Allergies: Hives (Urticaria)

Brown Health Services Patient Education Series

What are hives?
Hives are a common allergic reaction involving the skin. Widespread hives are an allergic reaction to food, medicine, viral infection, insect bite or environmental exposures. Often the cause cannot be determined. Hives localized to just one part of the body are usually due to skin contact with plants, pollen, food or pet saliva. Hives are not contagious.

The body’s immune system is designed to produce various factors to fight foreign substances, including bacteria and viruses that the immune system perceives as threatening. An allergic response occurs when the body’s immune system over-responds, or is hypersensitive to particles known as allergens. Common allergens include plant pollens, molds, dust mites, animal dander, industrial chemicals, food, medicines and insect venom.

Important components of the immune system are the antibodies produced by lymph tissue. A key player in the allergic response is the antibody known as immunoglobulin E (IgE). IgE is overproduced in certain people, usually those with inherited susceptibility.

During an allergic attack, these antibodies attach to cells known as mast cells, which are generally concentrated in the lungs, skin and mucous membranes. Once IgE binds to mast cells, these cells are programmed to release a number of chemicals. One of these chemicals, histamine, opens the blood vessels and causes skin redness and swollen membranes. Histamine causes many of the symptoms associated with allergic reactions.

What are the symptoms of hives?

Symptoms include:
- Very itchy rash
- Raised pink lesions with pale centers, ranging in size from ½ inch to several inches wide.
- Variable shapes
- Rapid and repeated change in location, size and shape.

Expected Course

More than 10% of people get hives. The hives generally come and go for 3 to 4 days and then mysteriously disappear.

Home Treatment

Antihistamine medication: The best drug for widespread hives is an antihistamine. It may not cure the hives, but it will reduce their number and relieve itching. Diphenhydramine (Benadryl) is available without a prescription. It comes in both liquid and tablet form. Diphenhydramine may cause drowsiness, so do not drive while taking it. Continue taking your antihistamine for a day or two after the hives disappear to be sure they are completely gone.
Your medical provider can prescribe a nonsedating antihistamine if necessary.

Avoidance: Avoid anything you think may have caused the hives. If you have recently started a new medication, discontinue it if possible, until you have called Health Services for advice. For hives triggered by pollen or animal contact, take a cool shower or bath. Hot showers, vigorous toweling, exercise, tight clothing or any other factors that stimulate or inflame your skin may make symptoms worse. For localized hives, wash the allergic substance off the skin with soap and water. Localized hives usually disappear in a few hours so Benadryl is often not needed.

Seek Emergency Care Immediately If: *Breathing or swallowing becomes difficult or you start feeling ill.*

Call Health Services during regular hours or come in to see a provider if:

- Symptoms are worse, or if most of the itch is not relieved after you have been taking an antihistamine for 24 hours.
- The hives last for more than one week.
- You have other concerns or questions.