



## **Foods That Make You Look Younger**

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Nutrition plays a key role in health and wellness. In fact, eating a healthy diet reduces your risk for diabetes, obesity, heart disease and cancer, and there is a growing body of evidence that supports the link between diet and skin health. The role of nutrition in acne, psoriasis and eczema is evolving, allowing dermatologists to make dietary recommendations to their patients. Skin aging is a complex process that is also influenced by nutrition. The notion of “beauty from within” is gaining traction with consumers as we begin to connect the dots between nutrition and the aging process.

Skin aging is a result of changes that occur naturally and from environmental exposure. Changes seen include wrinkling, sagging, uneven pigmentation, thinning and dryness. Skin aging is due, in part, to the accumulation of damaging molecules called free radicals. Free radicals are unstable molecules that damage cell walls, proteins and DNA. They contribute to skin aging by turning on production of enzymes that break down collagen and elastin fibers leaving skin wrinkled and saggy. They also increase production of pigment leaving skin blotchy and uneven. Environmental exposure to ultraviolet light, pollution and cigarette smoke accelerates skin aging by producing even more free radicals. Our skin is equipped with naturally occurring antioxidants that protect us by neutralizing free radicals. As we age, antioxidant reserves are depleted leaving us more vulnerable to free radical damage. It is also of interest that even low dose exposure to ultraviolet light further reduces antioxidant levels. It is the balance between how many free radicals are produced and how many antioxidants are available that determines how fast skin ages.

Many antioxidants can be acquired through foods making nutrition an important tool for fighting skin aging. Vitamins C and E are essential skin antioxidants that provide a first line of defense against free radicals.<sup>1</sup> These antioxidants work synergistically in skin and must be acquired by diet. Vegetables and citrus fruits are the best source for vitamin C, while vitamin E can be obtained from oils, seeds, nuts, avocados, and dark leafy greens, such as spinach. Studies have confirmed that diets high in vitamin C are associated with less skin wrinkling.<sup>2</sup> Vitamin A is known as the anti-wrinkle antioxidant as it plays a major role in maintaining skin's structural integrity.<sup>3</sup> A lower intake of vitamin A is associated with a more wrinkled appearance in women according to clinical studies.<sup>2</sup> Vitamin A can be acquired from egg yolk, carrots, pumpkin, liver and fortified cereals. Plant-based foods contain natural forms of vitamin A called carotenoids. Carotenoids are potent antioxidants that give fruits and vegetables their color. Carotenoids are plentiful in carrots, sweet potato, dark leafy vegetables, apricots and melons. Eating foods rich in carotenoids can provide some protection against sun-induced skin aging.<sup>4</sup>

Healthy fats are also beneficial for skin. Studies show that a higher dietary intake of the fatty acid linoleic acid reduces dryness that often occurs with aging.<sup>2</sup> Nuts, seeds, green leafy vegetables, and oils including: flax, olive, and safflower, contain high levels of linoleic acid. Following the Mediterranean diet, rich in olive oil, has also been shown to reduce the incidence of sun-induced skin aging.<sup>5</sup> A lower protein intake is associated with exaggerated wrinkling; more evidence that what you eat affects the way you look.<sup>2</sup>

Diets full of sugar cause a multitude of health problems and accelerate skin aging.<sup>6</sup> Upon ingestion, circulating sugars bind to proteins throughout the body in a chemical process called glycation. In skin, proteins such as collagen and elastin are readily glycated and converted into dysfunctional forms called advanced glycation end products or AGEs. AGEs are first noted in the early the 30's and accumulate over a lifetime. Deposition of AGEs affects the mechanical properties of the skin causing laxity and wrinkling.<sup>6</sup> It is of interest that not only do we create AGEs but we can also ingest them through diet. AGEs occur anytime foods are grilled, roasted, or fried, and are generated as part of the browning process. Foods like sausage, processed meats, bread crust, cookies, and breakfast cereals contain high amounts of advanced glycation end products. To avoid AGE accumulation, lower your sugar and refined carbohydrate intake and prepare foods by poaching, steaming or boiling. There are many health benefits to lowering sugar intake and keeping skin young appears to be one of them.

While there is clearly data to support the use of antioxidant supplements for improving the appearance of skin, there is still much to learn. It's important to remember that supplements are not scrutinized by the FDA with the same scientific rigor as prescription medications. Studies also suggest that while low dose antioxidant supplements confer skin benefits, higher doses may have negative effects including increasing the risk for skin cancer.<sup>7,8</sup> In other words, when it comes to certain antioxidants a little may be good but more is not necessarily better. For this reason, whole food recommendations are currently favored over supplements for keeping skin healthy.

In conclusion, if you are looking for an inside out approach to anti-aging, add colorful fruits, vegetables and healthy fats to your diet; make sure to get enough protein and reduce your intake of sugars and refined carbohydrates. These nutritional recommendations will improve overall health and can also help you maintain a more youthful appearance.

## References

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