



# FACTS

## Million Hearts™

### Savings Millions of Lives by Working Together

#### OVERVIEW

Heart disease and stroke are two leading causes of death in the United States.<sup>1</sup> Million Hearts,™ launched in September 2011 by the Department of Health and Human Services, brings together communities, health systems, nonprofit organizations, federal agencies, and private-sector partners to fight these deadly conditions. This national initiative has the ambitious goal of preventing one million heart attacks and strokes by 2017 through a targeted focus on the ABC'S – the major risk factors for heart disease and stroke.

**A**spirin for people at risk  
**B**lood pressure control  
**C**holesterol management  
**S**moking cessation

The Million Hearts™ focus for 2013 is on blood pressure control.<sup>2</sup>

The American Heart Association has adopted an even more ambitious goal. We want to improve the cardiovascular health of all Americans by 20% by 2020.<sup>3</sup> Preventing and controlling high blood pressure (HBP) is essential to achieving this objective.

#### HIGH BLOOD PRESSURE: THE SILENT KILLER

When a heart beats, it creates pressure to push blood through your blood vessels and capillaries. The pressure – blood pressure – is the result of two forces. The first occurs as heart pumps blood out into the arteries (systolic). The second force is created as the heart rests between beats (diastolic). These two forces are represented by the two numbers in a blood pressure reading. When these forces are too strong (as indicated by a reading of greater than 140/90) they stretch the walls of the arteries beyond a healthy limit.<sup>4</sup>

HBP, or hypertension, is often called “the silent killer” because, with the exception of extreme

cases, it has no symptoms.<sup>4</sup> Unfortunately, if left untreated, HBP can cause severe damage to major organs, including the heart, lungs, kidneys and eyes. In the heart alone, HBP can cause arterial damage, atherosclerosis, heart failure and angina and can also lead to stroke.<sup>5</sup> In fact, an individual with high blood pressure is four times more likely to die of a stroke<sup>6</sup> and three times more likely to die of heart disease.<sup>7</sup>

Projected to cost \$162 billion in 2013 and increase to \$347 billion by 2030,<sup>8</sup> HBP is the most expensive form of cardiovascular disease (CVD).

#### WHO HAS HIGH BLOOD PRESSURE?

About one-in-three, or 78 million adults in the U.S., have HBP.<sup>9</sup> By 2030, this figure is projected to increase to 111 million.<sup>8</sup> HBP is more prevalent in men up to age 45, equally prevalent in men and women from age 46 to 64, and more prevalent in women over age 65. Blacks have the highest prevalence of HBP of any ethnic group.<sup>9</sup>

Numerous risk factors and markers for development of hypertension have been identified, including age, ethnicity, family history of HBP, genetic factors, lower education and socioeconomic status, greater weight, lower physical activity, tobacco use, psychosocial stressors, sleep apnea, dietary factors, such as dietary fats, higher sodium intake, lower potassium intake, and excessive alcohol intake.<sup>9</sup>

Taking action to control and reduce your blood pressure can add years to your life. It is estimated that 46,000 deaths may be avoided each year if 70% of the patients with HBP were treated to goal.<sup>10</sup> Additionally, reducing average population systolic blood pressure by only 12-13 mmHg could reduce stroke by 37%, coronary heart disease by 21%, and cardiovascular disease mortality by 25%.<sup>11</sup> Unfortunately, it is estimated that only about 46% of people with HBP have the condition adequately controlled.<sup>12</sup> While there is no “healthy” level of HBP, there are several ways to control it, including following a

healthy diet and reducing sodium intake; participating in regular physical activity; maintaining a healthy weight; avoiding tobacco/smoking; taking your prescription medications; and limiting alcohol intake.<sup>4</sup>

### HYPERTENSION AND SODIUM

High amounts of sodium in the diet have been linked to HBP and many studies have found that lowering sodium consumption can improve health. Americans consumed an average of 3,330 mg of sodium each day in 2007-08, significantly more than the American Heart Association-recommended levels of 1,500 mg/day.<sup>13</sup> If the U.S. population moved to an average daily sodium intake of 1,500 mg there would be a 25.6% overall decrease in HBP and a \$26.2 billion savings in annual health care spending.<sup>14</sup>

### MILLION HEARTS™ AND THE “B”

Million Hearts™ goal to eliminate one million heart attacks and strokes by 2017 includes several activities aimed at helping Americans better control their blood pressure. The objectives of this effort for FY 2013 are to:

- Increase the percentage of people with HBP who have it under control;
- Better identify people with HBP who are not yet diagnosed;
- Enhance individuals' ability to prevent and control their HBP;
- Increase measurement and reporting on HBP control by healthcare systems, professions, communities, states and others; and
- Decrease the nation's sodium intake.<sup>1</sup>

Some of the Million Hearts™ activities to support these objectives are community efforts to reduce sodium in the food supply, public education campaigns to help Americans make healthy food choices and decrease tobacco use, and the use of health information technology and quality improvement initiatives to standardize and improve the delivery of care for HBP.<sup>1</sup>

Funding for activities associated with Million Hearts™ comes from existing agency budgets and for FY 2013, from the Prevention and Public Health Fund (PPHF).

### ACTION PLAN TO REDUCE HIGH BLOOD PRESSURE

The American Heart Association is committed to programs and public policies that will reduce

the prevalence of HBP. As part of its participation in Million Hearts,™ we are:

- Providing access to health management tools, such as My Life Check and the Heart Attack Risk Calculator;
- Working with federal agencies to harmonize clinical indicators to measure the progress toward attaining the ABC'S; and
- Working with community health centers and quality improvement organizations to disseminate best practices, measure and improve clinical performance, and address healthcare disparities.

### THE ASSOCIATION ADVOCATES

The American Heart Association also advocates for changes in health policy and programs that help patients better prevent and control HBP. These efforts include:

- Supporting funding for Million Hearts™ to help Americans prevent and control HBP;
- Protecting funding for the PPHF, which provides support for Million Heart's activities;
- Promoting patient HBP medication adherence through public policies and programs; and
- Supporting implementation of the recommendations in the Institute of Medicine's report "Strategies to Reduce Sodium Intake in the United States."

#### References

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- <sup>4</sup>American Heart Association. What is High Blood Pressure. Accessed March 5, 2013 at: <http://www.heart.org/highbloodpressure>
- <sup>5</sup>He FJ, MacGregor GA. A comprehensive review on salt and health and current experience of worldwide salt reduction programmes. *J Hum Hypertens* 2008.
- <sup>6</sup>He J, Whelton PK. Elevated systolic blood pressure and risk of cardiovascular and renal disease: overview of evidence from observational epidemiologic studies and randomized controlled trials. *Am Heart J*. 1999;138(Pt 2):211-219.
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- <sup>13</sup>Appel LJ, Frohlich ED, Hall JE, Pearson TA, Sacco RL, Seals DR, Sacks FM, Smith SC Jr, Vafiadis DK, Van Horn LV. The importance of population-wide sodium reduction as a means to prevent cardiovascular disease and stroke: a call to action from the American Heart Association. *Circulation*. 2011 Mar 15;123(10):1138-43.
- <sup>14</sup>Potential health benefits and medical cost savings from calorie, sodium, and saturated fat reductions in the American diet. *American Journal of Health Promotion*. July/Aug 2009 (23)16: 412