

Headache Toolbox

Hemicrania Continua

Hearing the diagnosis of hemicrania continua can seem as if the medical provider is stating the obvious, because the name in Latin means that half of the head hurts. However, hemicrania continua is a unique type of headache, one that by definition responds to 1 medication, indomethacin. Hemicrania continua is usually referred to by its initials, HC. While HC is not seen as frequently as migraine or tension-type headache, it is probably under-recognized and may not be as uncommon as was originally thought.

Hemicrania continua always involves head pain on only 1 side, although rarely it can switch sides. Those with this diagnosis often have a variety of symptoms on the side of the headache, including tearing, redness of the eye, eyelid drooping, sweating, or a runny nose or congestion. In HC, the pain is present 24 hours per day, 7 days per week, continuously for at least 3 months. The continuous headaches are typically 6-7/10 intensity, but with frequent worsening, usually to severe pain, as often as daily or many times per week. The individual with HC may become restless and unable to sit still or lie down. Sometimes the headaches can have migraine features, such as light sensitivity, particularly on the side of the pain. Some noise intolerance and nausea can be present, usually to a lesser degree than is seen in migraine.



Hemicrania continua is a relatively unusual headache disorder, and other neurological disorders can mimic it. Carotid arteries or other blood vessels servicing the brain can develop splitting, plaques, or clots along the walls, and the pain can be like HC. Tumors of the pituitary gland or other central areas of the brain can cause symptoms mimicking HC as well. For this reason, before the diagnosis can be certain, evaluation of the brain with magnetic resonance imaging or CAT scan should be performed.

Indomethacin (Indocin) is a medication that fights inflammation, similar to ibuprofen or naproxen, but indomethacin is unique in that it is the only medication that functions as a key in the lock to stop HC. Usually indomethacin is started at a low dose, such as 25 mg, taken 3 times per day with meals. The dose is then increased until the head pain is relieved. Doses can sometimes reach 75 mg 3 times per day or more before the pain is fully blocked. When taking this medication, stomach protection against ulcers and bleeding is generally required. Proton pump inhibitors, such as omeprazole or lansoprazole, or H₂ receptor antagonists, such as ranitidine or famotidine, can provide such protection.

Most people tolerate indomethacin, particularly in lower doses. Unfortunately, others are unable to tolerate indomethacin at all, or in the doses needed to relieve their pain.

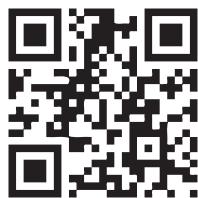
Indomethacin can cause stomach, intestinal, or esophagus ulcers, and sometimes bleeding in the stomach. The drug is processed through the kidneys, and in high doses it can hurt the function of the kidneys. Some people feel nauseated, tired, or even depressed when taking it. Others, particularly those with a history of migraine, can develop more headaches while taking daily indomethacin.

There are alternative medications that can replace indomethacin if needed, but unfortunately they are not perfect for treating hemicrania continua. Sometimes they can supplement a lower dose of indomethacin if that is all that is tolerated. Melatonin is a natural hormone with a chemical structure similar to indomethacin. A few people have had a complete response for their HC with melatonin alone, but more often they have been able to get relief with a lower dose of indomethacin while taking the melatonin. Alternative medications that may replace indomethacin, if it cannot be taken at all, include gabapentin, topiramate, verapamil, and cox-2 inhibitors (anti-inflammatories less likely to cause stomach bleeding). Even onabotulinumtoxinA, commercially known as Botox (Allergan, Irvine, CA, USA), has been tried

in cases where other options failed or were not tolerated. Nerve blocks, injected at the back of the head on the same side as the pain, can be performed with long-acting anesthetics. Rarely, a nerve stimulator is placed with leads extending over the back of the head or neck, providing continuous low-level stimulation to the area.

For most people who have hemicrania continua, indomethacin is tolerated and effective. Once the effective dose is found, and pain is eradicated, an attempt may be made to lower the dose such that an individual is maintained on the lowest effective dose. The duration of HC is not predictable. Some people come out of the headache completely, and others temporarily have their pain resolve, but then may have runs of it in the future. In general, hemicrania continua is manageable with single or multiple medications, and affected individuals can continue to lead normal lives once the appropriate regimen is taken regularly and daily.

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