

## Sunburn Hurts!

Sunburn results from too much sun or sun-equivalent exposure. Almost everyone has been sunburned or will become sunburned at some time. Anyone who visits a beach, goes fishing, works in the yard, or simply is out in the sun can get sunburn. Improper tanning bed use is also a source of sunburn. Although seldom fatal (sun poisoning), sunburn can be disabling and cause quite a bit of discomfort.

### Sunburn Causes

Sunburn is literally a burn on your skin. It is a burn from ultraviolet (UV) radiation. The consequence of this burn is inflammation of the skin. Injury can start within 30 minutes of exposure.

- UVA and UVB refer to different wavelengths in the light spectrum. UVB is more damaging to the skin especially for skin cancer. Both UVA and UVB are responsible for photoaging (premature aging of the skin and wrinkles) and sunburn. Tanning beds produce both UVA and UVB rays.
- Travel to the southern United States, regions close to the equator, and places at high altitudes all offer the unwary visitor an opportunity to be injured by sunburn.
- Certain light-skinned and fair-haired people are at greater risk of sunburn injury.
- Prior recent sun exposure and prior skin injury are risks for sunburn, even in limited exposure to the sun. However, normal limited exposure to UV radiation produces beneficial vitamin D in the skin.

### Sunburn Symptoms

- Mild and uncomplicated cases of sunburn usually result in minor skin redness and irritation. Untreated and with enough exposure, you can experience shock (poor circulation to vital organs) and even death (sun poisoning). Sufficient exposure can become remarkably painful.
- Initially, your skin turns red about 2-6 hours after exposure and feels irritated. The peak effects are noted at 12-24 hours.
- More severe cases (sun poisoning) are complicated by severe skin burning and blistering, massive fluid loss (dehydration), electrolyte imbalance, and infection.
- Other common symptoms include:
  - Chills
  - Fever
  - Nausea or vomiting or both
  - Flulike symptoms
  - Blistering - May range from a very fine blister that is only found when you begin to "peel" to very large water-filled blisters with red, tender, raw skin underneath
  - Skin loss - About 4-7 days after exposure

Conditions that should motivate you to visit Immediate Care include:

- Severe pain
- Severe blistering
- Headache
- Confusion
- Nausea or vomiting
- Fainting

Relief of the discomfort becomes important.

- Medications such as aspirin, ibuprofen, and naproxen are useful, especially when started early.
- For mild sunburn, cool compresses with equal parts of milk and water may suffice. You may also use cold compresses with Burow solution. You can buy this at a drugstore.
- Anyone raised in a beach community knows the secret of aloe-based lotions. There are many commercially available types. Ask the pharmacist at your local drugstore. Tearing apart your aloe plant in the yard and applying the cool jellylike substance inside the leaves is no longer necessary.
- Cool (not ice cold) baths may help. Avoid bath salts, oils, and perfumes because these may produce sensitivity reactions. Avoid scrubbing the skin or shaving the skin. Use soft towels to gently dry yourself. Don't rub. Use a light, fragrance-free skin moisturizer.
- Avoid lotions that contain topical anesthetic medications because you can become sensitized and then allergic to that medicine.
- Obviously, stay out of the sun while you are sunburned.

### **Medical Treatment**

- Silver sulfadiazine (1% cream, Thermazene) can be used for treatment of sunburn with appropriate cautions about use on the face.
- If your case is mild and not life threatening, the doctor may simply suggest plenty of fluids, aspirin, or other nonsteroidal anti-inflammatory medications (NSAIDs).
- Additional topical measures such as cool compresses, Burow solution soaks, or high-quality moisturizing creams and lotions may be prescribed.
- If your case is severe enough, oral steroid therapy (cortisonelike medications) may be prescribed for several days. Steroid creams placed on the skin show minimal to no benefit.
- Stronger pain-relieving medication may be prescribed in certain cases.
- If you have blistering, steroids may be withheld to avoid an increased risk of infection. If you are dehydrated or suffering from heat stress, IV fluids will be given, and you may be admitted to the hospital. People with very severe cases may be transferred to the hospital's burn unit.

### **Outlook**

- Minor and uncomplicated cases of sunburn cause discomfort and no long-lasting effects. You can expect to feel better in 4-7 days. You may see skin loss or peeling. This is often associated with severe itching, especially at night, after sweating, or after showering.
- Other skin problems, such as herpes simplex, lupus, and porphyria (an inherited disorder of sensitivity to sunlight) may worsen.
- Chronic sun exposure may lead to premature aging, severe wrinkling, pigmented skin lesion development (moles), and various malignant (cancerous) skin tumors. Premature cataract formation in the eye can also result.

Source: [www.emedicinehealth.com](http://www.emedicinehealth.com)