SEER Stat Fact Sheets: Soft Tissue including Heart

Cancer: Soft Tissue including Heart

It is estimated that 11,410 men and women (6,290 men and 5,120 women) will be diagnosed with and 4,390 men and women will die of cancer of the soft tissue including heart in 2013.

The following information is based on NCI's SEER Cancer Statistics Review. Use the links on this page to learn more about each statistic type:

- Incidence & Mortality
- Survival & Stage
- Lifetime Risk
- References

Incidence & Mortality

SEER Incidence

From 2006-2010, the median age at diagnosis for cancer of the soft tissue including heart was 58 years of age.

Approximately 9.0% were diagnosed under age 20; 9.4% between 20 and 34; 10.0% between 35 and 44; 14.8% between 45 and 54; 17.2% between 55 and 64; 16.2% between 65 and 74; 16.2% between 75 and 84; and 7.2% 85+ years of age.

The age-adjusted incidence rate was 3.3 per 100,000 men and women per year. These rates are based on cases diagnosed in 2006-2010 from 18 SEER geographic areas.

Incidence Rates by Race

<table>
<thead>
<tr>
<th>Race/Ethnicity</th>
<th>Male</th>
<th>Female</th>
</tr>
</thead>
<tbody>
<tr>
<td>All Races</td>
<td>4.0 per 100,000 men</td>
<td>2.8 per 100,000 women</td>
</tr>
<tr>
<td>White</td>
<td>4.1 per 100,000 men</td>
<td>2.8 per 100,000 women</td>
</tr>
<tr>
<td>Black</td>
<td>3.6 per 100,000 men</td>
<td>3.1 per 100,000 women</td>
</tr>
<tr>
<td>Asian/Pacific Islander</td>
<td>2.6 per 100,000 men</td>
<td>2.1 per 100,000 women</td>
</tr>
<tr>
<td>American Indian/Alaska Native a</td>
<td>2.9 per 100,000 men</td>
<td>2.1 per 100,000 women</td>
</tr>
<tr>
<td>Hispanic b</td>
<td>3.5 per 100,000 men</td>
<td>2.7 per 100,000 women</td>
</tr>
</tbody>
</table>

US Mortality

From 2006-2010, the median age at death for cancer of the soft tissue including heart was 65 years of age.

Approximately 3.6% died under age 20; 6.1% between 20 and 34; 6.6% between 35 and 44; 13.5% between 45 and 54; 19.1% between 55 and 64; 19.1% between 65 and 74; 20.8% between 75 and 84; and 11.2% 85+ years of age.

The age-adjusted death rate was 1.3 per 100,000 men and women per year. These rates are based on patients who died in 2006-2010 in the US.
Death Rates by Race

<table>
<thead>
<tr>
<th>Race/Ethnicity</th>
<th>Male</th>
<th>Female</th>
</tr>
</thead>
<tbody>
<tr>
<td>All Races</td>
<td>1.5 per 100,000 men</td>
<td>1.1 per 100,000 women</td>
</tr>
<tr>
<td>White</td>
<td>1.5 per 100,000 men</td>
<td>1.1 per 100,000 women</td>
</tr>
<tr>
<td>Black</td>
<td>1.4 per 100,000 men</td>
<td>1.4 per 100,000 women</td>
</tr>
<tr>
<td>Asian/Pacific Islander</td>
<td>0.9 per 100,000 men</td>
<td>0.8 per 100,000 women</td>
</tr>
<tr>
<td>American Indian/Alaska Native a</td>
<td>1.3 per 100,000 men</td>
<td>1.0 per 100,000 women</td>
</tr>
<tr>
<td>Hispanic b</td>
<td>1.1 per 100,000 men</td>
<td>0.9 per 100,000 women</td>
</tr>
</tbody>
</table>

Trends in Rates

Trends in rates can be described in many ways. Information for trends over a fixed period of time, for example 1996-2010, can be evaluated by the **annual percentage change (APC)**. If there is a negative sign before the number, the trend is a decrease; otherwise it is an increase. If there is an asterisk after the APC then the trend was significant, that is, one believes that it is beyond chance, i.e. 95% sure, that the increase or decrease is real over the period 1996-2010. If the trend is not significant, the trend is usually reported as stable or level. **Joinpoint analyses** can be used over a long period of time to evaluate when changes in the trend have occurred along with the APC which shows how much the trend has changed between each of the joinpoints.

![The joinpoint trend in SEER cancer incidence with associated APC(%) for cancer of the soft tissue including heart between 1975-2010, All Races](image)

![The joinpoint trend in US cancer mortality with associated APC(%) for cancer of the soft tissue including heart between 1975-2010, All Races](image)

Survival & Stage

**Survival** can be calculated by different methods for different purposes. The survival statistics presented here are based on **relative survival**, which measures the survival of the cancer patients in comparison to the general population to estimate the effect of cancer. The overall 5-year relative survival for 2003-2009 from 18 SEER geographic areas was 66.1%. Five-year relative survival by race and sex was: 66.1% for white men; 68.5% for white women; 58.7% for black men; 59.7% for black women.

| Stage Distribution and 5-year Relative Survival by Stage at Diagnosis for 2003-2009, All Races, Both Sexes |
|---------------------------------------------------------------|---------------------------------|------------------|
| Stage at Diagnosis                                           | Stage Distribution (%)          | 5-year Relative Survival (%) |
| Localized (confined to primary site)                         | 55                              | 82.5              |
| Regional (spread to regional lymphnodes)                     | 24                              | 61.3              |
The stage distribution is based on Summary Stage 2000.

**Lifetime Risk**

Based on rates from 2008-2010, 0.33% of men and women born today will be diagnosed with cancer of the soft tissue including heart at some time during their lifetime. This number can also be expressed as 1 in 302 men and women will be diagnosed with cancer of the soft tissue including heart during their lifetime. These statistics are called the lifetime risk of developing cancer. Sometimes it is more useful to look at the probability of developing cancer of the soft tissue including heart between two age groups. For example, 0.11% of men will develop cancer of the soft tissue including heart between their 50th and 70th birthdays compared to 0.09% for women.

**References**

All statistics in this report are based on SEER incidence and NCHS mortality statistics. Most can be found within:


**Footnotes**

1 Table I-1 (http://seer.cancer.gov/csr/1975_2010/results_single/sect_01_table.01.pdf)
3 Table I-12 (http://seer.cancer.gov/csr/1975_2010/results_single/sect_01_table.12_2pgs.pdf)
· The APC is significantly different from zero (p<.05).

a Incidence data for Hispanics is based on NHIA and excludes cases from Alaska Native Registry. Hispanic death rates exclude deaths from the District of Columbia, North Dakota and South Carolina.

b Incidence and mortality data for American Indians/Alaska Natives is based on the CHSDA (Contract Health Service Delivery Area) counties.

**Definitions**

**Annual percent change (APC)**

The average annual percent change over several years. The APC is used to measure trends or the change in rates over time. For information on how this is calculated, go to Trend Algorithms in the SEER*Stat Help system. The calculation involves fitting a straight line to the natural logarithm of the data when it is displayed by calendar year.

**Joinpoint analyses**

A statistical model for characterizing cancer trends which uses statistical criteria to determine how many times and when the trends in incidence or mortality rates have changed. The results of joinpoint are given as calendar year ranges, and the annual percent change (APC) in the rates over each period.

**Survival**

Survival examines how long after diagnosis people live. Cancer survival is measured in a number of different ways depending on the intended purpose.

**Relative survival**

A measure of net survival that is calculated by comparing observed (overall) survival with expected survival from a comparable set of people that do not have cancer to measure the excess mortality that is associated with a cancer diagnosis.

**Stage distribution**

Stage provides a measure of disease progression, detailing the degree to which the cancer has advanced. Two methods commonly used to determine stage are AJCC and SEER Summary Stage. The AJCC method (see Collaborative Staging Method) is more commonly used in the clinical settings, while SEER has strived to provide consistent definitions over time with their Local/Regional/Distant staging.
Lifetime risk
The probability of developing cancer in the course of one’s lifespan. Lifetime risk may also be discussed in terms of the probability of developing or of dying from cancer. Based on cancer rates from 2008 to 2010, it was estimated that men had about a 44 percent chance of developing cancer in their lifetimes, while women had about a 38 percent chance.

Probability of developing cancer
The chance that a person will develop cancer in his/her lifetime.

Prevalence
The number of people who have received a diagnosis of cancer during a defined time period, and who are alive on the last day of that period. Most prevalence data in SEER is for limited duration because information on cases diagnosed before 1973 is not generally available.