Cardiovascular disease (CVD) is the leading cause of death for both men and women affecting all racial and ethnic groups in Indiana. CVD includes heart disease and stroke. Coronary artery disease, a type of heart disease, may lead to heart attack.

Economic Impact of Cardiovascular Diseases in Indiana
The total cost (direct and indirect) of treating heart disease in Indiana was estimated at $4.15 billion, while that for stroke was $84 million in 2003. The cost to Indiana of heart disease and stroke is projected to be $10.6 billion and $2 billion, respectively, for the year 2023.

Burden of Heart Disease in Indiana
- Heart disease is the leading cause of death for all races and genders in Indiana. In 2007, there were 13,715 deaths due to heart disease.
- Indiana ranked 39th in the nation for the prevalence of heart attack and 38th for coronary artery disease, respectively, among the adult population in 2009.
- In 2009, 5% of Indiana adults reported being told that they had a heart attack, while nearly 5% reported having coronary artery disease.
- Based on self-report, white males had the highest prevalence of heart attack while Hispanic men had the highest prevalence of coronary artery disease.
- In 2008, 11% of all inpatient discharges and more than 2% of outpatient visits were due to heart disease.

Burden of Stroke in Indiana
- Stroke is the 4th leading cause of death in Indiana. More than 3,000 Hoosiers died from stroke in 2007, accounting for 5.6% of all deaths.
- Stroke is the 5th leading cause of death in Indiana males and 3rd in females. Blacks have a higher age-adjusted death rate (60 per 100,000 population) from stroke than whites (44 per 100,000 population).
- Indiana ranked 34th in the nation for the prevalence of stroke in 2009.
- In 2009, 2.6% of Indiana adults reported being diagnosed with stroke.
- Based on self-report, black adult females in Indiana had the highest prevalence of stroke.
- In 2008, 2% of all Indiana inpatient discharges were due to stroke.

Prevalence of Heart Attack (MI), Coronary Artery Disease(CAD) and Stroke, US and Indiana, 2009

<table>
<thead>
<tr>
<th>Disease</th>
<th>Prevalence (Percent)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Stroke</td>
<td>2.6</td>
</tr>
<tr>
<td>CAD</td>
<td>3.8</td>
</tr>
<tr>
<td>MI</td>
<td>3.9</td>
</tr>
</tbody>
</table>

Age-Adjusted Mortality Due to Heart Disease and Stroke, US and Indiana, 2007

<table>
<thead>
<tr>
<th>Disease</th>
<th>Age-Adjusted Rate per 100,000</th>
</tr>
</thead>
<tbody>
<tr>
<td>Stroke</td>
<td>44.5 (Indiana) 42.2 (US)</td>
</tr>
<tr>
<td>Heart Disease</td>
<td>203.47 (Indiana) 190.9 (US)</td>
</tr>
</tbody>
</table>
Risk Factors for Heart Disease and Stroke in Indiana

- **High blood pressure:** In 2009, 31% of all Indiana adults (1 out of 3) reported having high blood pressure. More than 11% of heart attack and 6% of stroke patients reported being diagnosed with high blood pressure.\(^3\)
- **High cholesterol:** In 2009, nearly 40% of Indiana adults (2 out of 5) reported having high cholesterol.\(^2\) Indiana ranked 34th in the nation for the prevalence of high cholesterol.\(^2\)
- **Diabetes:** Self-reported prevalence of diabetes among Indiana adults has increased by 12% from 2005 to 2009. 16% of heart attack patients and 8.7% of stroke patients were diabetic in 2009.\(^3\)
- **Physical inactivity:** In 2009, 27% of Indiana adults (1 out of 4) responded that they had not participated in physical activity during the past 30 days.\(^3\)
- **Poor nutrition:** More than 79% of Indiana adults (4 out of 5) did not consume the recommended five servings of fruits and vegetables per day in 2009.\(^3\)
- **Obesity:** Between 2005 and 2009, the obesity rate among Indiana adults increased by 10%. One out of three adults reported being obese in 2009, and two of three adults were either overweight or obese.\(^3\)
- **Smoking:** Based on self reported data, the prevalence of Indiana adults who currently smoke has decreased by 15% from year 2005 to 2009.\(^3\)

Recognition of Signs and Symptoms

Recognition of heart attack signs and symptoms among approximately 8,000 surveyed Indiana adults 18 years and older ranged from 68.4% for pain in jaw, neck, or back to 96.3% for chest pain or discomfort. Recognition of stroke signs and symptoms ranged from 46.1% for chest pain to 97.8% for sudden numbness/weakness of face, arm, or legs – especially on one side. 86% of all adults responded that they would call 911 if they thought that someone was having a heart attack or stroke.\(^3\)

References

2. Americas Health Rankings 2009, United Health Foundation
4. Indiana State Department of Health, Epidemiology Resource center, Indiana Hospital Association databases, 2008
5. Indiana State Department of Health, Mortality data, 2007

*1\(^{st}\) is lowest prevalence.