

S K I N
C A N C E R 

19

Cancer and Your Skin: What You Must Know, What You Can Do to Protect Yourself

I never had any doctor examine my whole body for skin cancer. No one even suggested it. Why doesn't the public know they should ask for this?

—Bob, 70, retired salesman

Just a few decades ago, skin cancer was not a subject of much discussion, perhaps because it was something that affected only older people. And, since it was usually not life-threatening, it could hover in the background as something that was not fully understood. Since then, however, the incidence of skin cancer has climbed steadily and it is now the most common cancer in humans.

As an active skin cancer researcher and dermatologic surgeon, I believe that the increases we are seeing in melanoma, a serious form of skin cancer, and non-melanoma skin cancer such as basal cell cancer and squamous cell cancer, will be met with improved diagnosis, better public education, and treatments that are less invasive. In the future, treatment will be more keyed to our understanding of the genetics of how cancer develops.

Because skin cancer, including melanoma, is so easy to diagnose—all you really need are a good pair of eyes—I

also believe early diagnosis alone will lead to improved survival and less disability from these very modern diseases.

▪ **FEARING
CANCER,
FEARING
FEAR ITSELF**

WARNING SIGNS OF SKIN CANCER

- A spot that bleeds
- A sore that appears, heals up, and comes back
- A mole that changes in color, shape, or texture
- A mole or other spot that begins to itch
- A new mole

Once a patient hears the word *cancer* the first and most visceral reaction is fear. For centuries no word has conjured more fearsome images than cancer. It has always been a diagnosis that has fallen on patients' ears like a death sentence. The term itself, originally coined by Hippocrates, refers to the crablike appearance of dilated veins on the distended bellies of terminally ill cancer patients. Cancer has, in our culture, been equated

Let me assert my firm belief that the only thing we have to fear is fear itself.

—Franklin D. Roosevelt,
first inaugural address, March 4, 1933

with wasting, suffering, and certain death, and as such continues as one of the most frightening medical conditions we encounter. One of the more potent images of cancer is that of

insidious growth, so the word has taken on meaning even outside the examining room. During Watergate, White House counsel John Dean spoke of a “cancer on the presidency,” reaching for the dread disease as a metaphor for the corruption of the body politic.

Our grave cultural fear of cancer is such that it persists even in an era when such a diagnosis is no longer necessarily a death sentence. Sadly, this fear often grows greater once a cancer is diagnosed, and this very human emotion sometimes blocks us from seeking to get the diagnosis made in the first place. Beliefs rooted in fear die hard, and when cancer does strike at a stage when it is no longer curable, it reinforces the fright that accompanies the diagnosis.

We also seem to be hearing about cancer all the time; it seems to be everywhere we turn. Researchers tell us nightly on the news that foods and activities that provide us with joy also contain the seeds of cancer risk; the same researchers also say that if we eat this or that, we may avoid cancer.

This omnipresence of cancer in the media perpetuates the unconscious fear that it lurks behind every small pleasure, as well as the hope that there might be a magic bullet in one innocent piece of fruit or homeopathic medicine. Both attitudes contribute to public confusion and fear and create an unusual dichotomy that keeps many from seeking treatment. On the one hand, cancer is the dreaded danger, hiding around every corner; on the other, the false promises of miracle cures lead many otherwise intelligent people down a potentially dangerous path.

It is our fear of cancer that makes the disease all the more deadly, because that fear inhibits us from facing abnormalities that may be cancerous and from calling the doctor before the cancer has advanced.

But what exactly is cancer, this all-encompassing word that is now so much part of our lives, our language, our daily culture? In reality cancer is an umbrella term for a whole collection of diseases.

A cancer is a malignant tumor. A tumor is an abnormal growth that may be benign or malignant. Some people equate the word *tumor* with cancer, others believe a tumor is a noncancerous growth but only “malignant tumors” are indeed cancerous. In a malignant tumor, the normal tissue cells have lost the control necessary to grow in an orderly manner. These cells, which begin to divide in an uncontrolled fashion, are cancerous and can interfere with the activity and functions of the rest of the body by crowding out the normal tissue.

The term *skin cancer* itself encompasses several different malignancies. Skin cancer may be the most common cancer in humans, but it is also the most easily cured. Because we know so much about skin cancer’s causes, and because we believe we know how it starts, we can in many ways prevent it from starting early in life.

Understanding how skin cancer develops helps us understand how to prevent it and how to treat it effectively. Because there are several different kinds of skin cancer, each with its own unique features, it is helpful to understand the ways they differ and the ways in which they are similar, as well as whom they generally affect and the parts of the body where they commonly occur.

▪ THE SCOPE OF SKIN CANCER

Precise figures on skin cancer are hard to find. The data on melanoma is extensive, thanks to tumor registries run by states and other organizations that require doctors to report the diagnoses. However, there is no requirement that diagnoses of basal cell cancer and squamous cell cancer

be reported to these registries. In general, though, we do know that each year there will be more than 1 million cases of non-melanoma skin cancer. Of these, there will be approximately 2,000 deaths, primarily from squamous cell cancer. Melanoma is a far different problem. Of the approximately 45,000 expected new cases each year, there will be about 7,500 deaths. It is now estimated that 1 in 75 Caucasians will develop melanoma in their lifetime. Recent data suggests that melanoma is also the most rapidly rising cancer in women in their twenties and early thirties.

Skin cancer is very rare in people of color because of the natural sun protection factor, roughly equivalent to an SPF of 13, that their pigment provides. Nevertheless, because there is such a wide range of coloration in individuals of color, skin cancer is still a possibility. For instance, I have seen basal cell cancer in lighter-skinned African-Americans and in Latinos from Puerto Rico who have grown up under the very harsh sun.

African-Americans, Asians, and others of color can burn in the sun, and it is appropriate to make sure that proper sun protection is observed, even when you can say to yourself, "Hey, I'm dark already. What can happen to me?" My advice is always, "Sun damage doesn't discriminate." Be guided by your own experience in the sun.

Interestingly, two-thirds of squamous cell cancer in blacks occur in areas not exposed to the sun. Just as with individuals with type I or type II skin (see chapter 5, "Frequent Questions"), squamous cell cancer can develop in long-standing traumatic scars, especially those that result from a burn, chronic irritation or inflammation, chronic ulcers, previous radiation, or in people with a long history of discoid lupus erythematosus. If you notice a nonhealing area, it should be biopsied by your dermatologist immediately.

The key to detecting skin cancer in time so that it can be treated successfully is skillful observation. This means you should get to know all your skin (as well as you do the proverbial back of your hand), check yourself regularly, and know what you are looking for. The chapters in this part of the book will describe the signs and symptoms of skin cancer so you can be an alert detective and help identify a possible problem before it becomes a major threat to your health.

While self-examination has become de rigueur in the early detection of breast cancer, the same cannot be said yet of skin cancer. Many people avoid looking at any new skin spots or changes just when they should be paying attention. In fact, men have a higher mortality rate than women when it comes to skin cancer, largely because they avoid taking skin conditions seriously and don't seek treatment. Any new growth on your skin

or any ulceration that does not heal deserves a trip to the doctor. In a very real sense, it is usually not skin cancer itself that kills; neglect and procrastination are the culprits.

Of the three most common types of skin cancer, melanoma is the most dangerous and pernicious. If it is not diagnosed until an advanced stage, it is ranked one of the most deadly of all cancers. Chapters 22 and 23 deal with melanoma and non-melanoma skin cancer, respectively, to help you know what to look for and what you should do if and when you discover a suspicious spot on your skin.

Happily, nature is of help in our crusade to identify skin cancer early. Both melanoma and non-melanoma skin cancer can be heralded by *pre-cancers*. In the case of non-melanoma skin cancer, a lesion called an *actinic keratosis*, a small, red, slightly rough growth that occurs in people who have had a lot of sun exposure can often be a harbinger of the risk for developing basal cell cancer or squamous cell cancer. Some of these lesions, if neglected, do in fact evolve into true skin cancer. Similarly, while common moles pose no risk of turning into melanoma, a mole called an *atypical nevus* (formerly called a “dysplastic nevus”) is thought to be an indication that the bearer may be at risk for developing melanoma. In some cases, severely atypical or abnormal moles or nevi can transform into melanoma. Although a lot remains to be learned about the biology of these “precursor” lesions, they serve an important function: they are the foghorn, the red flag, the glaring lighthouse beacon that tells us to pay attention to the hazards that may be brewing on our skin.

▪ PREACHING TO THE CHOIR?

In the field of cancer prevention, one of the most effective tools we have is public education. It is now a matter of scientific fact that smoking causes lung cancer. But it has taken extensive programs in public education to drive that point home and, more important, to change behavior. Interestingly, some believe that the dramatic change in smoking incidence in this country only occurred once the public education programs shifted their focus to children. This had at least two effects: it helped prevent many kids from starting to smoke, and it got the newly educated kids to put pressure on their smoking parents to kick the habit.

Finding the right way to get a public health message across is critical. When it comes to skin cancer, repeating the message regularly, articulating the risks clearly, and explaining what you can do about it are essential

for success. There is evidence that we are making progress. How often do you see tan models now? How often do your kids remind you to put on sunscreen lotion?

I have given many presentations on skin cancer and made it a policy early on to speak to any group that was willing to hear a health talk. Once, shortly after I started at Yale Medical School, I got an invitation to speak to a sorority at Southern Connecticut State University. I realized that regardless of the turnout this was exactly a group I wanted to reach. I showed up on a rainy night in March, and after making my way through the empty pizza boxes and Diet Coke bottles strewn about the dormitory common room, proceeded to have one the best experiences ever on the skin cancer speaking circuit. The women were attentive and asked questions that demonstrated their clear understanding of the need to take precautions against skin cancer. How many then hauled off to Fort Lauderdale for spring break and roasted in the sun I cannot tell, but the will to know was there, and that is the first step in any health education program.

I am firmly convinced that talking about skin cancer saves lives. Many of my academic colleagues avoid the media, afraid they might be misquoted. My view is a bit different: you can misquote me all you like, but if you get the core message right, I will be satisfied. That message saves lives. Every time a magazine runs an article on skin cancer, especially when it is accompanied by photos, the phones in our office and those of many dermatologists ring in response. This form of public education works well.

Throughout this part of the book, I hope to show you how to recognize skin cancer, understand what it is, and know what you can do about it. Ideally, this information will help you to break through the fear that might keep you from making that phone call.