Mod 2 Headaches



HEADACHE: *Prevalence and Impact*

PREVALENCE

- 18-25 % women have headaches
- 6-10 % men have headaches
- 5% of women have headaches more than 15 days per month
- 112 million bedridden days per year
- Cost to U.S. Employers -- \$13 Billion per year
- The majority of patients with migraine have not received an appropriate diagnosis, and are not receiving appropriate treatment

Myth

Headaches that are triggered by weather or are associated with sinus symptoms are not migraines.

Fact

- Up to 50% of migraine patients report their headaches are influenced by weather¹
- 45% of migraine patients report sinus symptoms including²
 - Lacrimation
 - Nasal congestion
 - Rhinorrhea
- 1. Raskin NH. Headache. 2nd ed. New York: Churchill Livingstone; 1998.
- 2. Barbanti P et al. Cephalalgia. 2001;21:295.

Chronic Daily Headache

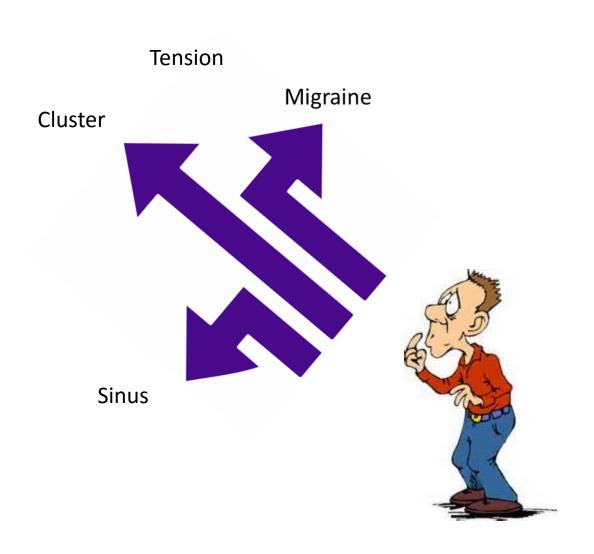
Affects 10-15% of the population.

Chronic daily headaches are classified by how long they last — more than four hours or less than four hours.

The longer lasting headaches are more common and addressed here.
They're divided into four types:

- Migraine
- Tension-type headache
- Cluster
- Sinus

Types of More Common Headaches



COMMON TYPES OF HEADACHES

PRIMARY HEADACHES

- MIGRAINE
- TENSION TYPE
- CLUSTER HEADACHE
- SINUS
- SECONDARY HEADACHES
- Headaches due to infection
- Headaches due to vascular causes
- Headaches due to tumors
- Etc., etc.

Headache Patterns (4)

Headaches

Sinus: pain is behind browbone and/or cheekbones



Cluster: pain is in and around one eye



Tension:
pain is
like a band
squeezing
the head



Migraine: pain, nausea and visual changes are typical of classic form



Chronic migraine

These headaches evolve from episodic migraine without aura.

To be diagnosed with chronic migraine, you must have headaches

- 1. 15 days or more a month, for at least three months.
- 2. In addition, on eight or more days a month for at least three months, you must experience the following symptoms.

Your headaches have at least <u>two</u> of the following characteristics:

- Affect only one side of your head
- Cause a pulsating, throbbing sensation
- Cause moderate to severe pain
- Are aggravated by routine physical activity
- And they cause at least one of the following:
- Nausea, vomiting or both
- Sensitivity to light and sound

Migraine ("half-head")

Frequency

1-2/year- 2-3/week

Pain

moderate - severe pulsating, throbbing

Duration

4 hrs - 3 days

Location

usually one sided (but can switch sides between attacks)

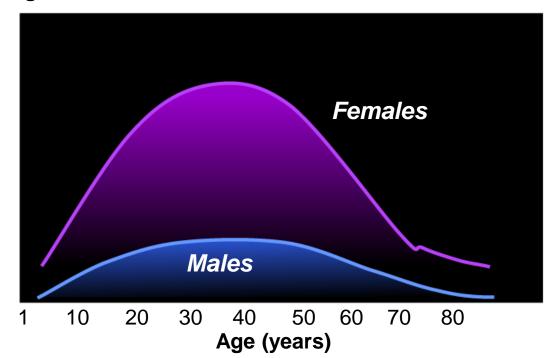
Symptoms

aura, nausea, vomiting sensitive to light, sound, smells

Who gets migraines?

Migraine Prevalence %

About 20% of women get migraine at one time or another in their life



Migraine peaks during the most productive time... 30-60 years of age

Migraine is disabling – some miss work, school or activities; many have reduced productivity during attacks

Migraine Classification

Table 3. 2004 International Headache Society Classification Of Headache Disorders: Criteria For Pediatric Migraine Without Aura.

- A. More than 5 attacks fulfilling features B–D
- B. Headache attack lasting 1 to 48 hours
- C. Headache has at least 2 of the following 4 features:
 - 1. Either bilateral or unilateral (frontal/temporal) location
 - Pulsating quality
 - Moderate to severe intensity
 - Aggravated by routine physical activities
- D. At least 1 of the following accompanies headache:
 - Nausea and/or vomiting
 - Photophobia and phonophobia (observe behavior)

^{*}Source: Adapted from the Headache Classification Committee of the International Headache Society. *Cephalgia* 1998;(8 Suppl 7):1-96. See Reference 20.

Typical migraine patient

- Onset often as child / teenager / young adult
- But can start at any age

- 2-3 x more common in women than men
- Typical patient : young woman (15% of all young women)

Triggers

- foods: spices, wine, chocolate, citrus
- food additives: monosodium glutamate
- sleep: both too much and too little
- stress: mainly offset
- female hormones : fluctuating or falling estrogen

Migrainous Aura

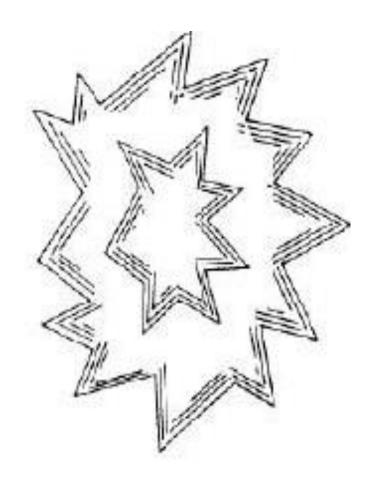


Migrainous Aura

selves through the usual round of work and play, a degree ness and a desire for rest are characteristic of week michains. A vascular hold is exquisitely see to took head maken itself enforce at they be we to took only, or even the chief, metal mism at work. Maken ments during an attack and exhibit diminished tone of skeletal droves.

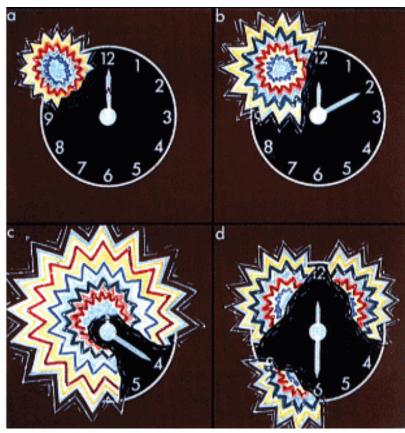
The relation of sle one, and we will h or tourn upon it in many cope and stupor in the acutest contexts: the in ad classical migraine), the tend migraine (migg capur during sleep, and their migraines o tunne states. At this point we r relation to attention to ! of intense dro the decasional ab and the typical pro natural termination.

Nowhere in the literature can we find more vivid and descriptions of migrainous stupor than in Liveing's monogri-



Migrainous Aura





Cluster Headaches

Cluster headaches occur in cyclical patterns or clusters, which gives the condition its name.

Cluster headache is one of the most painful types of headache.

Cluster headache commonly awakens you in the middle of the night with intense pain in or around one eye on one side of your head



A cluster headache strikes quickly, usually without warning. Common signs and symptoms include:

- Excruciating pain, generally located in or around one eye, but may radiate to other areas of your face, head, neck and shoulders
- One-sided pain
- Restlessness
- Excessive tearing
- Redness in your eye on the affected side
- Stuffy or runny nasal passage in your nostril on the affected side of your face
- Sweaty, pale skin (pallor) on your face
- Swelling around your eye on the affected side of your face
- Drooping eyelid

Cluster Headaches

During a cluster period:

- Headaches usually occur every day, sometimes several times a day.
- A single attack may last from 15 minutes to three hours.
- The attacks often happen at the same time within each 24-hour day.
- The majority of attacks occur at night, usually one to two hours after you go to bed.
- The pain usually ends as suddenly as it begins, with rapidly decreasing intensity. After attacks, most people are completely free from pain, but exhausted.

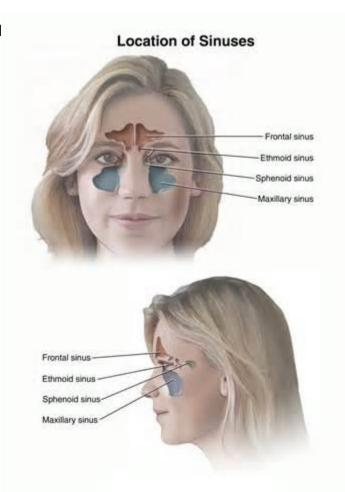


Watery eye, drooping eyelid, runny nose

Sinus headaches

Sinus headaches are headaches that may accompany sinusitis, a condition in which the membranes lining you sinuses become swollen and inflamed. You may feel pressure around your eyes, cheeks and forehead.





Sinus headaches

Sinus headache signs and symptoms may include:

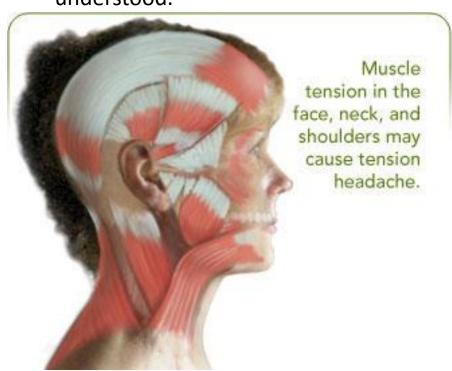
- Pain, pressure and fullness in your cheeks, brow or forehead
- Pain worsening when bending forward or lying down
- Yellow-green or blood-tinged nasal discharge
- Stuffy nose
- Sore throat
- Fever
- Cough
- Fatigue
- Achy feeling in your upper teeth
- Decreased ability to smell or taste

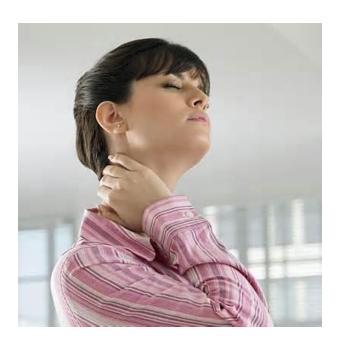


Tension Headache

A tension headache is generally a diffuse, mild to moderate pain in your head that's often described as feeling like a tight band around your head.

A tension headache (tension-type headache) is the most common type of headache, and yet its causes aren't well understood.





Tension Headache

Above and behind the eyes

Base of skull, neck and shoulder

Areas of tension headache

Signs and symptoms of a tension headache include:

- Dull, aching head pain
- Sensation of tightness or pressure across your forehead or on the sides and back of your head
- Tenderness on your scalp, neck and shoulder muscles
- Usually at end of work day when muscles are stressed

Tension headaches are divided into two main categories — **Episodic tension headaches**

Episodic tension headaches can last from 30 minutes to a week. Frequent episodic tension headaches may become chronic.

Chronic tension headaches

This type of tension headache lasts hours and may be continuous. If your headaches occur <u>15 or more days a month</u> <u>for at least three months</u>, they're considered chronic.



Episodic Tension Type Headache.

IHS (International Headache Society) Criteria

- Tension type headaches less than 15 per month.
- Lasts 30 mins to 7 days
- No nausea or vomiting
- No photophobia and phonophobia (1 ok)
- Headache has at least 2 of the following criteria:
 - a. pressing/tightening
 - b. Bilateral
 - c. Mild-moderate
 - d. Not aggravated by physical activity.

Chronic Tension Type Headache

- Affect women more than men
- Most common in middle age
- Stress is often a trigger
- Average duration is 4-13 hours.

Chronic tension-type headache

These headaches evolve from episodic tension-type headaches.

They may last hours or be constant.

15 or more days a month for at least three months

Chronic tension-type headaches have at least <u>two</u> of the following characteristics:

- Hurt on both sides of your head (head in a vice)
- Cause mild to moderate pain
- Cause pain that feels pressing or tightening, but not pulsating
- Aren't aggravated by routine physical activity
- In addition, they cause no more than one of the following:
- Sensitivity to light or sound
- Nausea (mild only)

Research has shown that in respect to tension headaches massage can:

- reduce depression and/or anxiety
- decrease perceived pain
- decrease anger status
- decrease tension
- reduce frequency
- reduce intensity
- reduce duration
- decrease medication usage
- increase range of cervical motion

1. National Institutes of Health. (2009). "Headache: Hope Through Research" NINDS. NIH Publication No. 09-158. Retrieved on January 21, 2010 from National Institute of Neurological Disorders and Stroke Web site:



"I'll want to get a few tests on you, just to cover my ass"

Cervical Compression Test

Testing for: Compression of the cervical nerve root or facet joint irritation of the cervical spine.



Client presents with tingling going down unilateral or bilateral arms.

Is it a disc, facet, or peripheral entrapment due to fascia or muscle?



Cervical Distraction:

Used after Cervical compression to relieve pressure on cervical nerve roots.



If Cerv compression caused pain and distraction relieved then client most likely has a disc/facet issue causing neural impingement.

If Cerv compression caused NO pain and distraction caused pain then client most likely has a spastic cervical muscle or peripheral entrapment.

MM stripping and stretching needs to be done.

Shoulder Depression Test

Positive:

Pain on the side of the compression indicates irritation or compression nerve root or foraminal irritation.

Pain on the side of the stretch indicates hypomobile joint capsule or a nerve sleeve irritation or muscle splinting.

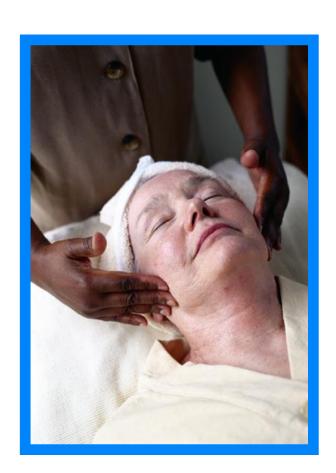


What you should know about your clients headaches

- How long have you had headaches? How frequent? How disabling?
 - When did they start? What were they like?
- What happens when you have a headache?
 - Describe the pain and other symptoms
- Who else in your immediate family gets headaches?
 - Any type of headache (migraine, tension or sinus)
- What might cause you to get a headache (Triggers)
 - Alcohol, too little sleep, stress, missed meals

What kinds of treatments will help?

- Behavioral approaches
 - Limit caffeine and other triggers
 - Reduce stress
 - Exercise
 - Regular sleep
 - Chiropractic
 - Massage / relaxation
 - Eat regularly / don't skip meals



When you don't need to get a consult?

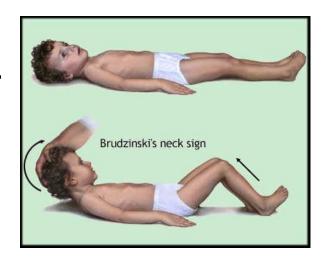
- Patient with established history of episodic headaches
- Current headache is consistent with previous headaches or is consistent with different manifestation of a primary headache.
- Normal demeanor and or personality
- No other health "red flags" on intake or exam
- Direct referral from another physician

When You Do Need to refer

- Extremely abrupt onset of headache (with no HA history)
- Persistent unremitting headache
- New onset of headache in patient over age of 50
- Fever, acute redness (flushing)
- Abnormal neurological findings (motor weakness, reflexes, slurring, posture)
- Abnormal gaze tracking, vision

Subarachnoid hemorrhage:useful signs and symptoms

- Sudden onset of worst headache of life.
- Worse on exertion eg valsalva, exercise.
- 75% of patients have nausea and vomiting.
- 50% of patients have meningism.
- 25% of patients have neck stiffness.



Linn F et al: Prospective study of sentinel headache in aneurysmal subarachnoid hemorrhage, *Lancet* 344:590, 1994.

Locksley HB: Report on the cooperative study of intracranial aneurysms and subarachnoid hemorrhage, *J Neurosurg* 25:219, 1966.

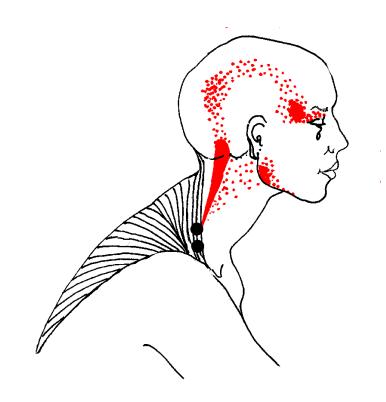
Trigger Points and HAs



Upper Trap TP pattern of HA

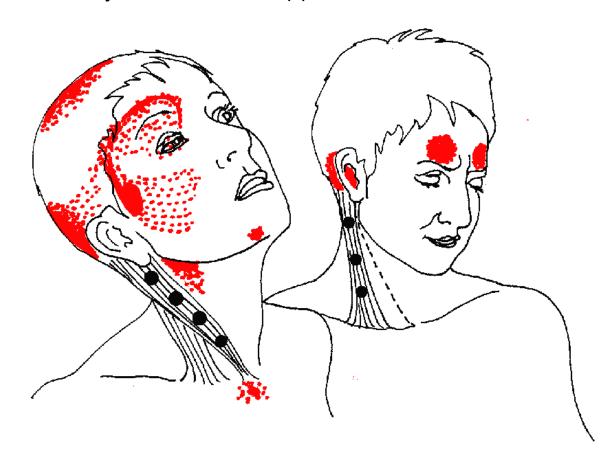
Usually brought upon by

- Forward head posture
- Whiplash
- Text neck syndrome
- Poor sleeping positions
- Overweight back packs

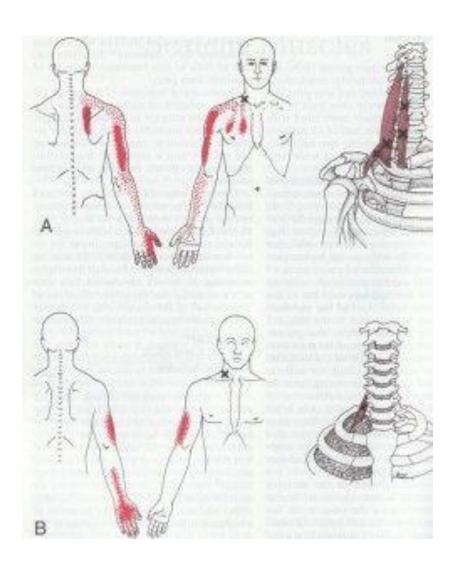


SCM Trigger Point patterns

Most common area is pain/tenderness right behind the ears and just over the brow(s)



Scalenes

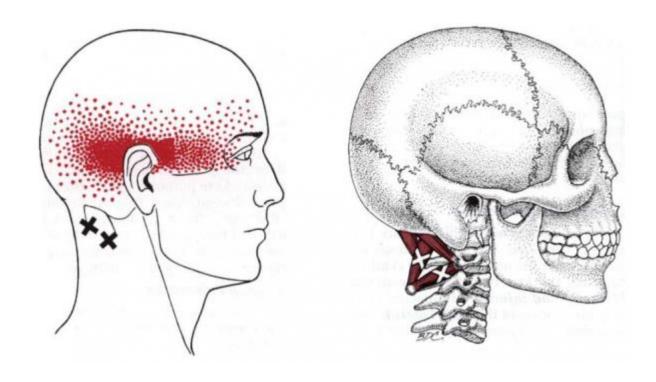


Myth is scalene's will cause HAs

The typical TP pattern for the scalene's is posterior to scapular region and or down the shoulder to arm. Usually contributing to TOS.

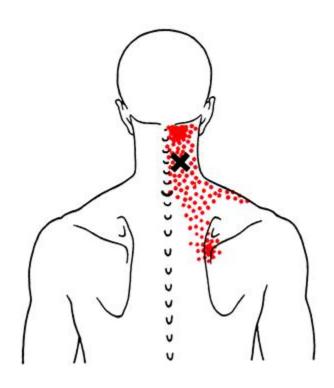
Suboccipital muscles

Obliquus Capitis Inferior (also known as the Inferior Oblique) is a small muscle that runs posteriorly and inferomedially from C1 to C2. It is situated under the deep cervical vein and comprises the inferior boarder of the suboccipital triangle. It is the only suboccipital muscle that does not attach to the skull.[[]



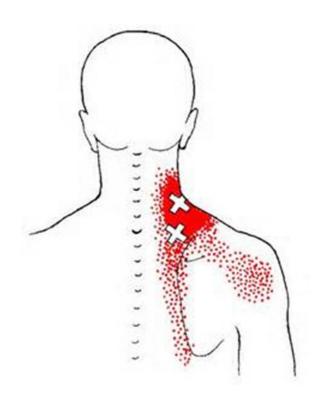
Trapezius pattern

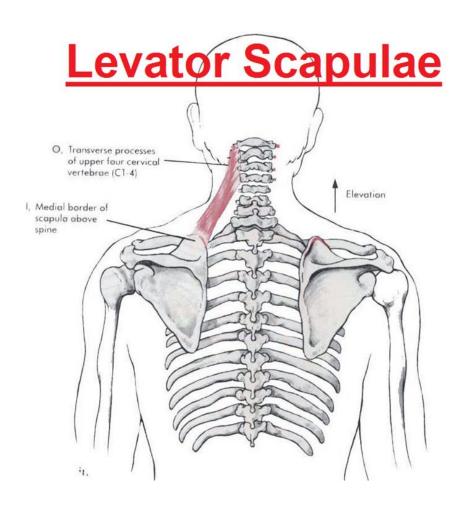
Forward Head Posture Computer Worker (mouse muscle involvement) Weightlifters (shrugs)



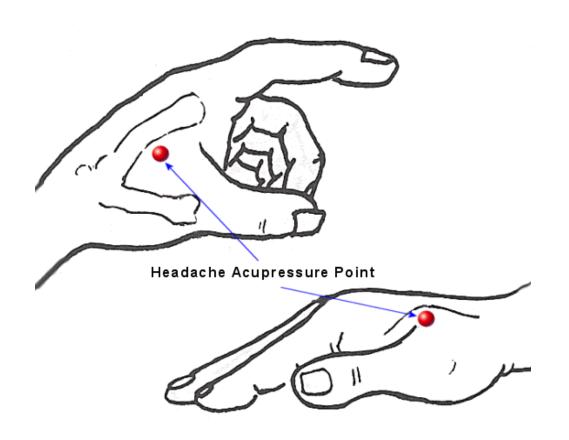
Levator scapula pattern

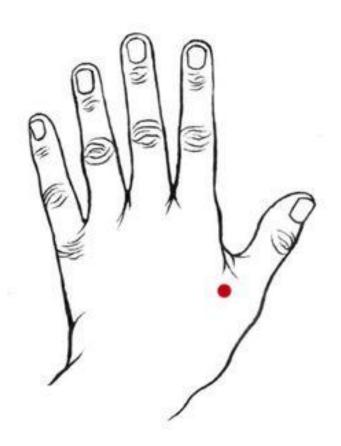
Mouse muscle Same movements as Traps





Hand Pressure Points for HAs







Applying pressure on BL-60, the pressure point located behind the external malleolus in the foot, can help relieve headaches.

Smells and HAs

Osmophobia

Such migraines are most frequently triggered by foul odors, but the hypersensitivity may extend to all odors. One study found as many as **25%** of migraine sufferers had some degree of osmophobia.





Different ways migraines and smells impact sufferers:

- Increased sense of smell
- Desire to avoid smells
- Smells may trigger migraine attack
- Smells can lead to increased nausea
- In some, migraines alter the sense of both taste and smell
- Some report phantom smells



Studies on migraines and smells

A 2007 study of 1,000 patients in London found about 40 percent reported that they couldn't tolerate smells during a migraine attack. The odors that disturbed them the most:

- Perfumes or colognes, 64 percent
- Food, 55 percent
- Cigarette smoke, 55 percent

An older study, done in 1985, of **50** migraine sufferers found 45 had light sensitivity, 40 had nausea, 32 sound sensitivity and **20 sensitivity to smell**. In the study:

- 8 couldn't be around the smell of cigarette or cigar smoke,
- 6 avoided the smell of cooking
- 5 disliked the smell of soap, perfume or aftershave



Sensitivity to sound is a frequent migraine symptom. *Phonophobia*

About 77 percent of females and 70 percent of males experience sound sensitivity with migraine attacks.

Sensitivity to sound can come in different forms:

- In some, loud sound cause migraines
- Other migraine sufferers say loud sounds make migraine pain worse
- Migraine sufferers may also be sensitive to quiet sounds
- Some migraine sufferers experience temporary hearing loss
- Sufferers may complain that migraines make noises louder



Sensitivity to light is a frequent migraine symptom. *Photophobia*

Photophobia typically causes a need to squint or close the eyes, and headache, nausea, or other symptoms may be associated with photophobia



This is the end of HA webinar

