



SUNSCREENS

Sunscreens are over-the-counter agents that prevent UV-induced effects to the skin. They come in a variety of forms for topical application, such as lotions, gels, and sprays. Each contains one or more sunscreen active ingredient that will absorb UV radiation, releasing the absorbed radiation in an alternate energy form. Most products now also contain at least one agent that will absorb ultraviolet light B (UVB) radiation and an additional agent one that absorbs ultraviolet light A (UVA) radiation.

The efficacy of a sunscreen is measured by its ability to prevent sunburn in a clinical test and is reported as the Sun Protection Factor (SPF). The higher the SPF, the greater the efficacy in preventing sunburns. The American Academy of Dermatology recommends an SPF of 15 or higher.

UVB radiation is more effective at producing sunburn, but radiation from the summer sun contains more UVA

radiation. There are tests that measure the ability of a sunscreen to prevent other effects, specifically other UVA-induced effects. These tests, combined with the SPF test, can inform the consumer about how much protection can be expected.

The table shows the various sunscreen actives, one product example, and the SPF of that product.

Waterproof sunscreens contain special ingredients that keep the sunscreen actives on the skin even when exposed to water. This allows the consumer to swim or perspire and retain the confidence that the sunscreen will continue to prevent sunburn. Sunscreens should be reapplied every two or three hours for peak efficacy.

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Sunscreen Active	Sunscreen Tradename	SPF
4-methylbenzylidene camphor	Clarins Sun Care Cream®	30
Avobenzone	Hawaiian Tropic 45 Plus Sunblock®	45
Cinoxate	Reviva Sun Protective Moisturizer®	25
Drometrizole Trisolvane	Lancome Soleil Soft-Touch Moisturizing Sun Lotion®	15
Ensulizole	Neutrogena Healthy Defense Daily Moisturizer®	30
Homosalate	Solbar Avo Lotion®	32
Menthyl Anthranilate	Purpose Moisturizer®	15
Mexoryl SX	Lancome Soleil High Protection Face Cream®	30
Octinoxate	Vanicream Sunscreen®	35
Octocrylene	Coppertone Spectra3 Sunblock Lotion®	50
Octisalate	Avon Sun Baby Sunscreen Lotion®	40
Oxybenzone	Hawaiian Tropic Kids Sunblock®	60
Padimate O	Banana Boat UVA & UVB Sunscreen Lotion®	8
Titanium dioxide	Blue Lizard Australian Suncream®	30
Zinc oxide	Total Block Cover-Up®	60