



[Home](#) → [Medical Encyclopedia](#) → Geographic tongue

URL of this page: //medlineplus.gov/ency/article/001049.htm

Geographic tongue

Geographic tongue is characterized by irregular patches on the surface of the tongue. This gives it a map-like appearance.

Causes

The exact cause of geographic tongue is unknown. It may be due to irritation from hot or spicy foods, or alcohol. The condition appears to be less common in smokers.

The change in pattern on the surface of the tongue occurs when there is a loss of the tiny, finger-like projections, called papillae, on the tongue. These areas look flat as a result. The appearance of the tongue may change very quickly. The flat-looking areas may remain for more than a month.

Symptoms

Symptoms include:

- Map-like appearance to the surface of the tongue
- Patches that move from day to day
- Smooth, red patches and sores (lesions) on the tongue
- Soreness and burning pain (in some cases)

Exams and Tests

Your health care provider will diagnose this condition by looking at your tongue. Most of the time, tests are not needed.

Treatment

No treatment is needed. Antihistamine gel or steroid- or tacrolimus-containing mouth rinses may help ease discomfort.

Outlook (Prognosis)

Geographic tongue is a harmless condition. It may be uncomfortable and last for a long time.

When to Contact a Medical Professional

Contact your provider if the symptoms last longer than 10 days. Seek medical help right away if:

- You have breathing problems.
- Your tongue is severely swollen.
- You have problems speaking, chewing, or swallowing.

Prevention

Avoid irritating your tongue with hot or spicy food or alcohol if you are prone to this condition.

Alternative Names

Patches on the tongue; Tongue - patchy; Benign migratory glossitis; Glossitis - benign migratory

References

James WD. Disorders of the mucous membranes. In: James WD, ed. *Andrews' Diseases of the Skin: Clinical Dermatology*. 14th ed. Philadelphia, PA: Elsevier; 2026:chap 29.

Jordan RC. Diseases of the mouth and salivary glands. In: Goldman L, Cooney KA, eds. *Goldman-Cecil Medicine*. 26th ed. Philadelphia, PA: Elsevier; 2024:chap 393.

Pham KL, Mirowski GW. Oral diseases and oral manifestations of gastrointestinal and liver disease. In: Feldman M, Friedman LS, Brandt LJ, eds. *Sleisenger and Fordtran's Gastrointestinal and Liver Disease*. 11th ed. Philadelphia, PA: Elsevier; 2021:chap 24.

Review Date 1/29/2025

Updated by: Ashutosh Kacker, MD, FACS, Professor of Clinical Otolaryngology, Weill Cornell Medical College, and Attending Otolaryngologist, New York-Presbyterian Hospital, New York, NY. Review provided by VeriMed Healthcare Network. Also reviewed by David C. Dugdale, MD, Medical Director, Brenda Conaway, Editorial Director, and the A.D.A.M. Editorial team.

Learn how to cite this page



A.D.A.M., Inc. is accredited by URAC, for Health Content Provider (www.urac.org). URAC's [accreditation program](#) is an independent audit to verify that A.D.A.M. follows rigorous standards of quality and accountability. A.D.A.M. is among the first to achieve this important distinction for online health information and services. Learn more about A.D.A.M.'s [editorial policy](#), [editorial process](#), and [privacy policy](#).

Health Content
Provider
06/01/2028

The information provided herein should not be used during any medical emergency or for the diagnosis or treatment of any medical condition. A licensed medical professional should be consulted for diagnosis and treatment of any and all medical conditions. Links to other sites are provided for information only – they do not constitute endorsements of those other sites. No warranty of any kind, either expressed or implied, is made as to the accuracy, reliability, timeliness, or correctness of any translations made by a third-party service of the information provided herein into any other language. © 1997-2025 A.D.A.M., a business unit



National Library of Medicine 8600 Rockville Pike, Bethesda, MD 20894 U.S. Department of Health and Human Services

National Institutes of Health