



Medicine for Managers

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Exploding Head Syndrome

Exploding Head Syndrome (EHS) sounds probably the most unlikely term in medicine. It conjures up a picture of an event only really seen in horror movies when an alien head is blown apart by a powerful disrupter gun. In fact it is a sleep disorder, which, though not painful, may be frightening. There is nothing quite as shocking as hearing an explosion in the night. There is no organic disease of the ears or brain and the symptoms cause no

E HS is one of a group of disorders called *parasomnia* which involve abnormalities of perception, movement, behaviour, emotion or dreams at some stage in the sleep cycle.

Hearing explosions or other sudden loud noises during sleep is not real, it does not cause damage and no-one else can hear it, but it is distressing for the sufferer nonetheless. It is not in any way dangerous.

EHS was first documented in 1876 by Silas Mitchell who described it as 'sensory discharge'. In 1920 Robert Armstrong called it 'snapping of the brain' and British neurologist John Pearce proposed the name 'Exploding Head Syndrome' in 1989

The incidence of the condition is not well-defined because different studies have achieved variable assessments of occurrence frequency.

However, it is probably more frequent than previously thought and a recent study suggested up to an 18% lifetime prevalence with

a recurrence prevalence of nearly 17%. The condition was found to be more likely to occur in women, the elderly and students and is associated with other sleep disturbances, and with some mental health disorders, particularly disturbances in mood.

No evidence has been found to suggest it is a sign of a brain disorder and is generally harmless.

The cause of exploding head syndrome is unclear. It is associated with unexpected and sudden electrical activity in the brain.

Some experts have suggested that it is a mini-seizure or a disruption of the sleep-wake transition and others have implicated medication side effects. It may have a genetic basis but no specific genes have been identified.

The loud noise heard by those experiencing the condition may sound like an explosion, a gunshot, sounds like cymbals or drums, shattering glass or a non-specific loud bang. Although the noise is very real, it is not caused by sound waves. The episode may also be associated with muscle jerking, a flash of light, palpitations, breathlessness or a feeling of fear. The **trigger** for EHS is unknown. Rarely is there any sort of pattern although some people associate it with stress or extreme tiredness.

Diagnosis is normally from the history with some tests to eliminate other conditions, such as:

- Sleep studies
- MRI scan
- Electroencephalogram (EEG)

Treatment and Management

There is no specific treatment regime, but drugs used for other forms of parasomnia may help the symptoms, including:

- The anti-seizure drug topiramate
- The antidepressant amitriptyline
- The obsessive-compulsive disorder drug clomipramine

The prognosis is very variable. Some patients will experience remission without treatment which may be permanent. The episodes may become less frequent and then stop completely after weeks or months, especially if regular sleep patterns are adopted. Reassurance alone may reduce attacks.

Some sufferers continue to experience occasional episodes for years, especially during times of stress.

Can EHS be prevented?

Not surprisingly the answer is unknown, because experts do not know what causes it in the first place. However, symptoms may be able to be reduced by managing trigger factors such as:

- Ensuring good sleep patterns
- Using relaxation techniques
- Managing other factors that may affect sleep
- Using techniques to reduce stress

Sleep well!!!

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