

FAQ: Skin Cancer Protection

Contributed by Eli Smith
Monday, 07 December 2009

Sunscreens and sunblocks are chemical or physical products used to protect the skin from sun damage which can lead to skin cancer, such as melanoma. Sunscreen products provide various degrees of protection against the sun's ultraviolet rays. Sunblock products prevent all ultraviolet light from entering the skin. They often contain zinc oxide or titanium dioxide and are used for high-risk areas such as the nose, lips, and shoulders.

Chemical sunscreens and sunblocks protect the skin by absorbing visible and invisible, or ultraviolet, sun rays. Examples include:

- creams
- gels
- lip balms
- lotions
- sprays

Physical sunscreens and sunblocks protect the skin by reflecting, scattering, absorbing, and blocking sun rays. Examples of physical sunscreens include:

- clothing, such as shirts and pants and newer fabrics designed to block the sun
- hats
- sunglasses

What is the information for this topic?
Sun Exposure

Sunscreens and sunblocks have been developed to decrease the harmful effects of the sun on the skin. Studies have shown that too much sun exposure can cause:

- premature aging of the skin
- skin cancer such as melanoma
- wrinkles and dark spots on the skin

To protect the skin from the sun, a person should do the following.

- Apply sunscreen or sunblock to exposed skin.
- Plan outdoor activities for early morning or late afternoon. Ultraviolet rays are most intense from 10 A.M. to 2 P.M.
- Wear a hat, long-sleeved shirt, long pants, and sunglasses when outside for long periods of time.

Choosing a Product

There are numerous sunscreen products on the market. Most contain more than one type of sunscreen ingredient. Ideally, a sunscreen should have ingredients that protect against both ultraviolet A and B sun rays, known as a broad-spectrum sunscreen. A good sunscreen contains PABA or benzophenone. Alcohol-based sunscreens appear to be better absorbed by the skin and thus offer the best protection. Coconut oil, cocoa butter, and baby oil provide very little protection from ultraviolet rays.

Sunscreens are rated according to their sun protection factor, or SPF. The SPF number found on the label indicates the amount of sun protection provided. This number helps a person determine the length of time he or she can spend in the sun without risk of burning. For example, a person who uses an SPF 15 sunscreen and normally sunburns after 20 minutes of midday sun exposure, may tolerate 15 times 20 minutes, or 300 minutes, without burning.

The range in SPF is usually 2 to 45. The higher the SPF, the greater the protection from the sun. An SPF of at least 15 is usually recommended, though this may vary depending on skin type. People with fair skin may need a higher SPF.

Before choosing a sunscreen, a person should consult a healthcare provider if he or she:

- has a history of allergies to any skin products
- has any medical problems, particularly skin diseases, that may affect the use of sunscreen
- has food allergies to ingredients such as saccharin, other artificial sweeteners, or cinnamon spices

- is pregnant or breast-feeding
- is taking prescription medicine, such as antibiotics. Certain antibiotics, oral contraceptives, diuretics, antihistamines, and antidepressants are among the commonly used medicines that can increase sensitivity to the sun's rays.

Other issues to consider when choosing a sunscreen include:

- age. Sunscreen should never be used on babies younger than 6 months old without consulting a healthcare provider. Alcohol-based sunscreens should not be used on children younger than 5 years old.
- location. Mountains and other areas of high elevation or activities involving reflective surfaces, such as water, sand, snow, or concrete, may require extra precautions. These precautions may include long-sleeved shirts, wide-brimmed hats, sunglasses, or goggles.
- the condition of a person's skin. A cream or lotion sunscreen is recommended for a person with dry skin. If a person has oily skin, a gel-based or alcohol-based sunscreen may be better.
- the part of the body to be screened. A physical sunscreen like a hat should be worn to protect the nose and ears. A gel-based sunscreen is often suggested for the lips.
- the type of activity a person will be doing. A waterproof sunscreen works best for water play or sports that cause sweating.

Using a Product

When using sunscreens, follow these guidelines.

- Apply them 30 minutes before sun exposure. Sunscreen products containing aminobenzoic acid, lisadimate, padimate O, or roxadimate should be applied 1 to 2 hours before sun exposure. Lip sunscreens should be applied 45 to 60 minutes before sun exposure.
- Follow directions on product labels carefully.
- Keep away from the eyes and mouth. Sunscreen should only be used externally.
- Reapply after swimming or sweating.
- Reapply every 1 to 2 hours.
- Reapply to the lips after eating, drinking, or swimming.

Side Effects of Products

Although sunscreen is important in protecting the skin, a person should also be aware of potential side effects. These may include:

- acne
- burning, itching, or stinging of the skin
- rash
- redness or swelling of the skin

A healthcare provider should be consulted about these and any other side effects.