

Chapter 1

Taking Charge of Your Heart Health

In This Chapter

- ▶ Reviewing the good and bad news about heart disease in the United States
 - ▶ Looking at heart disease as an equal opportunity health problem
 - ▶ Finding out that you can improve your heart health
 - ▶ Reversing your risks of heart disease — what's possible
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Human health, daily performance, and life itself depend on the heart. The heart and the cardiovascular system have amazing sophistication, strength, and durability. At the same time, the health of the heart rests in a fragile balance. When even small parts of its complex machinery are a little bit out of whack, the heart can cause great discomfort, pain, and even death.

Despite the emotional energy we attach to our hearts and the heart's crucial importance to life itself, most people are pretty ignorant about the heart and how it works. You know you can't live without one. You know that heart disease is pretty common and more than a little scary. So when your doctor says your cholesterol levels or elevated blood pressure are raising your risk of heart disease, it's a little alarming. And the bottom falls out of your stomach if your physician says, "I don't think that chest pain is a muscle strain. We'd better do some tests to rule out heart disease." At moments like that, you wish you knew more about that small pump thumping away in your chest and all the things that threaten it and what you can do about them. That's where *Preventing and Reversing Heart Disease For Dummies* comes in.

In this chapter, I show you first why heart disease is such an important health problem for Americans and why you should care about that. More important, however, I give you an overview of how possible it is to prevent heart disease for you and your family. Even if you already have risk factors for heart disease or have been diagnosed with heart disease, you will see that you can take steps to reverse these risks and to control or even reduce some symptoms or manifestations of heart disease. This chapter outlines the good news and practical strategies that I discuss in detail in each chapter in this book.

Facing the Bad News about Heart Disease

Heart disease is public health enemy number one in America. In one or another of its manifestations, heart disease touches virtually every family in the United States. Although the death rate from heart disease in the U.S. has been declining steadily — about 31 percent between 2000 and 2010 — the health burden and danger of heart disease remains alarmingly high. Consider these startling facts:

- ✓ Almost 84 million Americans — more than one in every four — have one or more types of heart disease.
- ✓ Heart disease and stroke cause more than one of every three deaths.
- ✓ Heart disease is an equal-opportunity killer. It is the leading cause of death in men and women and all ethnic and racial groups in the United States.
- ✓ About 150,000 deaths from heart disease occur annually in people younger than 65. Preventable deaths in this younger population have not declined significantly in the last 10 years.
- ✓ While deaths from heart disease declined, the numbers of operations and procedures for heart disease increased 28 percent between 2000 and 2010.
- ✓ If money is the most important thing in your life, you might like to know that the yearly estimated cost of cardiovascular disease in the United States is \$315.4 *billion*.

As a cardiologist, I've seen these statistics made all too real in the lives of too many patients. But I've also seen what people can do to take charge of heart health at all stages, from working to lower their risk of developing heart disease to learning how to control and live well with advanced coronary heart disease (CHD) and its varied manifestations.

Seizing the Good News about Preventing Heart Disease

The bad-news facts about heart disease are real, but they aren't the only news. Extensive research proves that you can do many things in your daily life and in working with your physician to use the latest medical science in order to preserve and maximize the health of your heart — even if you already have heart disease. Consider these good-news facts:

- ✔ People who are physically active on a regular basis cut their risk of heart disease in half.
- ✔ People who stop smoking cigarettes can return their risk of heart disease and stroke to almost normal levels within five years after stopping.
- ✔ Overweight people who lose as little as 5 to 10 percent of their body weight can substantially lower their risk of heart disease. In Chapter 10, I offer suggestions that can help you maintain or reclaim a healthy body weight, and in Part V, I offer a number of recipes that prove you don't have to deny yourself enjoyable foods to do so.
- ✔ Simple changes in what you eat can lower total blood cholesterol and LDL-cholesterol, both of which contribute to heart disease.
- ✔ The number of deaths from heart disease declined by millions during the last decade — a decline largely based on lifestyle changes.

Checking Out Heart Disease as an Equal Opportunity Health Problem

So who should care about heart disease? As the previous sections suggest, everyone. No matter your present state of heart health, you can do plenty to reduce your risk factors for heart disease. (Find out more about that in Chapter 3.) You need to care about heart disease whether you are young or old, man or woman, totally healthy or coping with heart disease or other health problems, and regardless of your ethnic and racial background. If you belong to certain groups, however, some associated facts and conditions should raise your consciousness about why paying attention to heart disease and heart health should be important to you.

If you're an adult younger than 65

If you think of heart disease as a problem mainly for older adults, that's understandable. The majority of deaths from heart disease do occur in people older than 65. However, as I discuss in Chapter 2, early signs of fatty streaks and fibrous plaques, the precursors of coronary artery disease, are already present in a majority of young adults between the ages of 21 and 39. Here are some other reasons that younger adults should take steps now to prevent heart disease:



- ✔ About half of all sudden cardiac arrests occur in people under age 65, many in people in their 40s and 50s.
- ✔ 34 percent of people hospitalized for stroke are younger than age 65.

- ✔ More than 1 in 5 Americans with heart failure are younger than age 60.
- ✔ An estimated 80 percent of premature heart disease and stroke is preventable.
- ✔ Among U.S. youth and adults aged 12 to 60, almost none meet the seven criteria for ideal heart health established by the American Heart Association. That figure would be none, except that 0.3 percent of young adults ages 20 to 29 meet the seven ideal criteria.

So if you are younger than 65, there is no time like the present to start taking steps toward better heart health.

If you're a woman

Although heart disease is an equal-opportunity killer, many people, men and women alike, continue to think that heart disease is primarily a *man's* problem. Wrong! Consider these facts:

- ✔ Although men suffer heart attacks an average of ten years earlier than women, after menopause, women catch up. Within the year after a heart attack, 42 percent of women will die, compared to 24 percent of men.
- ✔ In spite of extensive public education campaigns, only 54 percent of women know that heart disease is the leading cause of death for women. Heart disease kills more women than all forms of cancer combined.
- ✔ Stress poses a greater risk of heart disease in women than in men.
- ✔ Diabetes in women is a greater risk factor for heart disease than it is in men.

In the final analysis, heart disease is at least as dangerous for women as it is for men. So, if you're a woman who bought this book for the man in your life, think again. Keep this copy for yourself and buy another one for him! There is just as much in this book for you as there is for the men in your life.

If you're African American

Heart disease is the leading cause of death for African Americans, just as it is for all Americans. Although every individual is different, African Americans, as a group, experience a higher incidence of certain conditions that contribute to the risk of heart disease. Consider these facts:

- ✔ African Americans develop high blood pressure at earlier ages than white Americans, and at any decade of life, more have high blood pressure, which is a risk factor for heart disease and stroke. Currently,

among African Americans, 47 percent of women and 43 percent of men have high blood pressure, compared to 31 percent of women and 33 percent of men among white Americans.

- ✔ Compared to white Americans, African Americans have twice the risk of a first stroke and are more likely to die from the stroke.
- ✔ African Americans are 1.7 times as likely as non-Hispanic whites to have diabetes, a factor that contributes to developing heart disease. They are also more likely to have complications, such as blindness or kidney failure.

Although much current research seeks to determine the causes of the higher incidence of risk factors, such as high blood pressure, among African Americans, African Americans can prevent and control hypertension and other risk factors by adopting appropriate lifestyle practices and working with their physicians to develop appropriate drug therapies.

If you're a parent

The incidence of heart disease is, of course, very rare among children and youths. But the roots of heart disease are firmly planted in childhood. As people in the United States have spent more and more time in front of the TV or computer screen, commuting in cars, and eating out, children in the U.S. are learning lifestyle behaviors and developing health conditions that may make them more, rather than less, likely to develop heart disease and other health problems. The good (and bad) habits of a lifetime usually begin in childhood. Parents need to set good examples for their children and encourage them to adopt practices that optimize their future health. Consider the following facts about children in the U.S.:

- ✔ An estimated 2.4 million teenagers ages 12 to 17 use tobacco products. Though this figure has declined significantly in the last decade, 23.4 percent of high school students currently use tobacco products. Smoking is a major contributor to heart disease, cancer, and other health problems.
- ✔ Approximately 50 percent of American teenagers get no regular physical activity.
- ✔ Approximately 17 percent of children and youths, ages 2 to 19, are obese, another risk factor for heart disease.

To find out how you can teach your children heart-healthy habits that will last a lifetime, head to Chapter 7.

If you're older

Unfortunately, many Americans expect heart trouble to be part of their older years. That need not be so. And if you *are* older and, for that matter, even if you already have heart disease, you can do plenty to avoid being part of these statistics:

- ✓ Approximately 80 percent of deaths from heart disease occur in people older than 65.
- ✓ More than 70 percent of men and women aged 60 to 79 have cardiovascular disease. For people age 80 and older, the percentage having heart disease rises to 83 percent of men and 87 percent of women.
- ✓ After age 55, the incidence of stroke doubles with each decade of life.
- ✓ Two of the most frequent causes of hospitalization for older adults are coronary atherosclerosis and congestive heart failure.

Reversing the Risks for Heart Disease

No matter what your overall health now — even if you already have heart disease or have had a heart attack — clinical research shows that working to reduce your risk factors for heart disease can greatly reduce your risks of developing heart disease, help you to halt the progression of atherosclerosis, and, if you have had a heart event, greatly reduce the risk of a second event. Take a look at what research reveals about how you can improve your health:

- ✓ If you have a diagnosis of atherosclerosis or symptoms of coronary heart disease, modifying risk factors such as high blood pressure, blood cholesterol problems, physical inactivity, and being overweight can reduce your risk of a future heart attack or the need for coronary artery angioplasty or bypass surgery, and add years to your life. With lifestyle modifications and appropriate medical therapies, many individuals can bring all these risks back into the healthy range.
- ✓ Appropriate physical activity or exercise improves the ability to perform activities comfortably for people with angina and people who've had heart attacks or even coronary surgery.
- ✓ Weight loss can help control cholesterol levels, blood pressure, and diabetes — conditions that contribute to the continued progress of heart disease.
- ✓ If you smoke and have had a heart attack, quitting smoking significantly reduces your risk of having a second heart attack or experiencing sudden death.

- ✔ Over the last 30 years, a number of studies examining the possibility of reversing atherosclerosis, the narrowing of the coronary arteries, suggest that rigorous lifestyle modifications supported by appropriate medications can halt the progression of atherosclerosis and may lead to a degree of regression of atherosclerosis for many individuals.

You can find strategies for tackling several of these risk factors in Part II.

Reversing Heart Disease — Hope or Hype?

When Thomas Wolfe's famous novel *You Can't Go Home Again* came out in 1940, most people thought his title had hit on one true thing. For many years, cardiologists believed that same truth applied to coronary heart disease: Once you had this progressive, relentless condition, you might be able to slow down the process, but you couldn't actually reverse it — you couldn't go home again.

But in medicine, as in life, the quest to go home again continues. Cardiologists now know that yes, you can control a number of contributing risk factors to heart disease and thus, for many people, halt the progression of CHD in its tracks. If you have coronary heart disease and want to make this happen, however, you're going to have to stop cold and make major changes in how you eat, exercise, work, and generally live your life. You usually have to take lipid-lowering (cholesterol and other fats) medicines, too. But as long as you're willing to do your part and adopt these strict measures, you can look forward to more hope than hype in the promise that you can stop your CHD where it is. In some cases, you may even be able to reduce the lesions, called plaque, that grow in the artery walls and that result in narrowed arteries and ruptures and clots that cause heart disease and heart attacks.



Before going any further, I want to emphasize two points. If you're thinking that, given the good news, you can live a life of sin (sloth and gluttony of the seven deadly sins come to mind) and then later repent and turn the negative health effects around, forget about it! Preventing heart disease is always better than trying to stop it or reverse it. Likewise, this book is not a do-it-yourself manual if you have symptoms of heart disease or have been diagnosed with it. You need to work with your cardiologist.



Can coronary artery disease regress? There isn't a simple answer to this question. But a number of studies in animals and humans show promise. The goal of reversing heart disease doesn't just require reducing the amount and size of the narrowings in coronary arteries; it also requires that the lining of the arteries, called the *endothelium*, be restored to its normal function, that inflammation be controlled, and that many of the physiological entities that contribute

to the progression of heart disease be returned to their proper function. You can see how complicated this process is going to be. (You can read more about how coronary heart disease develops in Chapter 2.)



The lifestyle strategies this book details will typically help you prevent heart disease and manage and even reverse any risk factors for heart disease that you have. However, many people will require not only significant lifestyle modifications but also the appropriate medications to lower their risks. That's why you should always work with your doctor to have regular checkups. Then, if you are diagnosed with risks for heart disease or with heart disease itself, you and your doctor can work as partners to plan the best therapeutic program for you. Research is bringing new insights all the time, and your cardiologist will be your best source of up-to-date strategies. Head to Part IV for information about medications, surgical options, and complementary therapies used for heart disease.

Taking Charge of Your Heart Health

Without question, heart disease is a serious enemy. In fact, it's the biggest enemy. But you can take charge of your heart health, whatever its present state.



As I often like to say: *Ipsa scientia potestas est*, or knowledge is power. For that reason, the remainder of this book is full of information that can empower you to understand the basics about heart health and heart disease and partner with your physician in putting the power of simple lifestyle practices and medical technology to work for you. Taking control of your heart health offers other wonderful upsides for living well that include the following:

- ✓ **Improving your overall health:** Many of the steps that benefit your heart health also improve your total health and fitness, to say nothing of your good looks.
- ✓ **Increasing functionality:** Use it or lose it, goes the old saying. The healthier your heart, the greater the probability that you can stay active, mobile, and engaged in pursuits that interest you for a long, long time.
- ✓ **Increasing economic benefits:** The healthier you are, the lower your healthcare costs, and the more money in your pocket for fun things.
- ✓ **Increasing longevity:** Keeping your heart healthy is not an iron-clad guarantee that you'll live longer, but considering the mortality rates of people with heart disease (reviewed earlier in this chapter), even card-carrying "Dummies" can figure out that keeping your heart as healthy as possible can keep the Grim Reaper away longer.
- ✓ **Having more fun:** Nothing slows you down or scares the family like a heart attack. Angina pain, angioplasty, coronary artery bypass surgery, and other common outcomes of heart disease aren't picnics in the park, either. Working for heart health and controlling heart disease can help you avoid these problems.