

MIGRAINE HEADACHE

Background

This case definition was developed by the Armed Forces Health Surveillance Center (AFHSC) for the purpose of epidemiological surveillance of a condition important to military-associated populations. Migraine headaches are a leading cause of medical encounters and lost duty time among military members. During migraine attacks, the military operational capabilities of those affected may be sharply reduced.¹

Clinical Description

Migraine is a neurovascular syndrome that is generally manifested as recurrent, severe headaches that can be debilitating. Migraine headaches are typically throbbing, localized, and very painful. They are often distinguishable from other types of headaches by characteristic symptoms such as nausea, increased sensitivity to light and sound, and dizziness. Migraines are often preceded by neurologic symptoms (“migraine aura”) which may include blurred or obstructed vision, skin numbness or tingling, exaggerated responses to painful stimuli, and momentary loss of consciousness (syncope).²

Case Definition and Incidence Rules

For surveillance purposes, a case of migraine headache is defined as:

- *One hospitalization* with any of the defining diagnoses of migraine (see ICD9 code list below) in the *any* diagnostic position; or
- *One outpatient medical encounter* with any of the defining diagnoses of migraine (see ICD9 code list below) in the *primary* diagnostic position.

Incidence rules:

For individuals who meet the case definition:

- The incidence date is considered the date of the first hospitalization or outpatient medical encounter that includes a defining diagnosis of migraine.
- Each individual is considered an incident case only *once per lifetime*.

Exclusions:

- None

¹ Armed Forces Health Surveillance Center. Risk factors for migraine after OEF/OIF deployment, active component, U.S. Armed Forces. *Medical Surveillance Monthly Report (MSMR)*. 2009 December; 16(12):10-13.

² Armed Forces Health Surveillance Center. Migraine and other headaches, active components, U.S. Armed Forces, 2001-2007. *Medical Surveillance Monthly Report (MSMR)*. 2008 May; 15(4):6-10.



Codes

The following ICD9 codes are included in the case definition:

Fifth-digit subclassification for use with 346.x

- 0 without mention of intractable migraine without mention of status migrainosus
- 1 with intractable migraine, so stated, without mention of status migrainosus
- 2 without mention of intractable migraine with status migrainosus
- 3 with intractable migraine, so stated, with status migrainosus

Condition	ICD-9-CM codes	CPT Codes
Migraine Headache	346.0 (migraine with aura) [0-3] 346.1 (migraine without aura) [0-3] 346.2 (variants of migraine, not elsewhere classified) [0-3] 346.3 (hemiplegic migraine) [0-3] 346.4 (menstrual migraine) [0-3] 346.5 (persistent migraine aura without cerebral infarction) [0-3] 346.6 (persistent migraine with cerebral infarction) [0-3] 346.7 (chronic migraine without aura) [0-3] 346.8 (other forms of migraine) [0-3] 346.9 (migraine, unspecified) [0-3]	NA

Development and Revisions

- The case definition was originally developed by the AFHSC Medical Surveillance Monthly Report (MSMR) staff for the MSMR article referenced above.² An expert on migraine headaches from the Uniformed Services University for Health Sciences was consulted during the development of this definition.

Case Definition and Incidence Rule Rationale

- Per incidence rules defined in a 2009 MSMR article, if counting multiple migraine events in one individual, medical encounters must *occur at least one week apart*.³

³ Army Medical Surveillance Activity. Migraines among active duty military personnel, 1998-1999. *Medical Surveillance Monthly Report (MSMR)*. 2000 July: 6(6):14-17.



Reports

None

Review

Mar 2011 Case definition reviewed and adopted by AFHSC Surveillance Methods and Standards (SMS) working group.

May 2008 Case definition developed and adopted by the AFHSC MSMR staff.

Comments

None

