people have been able to achieve great successes in spite of their condition can also bring hope to people who are facing a daily battle with headaches.⁴

Years of research and clinical experience have helped physicians and scientists to classify headaches into different types. Since 2003, the standard for diagnosing and describing headaches has been the International Classification of Headache Disorders, which was created by headache specialists from around the world. It classifies all currently known types of headaches into 14 major categories. The first four are called Primary headaches, based on their major symptoms. Secondary headaches (5-12) are grouped according to their underlying causes. The last category – various types of neuralgias, covers headaches that are related to damaged nerves as well as rare forms of headaches that do not fall into the previous categories. This last category is highly specific and is generally used by neurologists and other headache specialists for the purpose of pinpointing a diagnosis.

Here is the classification listing for your reference. (The actual listing is too extensive to include here so only the most relevant sub-categories are included.

To get more information about each category and to see the entire classification, follow this link:



https://ichd-3.org/wpcontent/uploads/2018/01/The-International-Classification-of-Headache-Disorders-3rd-Edition-2018.pdf

MAJOR HEADACHE GROUPS ACCORDING TO THE ICHD (International Classification of Headache Disorders)⁶

PRIMARY HEADACHE DISORDERS

1. Migraine can be divided into two major sub-types.

1.1 Migraine without aura is a clinical syndrome characterized by headache with specific features and associated symptoms.

1.2 Migraine with aura is



primarily characterized by the focal neurological symptoms that usually precede or sometimes accompany the headache.

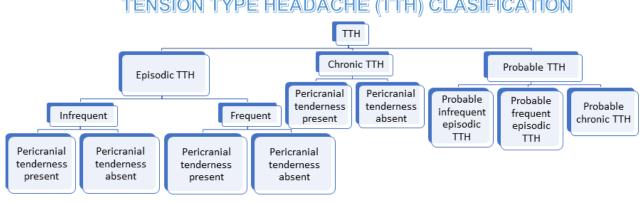
2. Tension-type headache is classified according to the nature of the headache, whether it is episodic or chronic, (frequent or infrequent) or probable.

2.1 Infrequent episodic tension-type headache is believed to be caused by peripheral pain mechanisms, as is;

2.2 Frequent episodic tension-type headache

2.3 Chronic tension-type headache involves central pain mechanisms

2.4 Probable tension-type headache is used to classify pain that may be attributed to either a tension headache or a migraine until a clear diagnosis can be made.



TENSION TYPE HEADACHE (TTH) CLASIFICATION

3. Cluster headache and other trigeminal autonomic cephalalgias:

3.1 Cluster headache is a severe, strictly unilateral pain episode lasting 15-180 minutes and occurring up to 8 times a day.

3.2 Paroxysmal Hemicrania is an attack with similar pain and symptoms to a cluster headache, but they are shorter-lasting, more frequent and occur more commonly in females.

3.3 Short-lasting unilateral neuralgiform headaches attack with conjunctival injection and tearing (SUNCT); are much briefer attacks and are often accompanied by prominent eye symptoms.

3.4 Probable trigeminal autonomic cephalgia



- **4. Other primary headaches** are pain episodes of a diverse nature that may not be fully understood.
 - 4.1. Primary stabbing headache
 - 4.2. Primary cough headache
 - 4.3. Primary exertional headache
- 4.4. Primary headache associated with sexual

activity

4.5. Hypnic headache

4.6. Primary thunderclap headache is a high-intensity headache of abrupt onset mimicking that of ruptured cerebral aneurysm that reaches maximum intensity in less than1 minute. These headaches should be assessed in a hospital emergency room.

- 4.7. Hemicrania continua
- 4.8. New daily-persistent headache (NDPH)

SECONDARY HEADACHE DISORDERS

- 5. Headache attributed to head and neck trauma
- 6. Headache attributed to cranial or cervical vascular disorder
- 7. Headache attributed to nonvascular intracranial disorder
- 8. Headache attributed to a substance or its withdrawal
- 9. Headache attributed to infection
 - 9.1 Headache attributed to intracranial infection infections such

as bacterial meningitis and encephalitis fall under this category. Copyright © All Rights Reserved Melissa M. Wood, ND, MTI, LMT 16 **9.2 Headache attributed to systemic infection –** headaches attributed to an infection that includes fever and other systemic symptoms.

10. Headache attributed to disorder of homeostasis – due to causes such as dialysis, hypothyroidism, fasting.

11. Headache or facial pain attributed to disorder of cranium, neck, eyes, ears, nose, sinuses, teeth, mouth, or other facial or cranial structures – this classification is used when a primary cause cannot be identified.

12. Headache attributed to psychiatric disorder



CRANIAL NEURALGIAS, PRIMARY FACIAL PAIN AND OTHER HEADACHES

These specific neuralgias can be identified and classified according to their cause, whether the pain develops due to an infection such as herpes zoster or due to a structural abnormality.

13. Cranial neuralgias and central causes of facial pain

14. Other headaches, cranial neuralgia, and central or primary facial pain

Of course, we will not discuss all of these headaches in detail in this class but understanding how head pain is classified will help you to implement the most effective massage therapy techniques. We'll pay special attention to the headaches you will most often come across in your massage practice, namely: Tension headaches, Migraines, Cluster headaches, Rebound Headaches and Cervicogenic headaches.

TENSION HEADACHE

By far, the most common type of head pain that people complain of is a tension-type headache (TTH). Up to 80% of adults in the U.S. are affected by them; women are twice as likely to get them as men.⁷ Although this type of headache is an unwanted nuisance, for most people with TTH, the good news is that attacks only occur from time to time, no more than once or twice a month. There are about 3% of the adult U.S. population who suffer from chronic daily tension headaches.⁸ Massage, combined with methods like ice packs, rest, and relaxation techniques can often be used with positive results during this type of headache.

Copyright © All Rights Reserved

The cause of tension-type headaches is not known. Experts used to think muscle contractions in the face, neck, and scalp—perhaps as the result of elevated emotions, tension, and/or stress were the cause of TTH.⁹ Studies

from 2014 indicated that TTH was the result from abnormal sensitivity in the brain and spinal neurons along with a change in the body's pain signal transmission, not abnormal muscle contraction as was previously understood.¹⁰ As of 2022, the Mayo Clinic theorizes that the most common



cause of TTH is a heightened sensitivity to pain in people who have tensiontype headaches. A sensitized pain system may result in increased muscle tenderness--a common symptom of tension-type headache.¹¹

Tension headache pain is usually described as a pressing or tightening feeling on both sides of the head, like a constrictive band or vice grip that squeezes the entire head. In a true TTH, movement or physical activity does not aggravate the pain. It may radiate into the jaw, neck, scalp, and shoulders. Tension headaches can sometimes cause light or noise sensitivity but usually not both at the same time.

Not surprisingly, the onset of TTH is most often in the late afternoon, right when a person's stress level reaches its peak and fatigue starts to set in. The other triggers for tension headaches are sleep deprivation, eyestrain, and poor posture, all of which come hand-in-hand in today's work world where people spend long hours hunched over their computer screens.

Copyright © All Rights Reserved

Symptoms:

- Pain usually ranges from mild to moderate
- Does not severely restrict physical activities
- Causes band-like, dull aching
- May cause difficulty in concentrating
- Does NOT usually include:
 - Migraine aura symptoms
 - Nausea and vomiting
 - o Diarrhea
 - Sensitivity to both light and noise (although one or the other may occur)

MIGRAINE

Many people use the term describe migraine to the intensity or severity of their headache, but in fact, a migraine is a specific type of headache unique symptoms with and characteristics that distinguish it from other types of head pain. Migraines ranked 2nd are



among all diseases worldwide causing disability.¹²

There has been enough medical research in recent years to devote an entire class to migraine attacks and the treatments being developed to treat them.

Two of the distinguishing features of migraines are their secondary symptoms and their episodic nature.

According to the International Classification of Headache disorders, a migraine is diagnosed when a person has had at least 5 headaches that meet the following criteria:

1. Episodes last from 4-72 hours.

2. The head pain is one-sided, pulsating, moderate to severe and increases with physical movement.



3. The headache also includes accompanying symptoms of nausea, vomiting or sensitivity to light or sound.

4. No other medical cause can be found for the attack.

Scientists are still unclear about certain aspects of migraine attacks. One widely accepted theory is that a migraine occurs when pain pathways within the brain become activated unnecessarily. This means that pain messages are sent to the brain with no real cause. These messages travel along the trigeminal nerve, (one of the 12 cranial nerve pairs that are used as a pain pathway) into the brainstem, where they begin to circulate throughout the brain. Many of these messages eventually reach the cerebral cortex, which is when the person first becomes aware of the migraine attack. In response to these pain signals, the blood vessels in the head dilate and become inflamed. Eventually, as the pain messages start to decrease, the head pain and other migraine symptoms will disappear.

Experts have pinpointed 4 key phases in the evolution of a migraine attack.

Prodome They are а (premonitory or warning) phase, an Aura phase, an Attack phase and а Postdome (after headache) phase. Most migraine symptoms occur during premonitory the phase encompass and several body systems at the same time.

Symptoms:

- Depression and Anxiety
- Hyperactivity
- Irritability
- Sensitivity to light, sounds or smells
- Blurred vision, dizziness
- Nausea, diarrhea, constipation
- Stiff neck and achiness
- Shivering



CLUSTER HEADACHES

Cluster headaches are thought to be the most painful type of head pain. They fall under the category of Trigeminal Autonomic Cephalgias (TACs). Thankfully, they are much rarer than other types of headaches, affecting only 1% or less of people in the United States.¹³ They involve cyclical (or cluster, thus the name) attacks of severe, one-sided pain that strikes around the eye or temple region. Cluster headaches are exhausting for the sufferer because a single episode can last from 15-180 minutes and the headaches return 8 or more times per day. These cluster phases can last from weeks to months at a time, with remission periods where the headaches disappear completely.

Using brain-imaging technology, researchers have discovered abnormal activity in the hypothalamus on the same side that a cluster headache occurs. Since the hypothalamus acts as the control center for many autonomic nervous system functions, there are several characteristic cluster headache responses, including red, teary eyes and reduced pupil size on the affected side.



Symptoms:

- One-sided pain in the eye or temple region
- Tearing eyes
- Nasal congestion and runny nose
- Eyelid drooping
- Contraction of the pupil on the affected side

CERVICOGENIC HEADACHE

Cervicogenic headache (CGH) is pain perceived as occurring in a part of the body other than where the source is located, meaning it is caused by another illness or physical issue and is not a single disorder.^{14 15 16}

CGH is an exceedingly common type of headache that can be hard to diagnose because the pain does not originate inside the head, but instead from within the cervical spine. There is a wide range of causes for cervicogenic headaches, such as muscle spasms, traumatic injury, or degenerative diseases like osteoarthritis. Patients who have sustained whiplash or concussion injuries with resulting neck pain sometimes develop CGH.¹⁷

The first scientific study on this subject was published in 1983 by Norwegian physician Ottar Sjaastad, who coined the term, "cervicogenic headache."¹⁸ Based on his work, CGHs are now classified as a form of secondary headaches.

A cervicogenic headache is felt primarily in the forehead, temples, or orbital (eye) area. The pain is aggravated by static neck positions. You will probably notice among your massage therapy clients that those who do repetitive tasks at work or tend to have improper neck movements (like holding a phone with their shoulder while typing or craning their necks to work on machinery) will be much more prone to this type of headache.

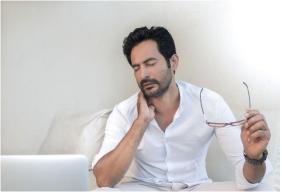


Experts believe that the physiological reason for neck pain that develops into a headache lies in the upper part of the spinal cord. This is where the sensory nerve fibers from the neck meet sensory nerve fibers from the trigeminal nerve. The trigeminal nerve transmits signals from the cervical structures to the brain, causing referred headache pain.

When treating a massage client with CGH, you will observe several telltale signs: tenderness in the neck and shoulders, changes in the contour of the neck muscle or a pain response when you have the client perform stretches or movements that contract the neck muscles.

Symptoms:

- Pain is either dull or piercing, most often felt on one side of the head
- Pain starts in the back of the head or the neck and moves forward to the forehead or temples
- Neck pain and stiffness
- Shoulder and arm pain and stiffness on the same side as the headache occurs
- Sensitivity to light and sound
- Nausea and vomiting



Of course, the International Classification lists dozens of other headache disorders but these occur far less often in your general client population.

Understanding the headaches we've discussed will equip you with a good overview that will allow you to develop an appropriate treatment plan for your massage clients who seek relief from various types of head pain.

In the next chapter, we'll discuss several ways to identify external triggers for headache pain and how to avoid them.

RED FLAG: WHEN HEADACHES WARN OF A SERIOUS MEDICAL PROBLEM

Headache sufferers and healthcare professionals should all be alert to the signs of a serious medical condition (such as a tumor, meningitis, or aneurysm) that can cause severe head pain. If your client complains of any of the following symptoms, they should be referred to their doctor or go to an emergency room immediately:

- An extremely severe headache for the first time
- Pain that the person describes as the *worst they've ever had*
- A headache that is <u>sudden and intense</u> (sometimes described as a thunderclap headache)
- <u>Sudden numbness, clumsiness, double or blurred vision, weakness</u> (especially on one side of the body)
- Head pain with fever, stiff neck, rash, aching muscles and joints or jaw pain
- Loss of vision
- <u>Confusion or drowsiness</u>
- Cyclic vomiting or seizures
- <u>New headaches</u> in a person with an underlying serious illness such as cancer or HIV or following a recent accident or injury

CHAPTER 3: HEADACHE TRIGGERS

In this chapter, you will learn about a number of environmental triggers and lifestyle factors that can contribute to pain and headaches. This understanding will help decrease your own risk of recurrent headaches and provide you with valuable information you can share with your massage clients.

If you personally suffer from any of the headaches we described in Chapter 2, you know that there is nothing that can derail your day (or even your week!) faster than a throbbing headache. So, it makes sense that in addition to understanding the physiological causes of headaches, we also want to identify any environmental, dietary or lifestyle factors that can either trigger or aggravate pain. Typically, Western medicine does not really address the underlying cause of headaches; their answer to people suffering with headaches is to prescribe medications. But the medications will NEVER prevent the headaches from occurring because the underlying cause has not been addressed.

Unfortunately, some headache triggers are impossible to avoid altogether. Migraine sufferers in particular have a number of triggers that can be hard to

control. For example, weather changes are known to be an instigator of migraine attacks. However, a person who is prone to headaches can plan ahead by monitoring weather forecasts and adapting their schedules accordingly.



The same type of preventative measures can be used for other environmental factors like perfume sensitivity and exposure to intense lights and sounds.

FOOD TRIGGERS

One of the worst culprits among headache triggers that we CAN control is the food we eat. Eating the wrong types of food has been shown to cause migraines in almost half of sufferers and up to 1 in 3 people with other types of headaches.¹⁹

What are the most common offenders? Aged cheese, salty foods, and foods that are high in tannin such as avocado, beer, red wine and nuts are known to initiate headaches in sensitive people. Some people find that drinking any type of alcohol even in small amounts can trigger a headache. According to

the American Council for Headache Education, freshly baked bread is also known to cause headaches in some individuals. With more and more people discovering they have wheat or gluten sensitivity, some have realized by coincidence that when they eliminate all



carbohydrates as a health measure, their incidence of headaches also decreases almost immediately.

Other Known Food Triggers – Here is a list of common offenders that have been shown to cause headaches: caffeine, chocolate, mushrooms, pickled meats like herring, wheat products (bread, cereals and pasta), nitrates in hot dogs/lunch meat and dairy foods. Of course, these triggers are given as a general overview, but each person is unique in their food sensitivities. Foods that impact one migraine sufferer may not affect another. If you do find that one of these substances affects you, then remove it completely from your diet, no matter how much you love it.

At first, monitoring all of the foods you eat for possible reactions can seem overwhelming. Keeping a daily journal is one of the easiest ways to start tracking down your food sensitivities and possible headache triggers. By logging all of the foods you eat and noting when your headaches occur throughout the day, you will quickly identify any patterns. The results can be surprising. One naturopath reports that using a food diary, a client who suffered for more than 20 years from pounding headaches realized that the



grapefruit she had for breakfast each morning was the instigator of her pain! As was mentioned in the preceding page, headache sufferers will really need to dissect all of the ingredients in their food to determine if any of them are contributing to the problem.

To be extremely proactive in reducing headaches, many naturopaths recommend a two-week elimination diet. During this period, all of the most common food allergens are removed, including grains, dairy, citrus, peanuts, caffeine, sugar and soy. After 14 days, these foods are slowly reintroduced, one by one. Taking this approach makes any food related symptoms much more pronounced. Once a person's trigger foods are identified, it is much easier to make the necessary nutritional changes to stay healthy and headache free.

Hidden Chemicals in the Food We Eat

Chemical food additives are indisputably on the top ten list of migraine triggers.²⁰ These chemicals are hidden in processed convenience foods that are, sad to say, an increasingly large part of the American diet. Overconsumption of these additives leads to food allergies and a host of symptoms that stem from hidden chemicals.

There are several main food allergies that you should be aware of:

MSG (Monosodium Glutamate, also labeled as Glutamic Acid or Glutamate) — This chemical is commonly found in processed foods such as fast food, sausages, deli meats and cheeses, frozen meals, canned foods; canned parmesan cheese; soy sauce; salad dressings; packaged gravies, etc. Nearly any kind of processed or pre-packaged food has a pretty good chance of having MSG in it, so be sure to read the label and avoid it.

The other concern with MSG is that the government allows food manufacturers to use other names for it. So, when you're reading the ingredient labels on the foods you eat regularly, you will need to look out for these ingredients as well:

- caseinate
- autolyzed yeast enzymes
- beef or chicken broth
- natural flavoring
- hydrolyzed vegetable protein
- soy protein concentrates, soy isolates
- autolyzed yeast extracts

Copyright © All Rights Reserved

These names are all disguises for glutamates, but the FDA allows these ingredients to be used as long as the actual glutamate is less than 99 percent pure. So, make sure you educate yourself and your clients and always read your food ingredient labels!

Aspartame (50% of which is Phenylalanine) – This artificial sweetener is a toxic chemical and is found in hundreds of foods: diet sodas, flavored drinks, chewing gum, juice, frozen foods, yogurt, diet or no-sugar foods. Aspartame is



absolutely insidious and for chronic headache sufferers, it should be avoided at all costs. Unfortunately, as a nation, we are consuming WAY too much of it because it is in many products labeled "diet" or "sugar free." Even chewing gum contains enough aspartame to completely disrupt a person's brain chemistry! If you chew gum because you're concerned about fresh breath, a natural alternative you can use is pure Peppermint Essential Oil that will give you the same freshness but is toxin-free. Aspartame is suspected to interfere with serotonin production, which is an essential neurotransmitter for processes like sleep, mood, and memory. Artificial Sweeteners (Splenda/Sucralose, Saccharin, etc.) - These are the pink, blue and yellow packets you see on restaurant tables. They are commonly used to sweeten iced tea or coffee. But be aware that these chemicals significantly affect brain chemistry and absolutely can cause of headaches.

Did You Know?



Although chemical sweeteners under the trade

names Nutrasweet, Equal and Splenda have been approved for food safety by the Food and Drug Administration, they are responsible for 85% of ALL complaints coming into the FDA due to adverse reactions. Doctors also report that many of their patients gain a significant amount of weight after they begin using synthetic sweeteners. Researchers suspect that the reason for this is that the chemicals disrupt the body's ability to release insulin and interfere with the body's ability to send and receive signals when the appetite or taste for sweetness has been satisfied. This makes people crave more and more sugar without ever feeling satisfied, which explains the sudden weight gain. How frustrating for a person who is trying to lose weight!

An excellent resource where you can learn more about food additives and the reactions they cause is Center for Science in the Public Interest: <u>http://www.cspinet.org/reports/chemcuisine.htm</u> If you must sweeten your foods or beverages, opt for using REAL, unrefined sugar or carry packets of "Stevia" (an herbal sweetener) with you. But keep in mind that not all Stevia (or any other sweetener labeled "natural") are the same. Stevia is derived from the stevia plant and is much sweeter than sugar. It contains a small amount of fiber, no carbs and rates zero on the GI index (the Glycemic Index [GI] rates the effects of carbohydrates on blood glucose levels, so the lower the number, the better it is for the body). Unfortunately, some Stevia manufacturers have chosen to add Maltodextrin to counteract the slight bitter taste that natural stevia has. These products are pure white in color, which is a give-away that they have been highly processed and may even be worse for you than natural sugar. The added chemicals can also act as a headache trigger, so choose carefully by reading the ingredient label. I suggest you opt for the liquid version of Stevia that is made with vegetable glycerin and not alcohol.

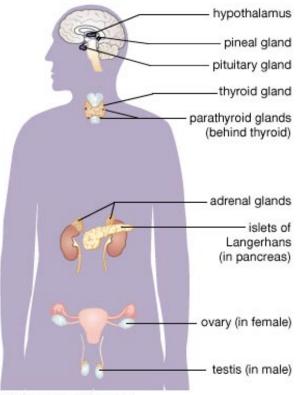


Food Colorings – Beware of the food dye colorings in some foods like juice, readymade meals, frozen foods, cereals, cakes, cookies, chips, frostings, etc. Red Dye #40 and Yellow Dye #5 in particular are very

common additives in many items such as yogurt, flavored powdered drinks, Energy drinks, etc. Food dyes are another known headache trigger so again it's wise to check your food labels and eliminate these foods as necessary.

HORMONAL IMBALANCES

Put simply, hormones are part of the endocrine system, which is а specialized network of glands that run throughout the entire body. These glands are responsible for a number of body functions, and they act by secreting hormones into the blood stream whenever they're needed. Hormones work as tiny chemical messengers that help keep a person alive and well. By relaying specific messages to organs or tissues, the body can respond appropriately.



^{© 2006} Merriam-Webster, Inc.

As they go through life phases, women are at increased risk for hormone fluctuations and imbalances. Most female headache sufferers notice that attacks occur more often during times when hormones are fluctuating – "period headaches" during menstrual cycles, pregnancy, and menopause. Though the changes may not be as distinct, men too can experience hormonal imbalances that lead to headache pain and other symptoms.

The hormones that are most likely linked to chronic headaches are estrogen and progesterone. The reason is that these hormones play an important role in regulating menstrual periods and maintaining a healthy pregnancy. They also have important functions that can affect the central nervous system. Researchers believe that estrogen and progesterone can also influence other brain chemicals like serotonin. In general terms, a person with any type of hormonal imbalance will be more likely to experience headaches.

If a person suspects a hormonal imbalance is to blame for their chronic headaches, a blood test would be the most logical starting point in narrowing down the problem. Working closely with a natural health practitioner or another healthcare practitioner who is experienced in treating hormonal issues, a person will be able to make the changes needed to rebalance their hormones (preferably naturally!) and reduce the number of headache attacks.



There are thousands of substances in everyday household and cosmetic products that can interfere with the proper functioning of a person's endocrine system by blocking or mimicking the effects of

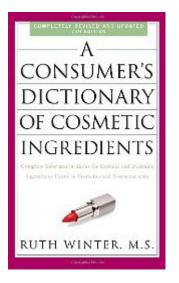
important hormones. These chemicals are called endocrine disrupters. Several of the most infamous endocrine disrupting chemicals like DDT and PCBs have been banned in the US and other parts of the world. But there are still so many damaging substances lurking in the products we use each day. If you are concerned about limiting the harmful effects of these chemicals, learn more about the ingredients in the products you use to help you find safer and more natural substitutes. Quick Facts:

- The average person uses or is exposed to more than 50,000 chemicals each day
- There are more than 3,000 known chemical food additives
- Tap water may contain over 700 chemicals
- Personal care and cosmetic products that are used daily by most Americans contain more 100 different chemicals

Read more about hormone health at:

http://www.drfranklipman.com/endocrine-disruption/

http://www.endocrinedisruption.com/endocrine.introduction.overview.php



STRUCTURAL IMBALANCES

Our modern world is hard on the posture: a sedentary lifestyle, spending far too many hours of our days sitting at a desk staring at a computer screen and carrying a heavy bag to work or school can wreak havoc on a person's structural alignment because these are all things our bodies aren't meant to do. Our body was designed to move around, bend over, reach up and stretch far more than we typically do. Given our current lifestyle of sitting all the time, over time this will create serious postural and structural imbalances.

The easiest way to treat these imbalances is to incorporate some form of exercise into your daily routine. Depending on the individual, exercise may mean taking breaks from the constant sitting to lift weights at your local gym, walk around your neighborhood or learn yoga. Chiropractic and acupuncture treatments can also be very helpful, but exercise is essential. Besides, exercise is easier, cheaper and doesn't produce any side effects (unless you overdo it!).



Helping your massage clients with chronic headaches to improve their posture will provide far-reaching benefits. First of all, postural realignment targets headaches at their source by preventing unnecessary muscle tension. Good posture is also essential for pain-free living because it puts the minimal amount of strain on muscles, ligaments, tendons, and bones. It protects and supports all of the body structures and encourages the person to move their joints more efficiently.

In addition to the techniques we'll outline in the next chapter, you can provide your clients with stretching exercises that will gradually improve their posture. You can also remind them to stop and check their posture periodically throughout the day to make sure they sit and stand with shoulders back, head high and their abdominal muscles tucked in.

As massage therapists, we also have to pay attention to our own posture to reduce the risk of muscle strain and headaches. During your massage sessions try to avoid standing in one spot for extended periods of time. Always wear properly fitted shoes that provide good support. Make sure to adjust your massage table at each session to make sure it's at an appropriate level for your height. Take breaks throughout your day for stretches and strengthening exercises for the neck and shoulders. These small steps can all add up and protect against muscle tension and headaches. Lastly, make sure you trade massages with other therapists to keep YOUR body tuned up!

REFERRED PAIN

When treating massage clients, therapists will also need to be on the lookout for the possibility of referred pain in people who experience chronic headaches. Referred pain is caused by a medical or muscular problem in one part of the body that is felt in another area. Cervicogenic or neck headaches (which we discussed in detail in Chapter Two) are an excellent example.

Copyright © All Rights Reserved

Although the source of the pain lies in the neck, shoulders or upper back, the person experiences intense pain in the head that they describe as a "headache."

It may only be upon physical examination of the client that you can help them to recognize that the pain actually originates in their neck or shoulders. You may palpate the tense muscles or notice a wincing reaction when you press on tender spots. The reason this problem goes unnoticed or is misdiagnosed is that the head pain is often so severe that overrides the feeling of pain in the neck and shoulders. It's only when you apply pressure or begin massaging these areas that the client will notice the pain and tension in other areas of the body. Be sure you DO NOT diagnose any condition in your client; you can mention to them that you believe they might be experiencing referred pain and suggest to them to discuss with their doctor.



If referred pain is the culprit, no amount of migraine medication will alleviate a person's symptoms and in fact, using prescription drugs may well add new side effects for the person to contend with. This is why it's so important to help your

massage clients to understand the true source of their headache pain. Once you have identified the trouble spots, you can treat the client with the most effective modalities and demonstrate stretches that will reduce tension and relieve referred pain.

STRESS

Everyone has to contend with stress on a daily basis and whether young or old, there's nothing we can do to eliminate it completely. But we can take practical steps to limit the effect it has on our minds and bodies. As massage therapists we know that stress and pain go hand in hand. Since stress is also one of the most common migraine and headache triggers, it's important to control it wherever possible.

Stress can intensify headaches because it sparks a downward spiral of physical reactions that cause and intensify pain. When a person is under prolonged stress, their muscles tense, they may grit or grind their teeth and the neck and shoulders will become stiff. The most important step in breaking the pain-stress cycle lies with the sufferer. Headache suffers will never avoid all sources of stress, but they can change how they respond to it physically, mentally and emotionally. We will discuss more ways to combat stress using relaxation techniques in the following chapter.

RELIEF IS IN SIGHT FOR HEADACHE SUFFERERS!

As you can see from what we've discussed so far, there are a number of triggers that headache sufferers need to be aware of. Before turning to pharmaceutical drugs (which temporarily relieve the pain but cause harmful side-effects), it makes sense to consider what factors might be the underlying reason for a person's headaches. Whether you experience occasional headaches or frequent migraines, everyone can feel the health benefits of avoiding chemical food additives and buying fresh, organic food to have better control over what goes into their bodies. Try it yourself and your body will thank you!

Copyright © All Rights Reserved

CHAPTER 4: DRUG-FREE HEADACHE REMEDIES

In this Chapter, you will learn more about a number of techniques and massage modalities that can be used to address the true cause of head pain.

History tells us that people have been looking for ways to relieve their headaches since the earliest human civilizations. Hundreds of years ago, without even a general understanding of what caused headache pain, people were willing to go so far as to drill holes in the skull, hoping to alleviate the pressure and tension they experienced. The Ebers Papyrus,²¹ which is thought to be the oldest medical manuscript, was discovered at Thebes, Egypt. It dates from 1534 to 3000 B.C. and contains descriptions of 12

different types of headaches and their treatments.

Centuries later, in 1886, Atlanta pharmacist John Pemberton started the search for a quick, easy and affordable headache treatment. His search led to the development of the world's most famous brand: Coca-Cola! Believe it or not, in its early days, Coke was actually advertised as a headache reliever or 'the ideal brain tonic!'²²



Today, modern medicine has led to the discovery and development of dozens of pain-relieving pharmaceutical drugs. However, clinical experience has proven time again that each of these drugs runs the risk of undesirable risks and side effects. There are a number of reasons why your clients may wish to limit or eliminate the prescription drugs that are commonly given to headache sufferers. The use of drugs over a long-term period may:

Copyright © All Rights Reserved

Melissa M. Wood, ND, MTI, LMT 41

- Lead to a cycle of rebound headaches due to overuse
- Worsen other medical conditions
- Cause side effects or become ineffective over time

REBOUND HEADACHES (ALSO CALLED MEDICATION OVERUSE HEADACHES or CHRONIC DAILY HEADACHES)

This type of headache puts the sufferer into a lose-lose situation. When a person experiences frequent headaches, they may be prescribed a medication to relieve pain. Or a person may choose to self-medicate using a variety of over-the-counter analgesics and pain relievers. Unfortunately, after taking a certain drug for migraines two or three times per week, the body quickly gets used to the medication. And as we all know, the human body is smart. It will remember what it needed to do to get the medication in the first place – create a headache – and do it again and again. A rebound headache is easy to recognize because it doesn't come with any of the usual secondary symptoms of migraine.

Many Americans are completely unaware of the dangerous side effects of pharmaceutical drugs. Almost any pain relief medication can put a person at risk for rebound headaches, including Aspirin, Tylenol and Advil. However, the medications that are most problematic are:

Analgesic Combinations: drugs that combine aspirin and acetaminophen with caffeine and in some cases a sedative. (Fiorinal and Esgic). According to the Cleveland Clinic, overuse of these drugs may interfere with the brain centers that regulate the flow of pain messages to the nervous system, which makes headache pain worse.²³ The clinic further warns: "This rebound Copyright © All Rights Reserved Melissa M. Wood, ND, MTI, LMT syndrome is especially dangerous if your medication contains caffeine, which is often included in many medications to speed up the reaction of the other ingredients. ... Taking larger or more frequent doses of the offending



immediate relief medication is not recommended. This not only exposes the person to a higher level of the medication's harmful ingredients makes but the headache worse and continue indefinitely."

In addition to the rebound headache, overuse of analgesics can lead to addiction, more intense pain when the medication wears off, and possible serious side effects.

Opiates (Narcotic analgesics): Opium derived compounds that may include codeine and acetaminophen (Tylenol 3 & 4 with codeine).

These drugs put people at increased risk of liver damage, especially if the person consumes alcoholic beverages while taking them. Since opiates affect the central nervous system, they can cause dangerous drug interactions, so physicians and dentists need to be notified when a person uses a narcotic analgesic before giving sedation or anesthetic. This medication is not recommended for people who drive, operate heavy machinery, or do anything else that require mental alertness, since it causes people to feel drowsy, lightheaded, or to experience a false sense of well-being.

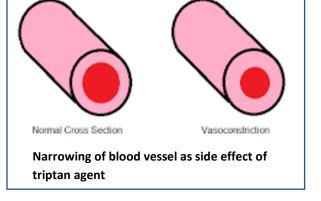
Copyright C All Rights Reserved

Other common side effects can include blurred or double vision; digestive problems; headache (!); sleep disruptions; rapid breathing or shortness of breath and convulsions or seizures.

Triptans: Often prescribed for migraines using various triptan agents.

The most significant side effect of triptans is vasoconstriction, so they are contraindicated in people with heart disease, hypertension or peripheral artery disease.²⁴

Even when a triptan type drug is



successful in relieving headache pain, studies show that the migraine often reoccurs 12 hours later. When a repeat dose is taken, the headache can reemerge, which puts the sufferer at risk of medication overuse. The reason for recurrence is simple logic that is supported by a number of scientific studies.



Triptans only temporarily relieve the symptoms without treating the underlying disorder. Patients who use triptans also report that even when the medication relieves the pain, they can sense by their secondary symptoms that the headache is still present, which indicates that they are a band-aid solution at best!

"80% of the patients referred to our center have chronic daily headache, and 80% are overusing a variety of over-the-counter (OTC) medications and prescription medications, mostly barbituratecontaining products (Fiorinal, Fioricet--both with and without codeine, Esgic and the like) and opiates (Vicodin, Lortab, Percocet, Percodan, and others). The problem of overuse is not confined to prescription medications. As one example, I can think of a man I saw in his late forties who, prior to seeing us, had been using eight ibuprofen tablets (Advil) per day for two years initially for episodic headache, which became daily over time. He began to notice black tarry stools and subsequently almost died secondary to developing three gastric ulcers that bled to the point where he went into hypovolemic shock...He was lucky – he lived. The story of Kellie...did not have such an ending. This seventeen-year-old girl with her entire life ahead of her died as a result of taking 'just Tylenol' in quantities sufficient to cause acute liver and kidney failure! These stories are but a few of the tragedies that can occur with 'just headache.' (By the way, ever seen side effects and warnings on TV commercials for OTC products, the way you do for prescription products? I haven't)."

From Dr. Fred Sheftell, M.D. and Director and Founder of the New England Center for Headache, Chairman of the World Headache Alliance in the book: Living Well with Migraine Disease and Headaches.

A news outlet in the UK also reported recently that painkillers make a million people's headaches worse.²⁵ Studies show that 5 out of 6 of these people



are women who rely on over-the-counter medications like aspirin and ibuprofen on an almost daily basis. Sadly, in actual fact, these drugs are aggravating their symptoms and increasing their pain. The suggests according to official article advice from the National Institute for Health and Clinical Excellence that instead of reaching for drugs to combat symptoms, headache sufferers should use

treatments like massage, essential oils, or relaxation techniques that address the cause of their pain. (Remedies like these will be discussed in detail further in this chapter).

If one of your clients has been told they suffer from rebound headaches, they will understandably feel frustrated and perhaps even worry about being perceived as an addict. The only way to break the cycle is to discontinue the medication that has caused them in the first place. But withdrawal will take time, and, in most cases, the person will need supervision to make sure that the rebound headaches do not become worse. During the withdrawal period, massage therapy can play an important role in relieving the pain and other symptoms.

Distinguishing symptoms of a rebound headache:

- Pain occurs daily and lasts 8-12 hours
- Episodes begin mildly with spikes of severe pain
- Pain is triggered by even slight physical or mental exertion
- Nausea
- Restlessness, anxiety, irritability
- Memory loss and difficulty concentrating
- Depression

OTHER PRESCRIPTION OR OTC DRUGS THAT CAUSE HEADACHE PAIN

The medication "cocktail" your doctor prescribes for conditions like high cholesterol may be causing unforeseen side effects like chronic or rebound headaches (Rebound headaches were described in the preceding pages). This is



another reason why it's always important to address the actual cause of a health problem before throwing a drug – or several – at it.

Working with holistic practitioners (like Chiropractors, Naturopaths or Acupuncturists) is often an answer for many headache sufferers because those practitioners *address the underlying cause of the headaches* and typically do NOT prescribe medication that merely masks symptoms.

The following medications are also known to either trigger a migraine or aggravate an existing headache:²⁶

- Heart and blood pressure medications such as nitroglycerin
- Acid blockers and other anti-ulcer gastrointestinal medications
- Hormonal contraceptives and synthetic estrogens, HRTs
- Antibiotics
- NSAIDs non-steroidal anti-inflammatory drugs



To break the vicious cycle of headaches that may result from these medications, a person will need help. During the withdrawal period, a client may request massage therapy techniques to alleviate some of the

withdrawal symptoms. They may require a combination of interventions such as medical supervision; the support of other complementary medicine practitioners; and in severe instances, hospitalizations until all withdrawal symptoms subside. In recent years, more and more headache sufferers have started looking for safer, gentler non-medication therapies. For many people, the attraction of alternative therapies like massage is that they involve human touch and a personalized treatment plan. Massage therapists can take the lead in educating their clients in this area. In addition to providing therapeutic massage treatments, you can also encourage your clients who suffer from headaches to make healthy, positive changes in their daily routine and implement strategies to help manage stress and relax.

COULD YOU BE DEHYDRATED?

The first line of treatment for many headaches is as simple as drinking water. Headaches are often triggered by the chemical imbalance that results from even mild dehydration. When the body is deprived of the water it needs, the salinity, and in turn the osmotic pressure of the cerebrospinal fluid in the cranium increases. The cure for this type of painful head pressure is adequate hydration – which means drinking enough pure water to meet the body's daily needs.

See <u>http://stayhealthyandwell.com/water-the-other-drink/</u> for more information on the importance of drinking enough pure water –

essential for you and your client's health!

GENTLE AND EFFECTIVE HOLISTIC TREATMENTS FOR HEADACHE PAIN:

Cranial Sacral Therapy

Cranial-sacral therapy (CST) is one of the most effective modalities that trained therapists can use to help their clients combat headaches that come from structural imbalances. Not only can CST reduce the symptoms of headaches while they are happening, but it can also promote the proper alignment necessary to prevent future attacks from occurring.

CST is based on the principle that the cranial bones are not static, but like other bones, are designed for movement. The sutures that hold the skull bones allow for slight movement to adapt to changes in intracranial pressure. By gently manipulating these structures, a therapist can reduce intracranial pressure that causes headaches by increasing the flow of cerebrospinal fluid around the cranium, down the spinal column and surrounding the sacrum.

For a detailed description of specific cranial-sacral techniques used to treat different types of headache pain, follow the link below:

The Dual Concept Massage Approach to Headaches:

http://www.integrative-

healthcare.org/mt/archives/2005/07/the dual concep.html

Essential Oils



Aromatherapy is an ancient healing modality that uses essential oils derived from the leaves, flowers, roots or bark of medicinal plants. By having a client inhale the oils or by massaging them into the client's skin, the oils can be used to treat headaches and a number of other conditions.

The type of essential oils indicated depends on the type of headache you are endeavoring to treat. Peppermint and eucalyptus have been found to be particularly helpful in relieving tension headaches.

(When treating a migraine sufferer, one caution for therapists when using essential oils is to make sure that the client does not find one of the oils you use to be a migraine trigger).

Therapeutic essential oils have amazing effects on the human body. This is most likely due to the fact that our chemical makeup and that of an essential oil are very similar in nature. The unique chemical structures of therapeutic oils allow them to rapidly penetrate cell membranes, travel through our blood stream and improve cellular function.

In the bloodstream, essential oils have significant anti-inflammatory effects – they help by fighting infection, bringing oxygen and nutrition to tissues while at the same time, helping dispose of waste products and toxins. This increases the immune system function and aids in healing. They also act positively on the central nervous system, which helps to reduce or eliminate

Copyright © All Rights Reserved

pain, change physiology in the body and affect brain and mood function. Oils like lavender and chamomile can be relaxing and others like geranium have the ability to bring about balance. For headaches due to hormonal imbalances, Clary Sage and Sage (which both contain the constituent scleral) have an estrogenic action on the body and are helpful for regulating and balancing hormones.

When therapeutic essential oils are combined with massage, the healing session gets intensified and oftentimes the client will report a sense of euphoria. Even if an essential oil does not completely relieve your client's headache, it will help them to relax. The benefits of relaxation during a migraine attack or severe headache are enormous. Essential oils can do much to lessen the accompanying nausea, tension and sleep disruption. In addition to the essential oils already mentioned, experts recommend chamomile, Melissa, jasmine and rosemary for headaches and peppermint to address any accompanying nausea.²⁷

Acupressure

Acupressure is an ancient method of finger pressure massage based on the principles of Traditional Chinese medicine. It targets the 12 energy meridians (special invisible pathways within the body) to remove blockages



that inhibit the flow of vital energy (called Chi). Clearing up these blockagesis thought to relieve pain. Acupressure often requires several sessions beforeCopyright © All Rights ReservedMelissa M. Wood, ND, MTI, LMT

the client will notice an improvement in their symptoms. Your clients should also be encouraged to schedule regular ongoing sessions once the blockages have been cleared as a form of preventative medicine to prevent their headache from returning.

Emotional Freedom Technique (EFT)

EFT is another modality that releases energy blockages to improve a person's emotional health. You may have read about <u>Emotional Freedom Technique</u> (<u>EFT</u>) on the Web without really understanding how easy it is to learn and master or appreciating just how effective a tool it can be.

Although the importance of emotional health is largely overlooked, it is absolutely essential to a person's physical health and well-being. EFT helps to eliminate long held emotional barriers and often works when nothing else will.

The EFT tool is a form of acupuncture, without the use of invasive needles. Instead of the sharp stuff, your fingertips tap on various meridian points throughout your body to release energy blockages that, left untreated, can create emotional problems and be very detrimental to your well being.

This technique often provides very rapid and long-lasting results for many different emotional health issues. Among them:

- Trauma
- Abuse
- Stress

- Anxiety
- Fears
- Phobias
- Depression
- Grief
- Addictive cravings (food, cigarettes, alcohol, drugs, etc.)
- Hundreds of physical symptoms like chronic headaches, body pains and some breathing difficulties.

Gary Craig, the pioneer of EFT, developed this technique more than a decade ago and has been using it with extremely successful results. Because of its high success rate, even medical practitioners are using EFT as part of their practice. If you would like to learn more about using this technique to treat headaches and other illnesses you encounter in your massage practice, visit Gary Craig's site on <u>EFT</u> to learn more about this wonderful tool and download a free manual. There are videos on his site you can watch that explain this powerful technique in more detail.



MASSAGE

Massage therapy is one of the most helpful treatments available in alleviating tension type headaches, or migraines that are triggered by tension. Modalities like Swedish massage, deep tissue bodywork and hydrotherapy can be used individually or in combination to address the true cause of a person's recurrent headaches. Studies have shown that massage (as well as acupuncture, chiropractic and osteopathic therapy) are beneficial in alleviating tight muscles and reducing pain sensors. Studies of chronic headache sufferers showed that structured massage therapy treatment directed toward the neck and shoulder muscles was successful in reducing both the number and duration of headaches.²⁸ ²⁹

No matter what the type of headache pain, massage therapy offers vital benefits to headache sufferers. Massage has been proven to help:

- relieve actual headache pain by easing stress and promoting deep relaxation
- prevent headaches by reducing muscle tension and improving circulation to the affected areas
- addressing structural imbalances that cause chronic headaches

1. Easing Stress

The relaxation benefits that come from a massage cannot be underemphasized when it comes to relieving headaches. Easing stress and creating periods of deep relaxation that last for hours or days following a treatment has far reaching benefits in



reducing the pain of existing headache and lowering the risk of repeat attacks.Copyright © All Rights ReservedMelissa M. Wood, ND, MTI, LMT55

If you treat a client who has difficulty letting go of stress, there are several relaxation techniques that can help. As you begin the massage, remind your client to breathe deeply and rhythmically. Using stress-relieving essential oils, hot stone therapy or other modalities that you are familiar with will also encourage your client to let go of built-up mental tension. The simple step of providing a dark, quiet room and perhaps soft, relaxing music can go a long way in creating a calm and restful environment that will be an oasis from stress for your clients.

To learn more about how the body responds to stress and how to combat it, take a look at our <u>Stress and the Immune System class.</u>

2. Release of contracted muscles

A skilled massage therapist will be able to identify the muscle tension that contributes to their client's headache and use the proper technique to release it. The areas that are most often affected by contracted musculature are the



trapezius, deltoids, splenius capitis, levator scapula, rhomboids, supraspinatus and infraspinatus. The scalenes can also be a source of muscle tension, particularly for people that get a lot of neck tension. In tension headaches, the blood vessels that

supply oxygen to the neck and shoulder muscles are constricted, which forces these parts of the body to work with insufficient nutrients. This leads to a painful combination of muscle spasm and poor blood supply, which is the main culprit in most headaches. Spending extra time massaging these groups of

Copyright C All Rights Reserved

muscles, using essential oils and/or performing some acupressure techniques can go a long way to helping those muscles relax, thus easing the headache discomfort for your client.

For longer lasting results, you can provide your massage clients with activities they can do by themselves between treatments. You can create a short

routine that includes stretching, ergonomic adjustments, and posture checks (especially for clients who do repetitive work) and relaxation techniques (described in more detail below) to relieve stiffness and prevent recurring tension headaches.



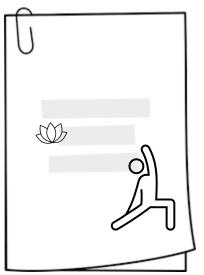
57

3. Structural Alignment

Beyond muscle tension, a structural imbalance is often the root cause of chronic headaches. Releasing tense muscles will bring headache relief, but the results will only be temporary if there is an underlying structural cranial imbalance. If a massage therapist only treats the area that appears to be contracted, they may actually contribute to the structural imbalance that is causing the headache. To avoid this risk, therapists should first address any alignment issues and then proceed with deep tissue and muscle work, which will provide the client with the longest lasting benefits.

"When the head, neck and shoulders are released back into an improved structural alignment, the musculature in the back of the neck and tops of [the] Copyright © All Rights Reserved Melissa M. Wood, ND, MTI, LMT shoulders will have already relaxed because it is no longer compensating for the forward head posture. The work on the soft tissue of the back of the neck and tops of shoulders can then be deeper and more effective."

- Don McCann, MA, LMT, LMHC, in the May/June 2004 edition of The Massage Message



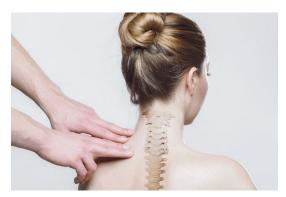
Again, you may find it helpful to provide your client with "homework" exercises they can do in between massage treatments. Make sure to emphasize that they may need to adapt their posture and work habits in order to maintain their structural alignment and prevent future headaches. Suggest daily stretches that help to alleviate tight muscles in the neck and trapezius and strengthen these areas since the combination of poor posture, tension and muscle

weakness are a recipe for chronic head pain.

ADDRESSING HEADACHE TRIGGERS IN THE HEAD, NECK AND SHOULDERS

With an understanding of the key factors that come into play in a successful treatment for headaches, it's also important for a massage therapist to use the most effective techniques to release the areas of soft tissue and muscle contractions that cause headaches.

As was mentioned previously, although almost all headache sufferers will report feeling tightness in the neck and tops of shoulders, if you focus the treatment only on these areas, you may actually make the structural Copyright © All Rights Reserved Melissa M. Wood, ND, MTI, LMT imbalance worse. In 90% of people who complain of headaches, you will observe that the cervical vertebrae are misaligned, causing the head and neck to protrude forward from the shoulders. This posture forces the muscles in the back of the neck to contract unnaturally in an effort to hold the weight of the head (which averages 11 lbs.!)



Using massage techniques that encourage proper alignment of the head, neck, and shoulders before working on the muscle tension will allow you to successfully treat the headache trigger points on the tops of the shoulders and the back of the neck.

With an improved cervical alignment, the musculature in the back of the neck and tops of shoulders will not have to compensate for a forward head posture, leaving the muscles much more relaxed and pliable. You can then proceed with deep tissue work that will much more comfortable and effective for your client. Your clients will thank you for the deep feeling of relief!

If your client experiences more severe types of headache, especially cluster or migraine attacks, the structural work they require may be more widespread. It may be advisable to start by working the supporting muscles on the front of the chest and the neck first, before moving to the back of the neck and tops of shoulders. This will alleviate triggers in the levator scapula, splenius capitus, supraspinatus, trapezius and rhomboids and improve the flow of cerebral spinal fluid and blood circulation to the cranium and brain. This double-ended benefit is often successful in bringing relief to clients with the most severe types of headache pain.

Copyright © All Rights Reserved

MORE SIMPLE WAYS TO RELIEVE HEADACHES

Successfully treating headaches often requires a number of remedies that can be used over time. Instead of reaching for conventional headache and pain drugs as a Band-Aid solution, there are a number of tried-and-true ways to take the edge off of the pain during acute episodes and speed recovery in the long run. In conjunction with the massage techniques we've described above, these simple remedies will decrease the frequency and severity of headache episodes.

HOT WATER SOAK

Drawing the congestion of blood away from the head and down toward the feet, will often relieve a pounding headache. To do this, start by soaking your feet in a basin of hot water. (You can also sit on the side of a bathtub). While your feet are submerged, place a cold pack to the back of your head. Keep your feet in the bath for up to 30 minutes at a time, and repeat as often as necessary, until the headache subsides. Depending on your work environment, you may



be able to offer a warm soak for your clients or warm towels to wrap their feet....this can be surprisingly effective and you can let them know how to do this at home too.

GINGER TEA

Ginger is a well-known anti-inflammatory that has been used for hundreds of years to treat headaches, and it seems to work. Grind up a half-teaspoon of fresh ginger, stir it into a glass of water, and drink the "ginger juice." Or you can pour 1 cup of hot water over 1 teaspoon of freshly ground ginger, let the tea cool a bit, then drink it.

Ginger is especially effective in combating migraines, though how it works is not well understood. Doctors do know that ginger has an effect on prostaglandins, which are hormone-like substances that can contribute to inflammation that leads to head and neck pain. Ginger also helps to control the nausea that so often accompanies migraines.



OTHER TEA-BASED REMEDIES

To soothe headache pain that affects the eyes, temples and sinus areas try wringing out two wet peppermint tea bags and place them on your closed eyelids or forehead for five-minute periods.

During an acute headache, a hot cup of rosemary tea is reported to keep the headache from getting worse. Pour 1 cup of boiling water over 1 teaspoon of the dried herb, steep for 10 minutes, strain, and drink.

RELAXATION TECHNIQUES



Relaxation techniques are one of the most powerful skills a person can develop when headaches develop under a heavy burden of stress. Allowing time for deep relaxation helps to reduce anxiety, stay centered and remain productive and happy in spite of heavy demands on our minds and bodies. Keep in mind that these techniques do not come naturally to all people and it may require time and effort to learn to do them effectively.

Deep Breathing and Breath Focus:

Learning to do deep breathing means that you start redeveloping a skill that came naturally to you as a child. Most adults develop the habit of breathing shallowly from the chest, whereas young children instinctively breathe from the abdomen.

Start by finding a quiet, comfortable place to sit or lie down. Pay attention to your breathing and notice the difference in your body when you breathe normally compared to when you breathe deeply from your diaphragm. Shallow breathing from your chest often feels tense and restricted while deep breathing helps your whole body to feel relaxed. You'll know when you are breathing properly when the air you inhale moves downward into your lower belly, expanding your abdomen. Try to exhale completely, breathing out through your mouth and letting yourself sigh out loud. Take time to do this for 20 minutes each day to promote good health and relieve stress.

Copyright © All Rights Reserved

Once you've mastered deep breathing, you can move on to the skill of breath focus. As you sit or lie comfortably with your eyes closed, breathing deeply, let your mind focus on calming imagery or a phrase that helps you to feel mentally relaxed. As you inhale, imagine that the air you breathe in fills your body with a wave of peace and calm. As you exhale, imagine the air carrying away all of your tension and anxiety. Gradually work your way up for a few minutes of breath focus to a 20-minute period.

When treating a client with an acute headache, why not go the extra mile and offer some of these simple remedies in addition to the massage? With just a small amount of effort and forethought, you could have ginger tea available to offer your clients following a massage session or make a foot soak available to help extend their feeling of relaxation.



Offering cold stones on the face and/or neck or a cool eye pillow during massage treatments could be beneficial. If your client has difficulty letting go of tension, you could easily sit with them and walk them through one or two of the breathing exercises (described in the box below) until they have mastered them well enough to do at home. Those are all extra special services

that your clients will appreciate in addition to the massage and that will help you to cement a lasting client-therapist relationship!

Mini Relaxations



Mini relaxations are so helpful in releasing tension that can build up during the course of the day. They allay stress and pain that arise when you're faced with a last-minute meeting, dealing with an uncooperative co-worker or in the middle of long commute home from work. Here are a few quick relaxation techniques to try.

If you have 1 minute: While sitting comfortably, take a few slow deep

breaths and quietly repeat to yourself "I am" as you inhale and "at peace" as you exhale. Repeat this exercise slowly two or three times. Then let your entire body relax into the support of the chair.

If you have 2 minutes: Count down slowly from 10 to zero. As you say each number, take a complete breath, inhaling and exhaling. For example, breathe in deeply saying "10" to yourself. Breathe out slowly. On your next breath, say "nine," and so on. Make sure to count slowly enough that you don't start to feel lightheaded. By the time you reach zero, you should feel more relaxed. If not, start again and count down from 10 until the anxiety is relieved.

If you have 3 minutes: While sitting quietly, take a break from whatever activity you're doing and scan your body for tension. Start with your head by relaxing your facial muscles and allowing your jaw to fall open slightly. Let your Copyright © All Rights Reserved Melissa M. Wood, ND, MTI, LMT shoulders drop and your arms fall naturally at your sides. Make sure your hands are loose enough to leave spaces between your fingers. Uncross your legs and feel your thighs sink into your chair, letting your legs fall comfortably apart. Notice the sensation of your shins and calves becoming heavier and your feet planting themselves into the floor. Now breathe in and out slowly, letting your body relax even more with each breath. ³⁰

CONCLUSION

Headaches are part of the human experience. However, for millions of Americans, chronic headaches are extremely painful and debilitating. By reviewing the most current research on headaches in this e-book, you have equipped yourself with important tools that can be used in your massage therapy practice. Remember that of all the treatments we've described in this class, only massage can be used to simultaneously improve blood flow, increases oxygenation of the blood, enhance muscle relaxation, correct structural misalignment and stimulate the production of feel-good endorphins – all in a drug-free way!

The prescription drugs and invasive procedures like nerve blocks that are often prescribed for recurrent headaches can cause harmful side effects. Worst of all, many sufferers, especially those with cervicogenic headaches do not respond at all to medications³¹ and put themselves in danger of developing rebound headaches. Because of the well-known risks associated with conventional headache treatments and the lack of scientific support for them, more and more people are taking a new look at their symptoms and are

seeking ways to treat the underlying cause of their headache pain. By putting the information in this class into practice, you can be the first step in your client's recovery so that they can look forward to a more enjoyable and pain-free life.



SOURCES, REFERENCES, & ENDNOTES

Cervicogenic headache in the general population: the Akershus study of chronic headache. By Knackstedt H, Bansevicius D, Aaseth K, Grande RB, Lundqvist C, Russell MB <u>http://www.ncbi.nlm.nih.gov/pubmed/20974607</u>.

Review: Cervicogenic headache after whiplash injury. Drottning M Curr Pain Headache Rep. 2003 Oct; 7(5):384-6.

Book: The Headache Cure, page 63; "Cervicogenic" headache. An hypothesis. Sjaastad O, Saunte C, Hovdahl H, Breivik H, Grønbaek E. Cephalalgia. 1983 Dec; 3(4):249-56.

Lancet Neurol. 2009 Oct;8(10):959-68. Cervicogenic headache: an assessment of the evidence on clinical diagnosis, invasive tests, and treatment.

Book: The Gorgeously Green Diet, by Sophie Uliano

Robert, Teri; Rome, Tammy. Migraine Fact Sheet. Migraine Disease.Org. Updated 19 May 2018. Accessed 24 Jan 2022. <u>https://migrainedisease.org/facts/migraine-fact-</u> <u>sheet/#:~:text=Migraine%20is%20the%207th%20leading,preverbal%20children%20to%20the%20elderly.</u>

Book: The Gorgeously Green Diet, by Sophie Uliano

1 Lebedeva, E.R., Ushenin, A.V., Gurary, N.M. et al. J Headache Pain 21, 70 (2020). <u>https://doi.org/10.1186/s10194-020-01140-3</u>. BMC. The Journal of Headache and Pain. Sentinel headache as a warning symptom of ischemic stroke. Published 10 June 2020. Acc. 20 December 2021.

https://thejournalofheadacheandpain.biomedcentral.com/articles/10.1186/s10194-020-01140-3.

2 National Headache Foundation Factsheet. Acc. 20 December 2021. <u>http://www.health-exchange.net/pdfdb/headfactEng.pd</u>f

3 Wilkins, AJ. Lighting Res. Technol. 2016; Vol. 48: 44–54. Sept. 2015. Physiological basis for visual discomfort: Application in lighting design. Acc. 22 May 22. <u>https://journals.sagepub.com/doi/pdf/10.1177/1477153515612526.</u> <u>https://www.thenbs.com/knowledge/looking-at-buildings-can-actually-give-people-headaches-heres-how.</u>

4 Basbaum, Allan, PhD, FRS. If the brain can't feel pain, why do I get headaches? Published 24 Sep 2014. Acc. 20 Dec 2021. <u>https://www.brainfacts.org/ask-an-expert/if-the-brain-cant-feel-pain-why-do-i-get-headaches.</u>

5 Famous Celebrities with Migraine. Published 13 April 2017. Acc. 29 December 2021. <u>https://migrainebuddy.com/famous-celebrities-with-migraine/</u>

6 The International Classification of Headache Disorders, Cephalgia. 2018, Vol. 38(I) 1-2111. <u>https://ichd-3.org/wp-content/uploads/2018/01/The-International-Classification-of-Headache-Disorders-3rd-Edition-2018.pdf</u>

7 WebMD. Reviewed by Cassoobhoy, Arefa, MD, MPH. Tension Headaches. 20 Nov 2020. Acc. 30 Dec 2021. https://www.webmd.com/migraines-headaches/tension-headaches

8 WebMD. Reviewed by Cassoobhoy, Arefa, MD, MPH. Tension Headaches. 20 Nov 2020. Acc. 30 Dec 2021. https://www.webmd.com/migraines-headaches/tension-headaches. 9Mayo Clinic Staff. Mayo Clinic. Tension Headache. Updated Sep 2021. Acc. 20 Jan 2022. https://www.mayoclinic.org/diseases-conditions/tension-headache/symptoms-causes/syc-20353977.

10 Silberstein, Stephen. et al. Headache in Primary Care.

11 Ibid. Mayo Clinic Staff. Mayo Clinic. Tension Headache.

12 Steiner, T.J., Stovner, L.J., et al. The Journal of Headache and Pain. Article number 137 (2020). Published 02 December 2020. Acc Dec 2021. <u>https://thejournalofheadacheandpain.biomedcentral.com/articles/10.1186/s10194-020-01208-0.</u>

13 Swanson, Jerry. The Mayo Clinic on Headache Book, page 111. Released August 2004.

14 American Migraine Foundation. Basics of Cervicogenic Headaches. Published 24 Oct. 2016. Acc. 28 Jan 2022. https://americanmigrainefoundation.org/resource-library/cervicogenic-headache/.

15 Knackstedt H, Bansevicius D, Aaseth K, Grande RB, Lundqvist C, Russell MB . Cervicogenic headache in the general population: the Akershus study of chronic headache. Published 19 May 2010. Acc. 28 Jan 2022. <u>http://www.ncbi.nlm.nih.gov/pubmed/20974607.</u>

16 Page, Phil. PhD, PT, ATC, CSCS, FACSM. Cervicogenic Headaches: An evidence-led Approach to Clinical Management. Published Sep 2011. Acc. 28 Jan 2022. <u>http://www.ncbi.nlm.nih.gov/pmc/articles/PMC3201065/.</u>

Dtrottning, Monica. Review: Cervicogenic headache after whiplash injury. National Library of Medicine. 7(5):384 Rep. Oct 2003. Acc. 28 Jan 2022. <u>https://pubmed.ncbi.nlm.nih.gov/12946292/.</u>

18 The Headache Cure, page 63; "Cervicogenic" headache. An hypothesis. Sjaastad O, Saunte C, Hovdahl H, Breivik H, Grønbaek E. Cephalalgia. Dec 1983. 3(4):249-56.

19 Book: The Headache Cure, page 47.

20 See also http://stayhealthyandwell.com/causes-of-chronic-headaches/.

21 Living Well with Migraine Disease and Headaches - What your Doctor Doesn't Tell You--that You Need to Know by Robert, Teri.

22 Benjamin Jr., Ludy T. Coca-Cola – Brain tonic or poison? Published Nov. 2010. Acc. 3 Feb 2022. https://thepsychologist.bps.org.uk/volume-23/edition-11/coca-cola-%E2%80%93-brain-tonic-or-poison.

23 Cleveland Clinic. Acc. 3 Feb 2022. https://my.clevelandclinic.org/health/treatments/12058-pain-relievers.

24 Borkum, Jonathan M. Chronic Headaches: Biology, Psychology, and Behavioral Treatment. Published Feb 2007. pg 253-255.

25 Gallagher, James. BBC News. Published 19 Sep 2012. Acc. 3 Feb 2022. <u>https://www.bbc.com/news/health-19622016#:~:text=Up%20to%20a%20million%20people,then%20caused%20even%20more%20headaches.</u>

26 Book: The Mayo Clinic on Headache, page 49

27 Robert, Teri. Living Well with Migraine Disease and Headaches - What your Doctor Doesn't Tell You--that You Need to Know. Published Nov 2005. pg 152, 153.

28 Am J Public Health. 2002 October; 92(10): 1657–1661.

Massage Therapy and Frequency of Chronic Tension Headaches, Christopher Quinn, DC, Clint Chandler, BS, and Albert Moraska, PhD <u>http://www.ncbi.nlm.nih.gov/pmc/articles/PMC1447303/.</u>

29Tahere Rezaeian, PhD, PT,a Zahra Mosallanezhad, PhD, PT,a, et all. The Impact of Soft Tissue Techniques in the Management of Migraine Headache: A Randomized Controlled Trial. Dec 2019. Published online Aug. 2020. Acc. 3 Feb 2022. https://www.ncbi.nlm.nih.gov/pmc/articles/PMC7486477/.

30 Based on: Harvard Women's Health Watch - Relaxation techniques: Breath focus July 2008 http://www.health.harvard.edu/newsletters/Harvard_Womens_Health_Watch/2008/July/relaxation_techniques_breath_fo cus

31 Lancet Neurol. 2009 Oct;8(10):959-68. Cervicogenic headache: an assessment of the evidence on clinical diagnosis, invasive tests, and treatment.