



Public Health

CITY OF KANSAS CITY, MISSOURI
COMMUNITY ENGAGEMENT, POLICY,
and ACCOUNTABILITY



KCMO PUBLIC HEALTH REPORT

WINTER 2019

LEADING CAUSES OF DEATH, 2013-2017

Note: We are pleased to introduce the KCMO Public Health Report, a statistics-focused report highlighting different health issues in Kansas City, Missouri. In this analysis, non-traditional 10 year age groups beginning at age 0 were used. While overall rankings are comparable, to the state and national rankings, age group rankings are not.

This report presents a variation of the 2013-2017 data in leading causes of death in Kansas City, Missouri. These rankings denote the most frequently occurring cause of death among those eligible to be ranked. Rankings do not illustrate cause-specific mortality risk as depicted by mortality rates. The rank of a specific cause may decline over time even if its mortality rate has not changed, or its rank may remain the same over time even if its mortality rate is declining.

CANCER

Rank: 1

Previous Rank: 1

Deaths: 4126 in 2013-2017, 829 in 2017

Age-adjusted death rate: 183.6 per 100,000 population

Percentage of total deaths: 21.8 percent

As the leading cause of death in Kansas City, Missouri (KCMO), more than half of the deaths that occur as a result of cancer are among men. Cancer is leading cause of death for those aged 50-79, accounting for more than 1 every 4 deaths (Figure 1). Approximately one-third of all deaths

- **CANCER REMAINS THE LEADING CAUSE OF DEATH AMONG KCMO RESIDENTS**
- **THE TOP 3 LEADING CAUSES OF DEATH—CANCER, HEART DISEASE, & ACCIDENTS—ACCOUNT FOR NEARLY HALF OF ALL KCMO DEATHS.**
- **HOMICIDES REPLACED ALZHEIMER’S DISEASE AS THE TENTH LEADING CAUSE OF DEATH**

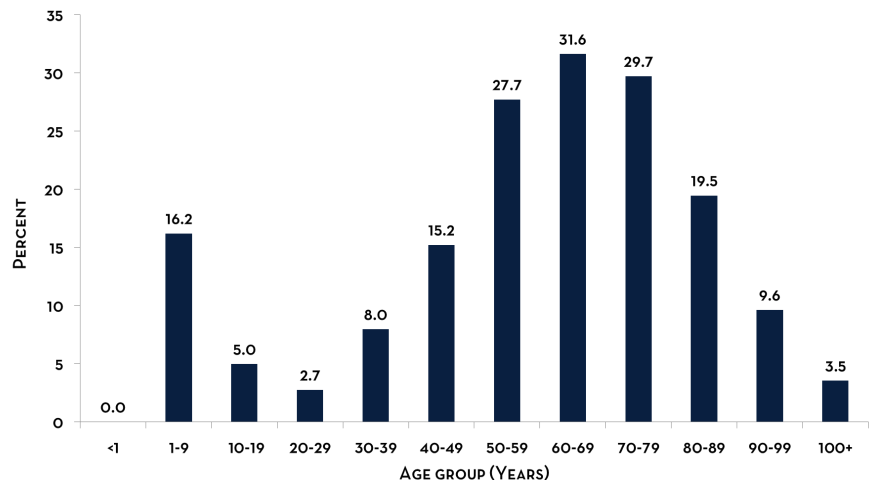


Figure 1. Percent of deaths due to cancer within each age group. Source: Missouri Department of Health & senior Services Death Data

from cancer are for those aged 60-69 (Figure 1). The percentage decreased with increasing age, and there were no longer top five causes of death for those aged 100 or older, accounting for only 3.5 percent of total deaths (Figure 1).

Cancer is a group of diseases characterized by the uncontrolled growth and spread of abnormal cells (1). If the spread is not controlled, it can interfere with essential life-sustaining systems and result in death. Anyone can develop cancer, but the risk of most types of cancer increases with age, and some individuals have higher or lower risk due to differences in exposure to carcinogens (such as from smoking) and as a result of genetic factors (1). Lung cancer accounts for more deaths than any other cancer in both men and women (1).

PREVENTION STRATEGIES

Cancer can take years, or even decades to develop, yet many people believe that getting cancer is due to genes, fate or bad luck. In reality, cancer risk depends on a combination of our genes, our lifestyle and our environment (2). So, when we talk about cancer prevention, we focus on what we can control and how we can lower our risk. This is important: there are things you can do today that can help to prevent, delay, or even stop the cancer process at all stages of life (2). These include the removal or minimization of factors known to cause or increase the risk of cancer, such as cigarette smoking & tobacco use, infections (see note), radiation, and immunosuppressive medicines taken after organ transplant. There are also factors that may impact the risk of cancer,

NOTE: Some cancers are related to infectious agents such as human papillomavirus (HPV), hepatitis B virus (HBV), hepatitis C virus (HCV), human immunodeficiency virus (HIV), and Helicobacter pylori (H. pylori) - these may be prevented through behavioral changes and use of protective vaccinations and antibiotic treatments.

including diet, use of alcohol, physical activity, obesity, and diabetes (2). Some risk factors for cancer can be avoided, but many cannot. Taking steps to live as healthy as possible can help minimize your risk of cancer.

HEART DISEASE

Rank: 2
 Previous Rank: 2
 Deaths: 3945 in 2013-2017, 778 in 2017
 Age-adjusted death rate: 176.7 per 100,000 population
 Percentage of total deaths: 20.8 percent

More than half of the deaths that occur as a result of heart disease are in men (53.6%). The percentage of all deaths due to heart disease increased with age, accounting for 34.7% for those aged 100 or older (Figure 2).

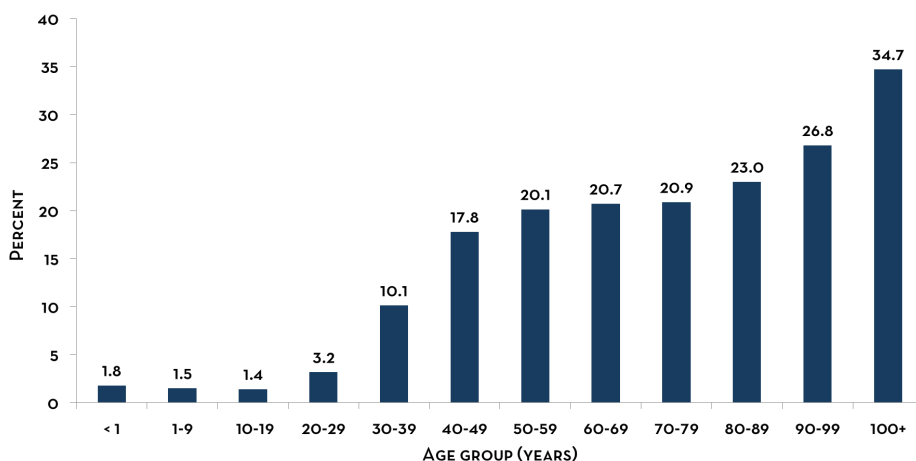


Figure 2. Percent of all deaths due to heart disease within each age group. Source: Missouri Department of Health & Senior Services Death Data

Heart disease is a term used to describe several conditions, many of which are related to plaque buildup in the walls of the arteries. As the plaque builds up, the arteries narrow, this makes it harder for blood to flow and creates a risk for heart attack or stroke (3).

PREVENTION STRATEGIES

Prevention of heart disease is twofold. It involves practicing healthy living habits as well as preventing or treating other medical conditions that can lead to heart disease (4).

By living a healthy lifestyle, you can keep your blood pressure, cholesterol, and blood sugar normal, lowering your risk for heart

disease and heart attack (4). Lowering blood pressure and cholesterol can significantly lower heart disease risk. Several lifestyle and dietary modifications can dramatically reduce the risk of heart disease, including:

- Eating a healthy, balanced diet
- Exercising regularly
- Limiting alcohol intake
- Quit smoking

Taking other steps, such as getting your blood cholesterol checked, ensuring your blood pressure is under control, and managing diabetes, if you have it, can lower your risk for heart disease (4).

ACCIDENTS

Rank: 3
 Previous Rank: 3
 Deaths: 1155 in 2013-2017, 261 in 2017
 Age-adjusted death rate: 49.4 per 100,000 population
 Percentage of total deaths: 6.1 percent

Accidents are also referred to as unintentional injuries and are the leading cause of death for those aged 1-9 and 30-39 and the second leading cause death for those aged 10-29 and 40-49 (Figure 3). Death due to accidents accounted for one-third of all deaths for those aged 1-9; accounting for almost 1 every 4 deaths for those aged 10-39 (Figure 3).

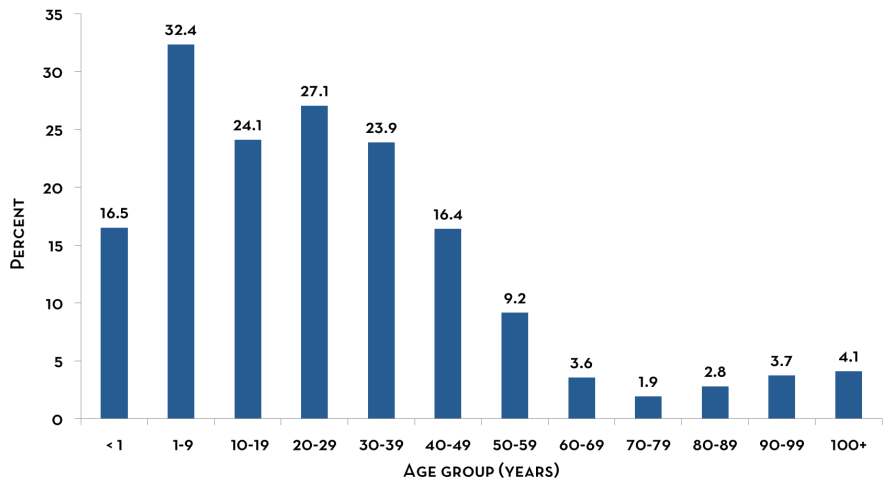


Figure 3. Percent of all deaths due to accidents within each age group. Source: Missouri Department of Health & Senior Services Death Data

PREVENTION STRATEGIES

Injuries are not accidents—they are predictable and avoidable. Unintentional injuries (i.e., traffic-related injuries, falls, burns, poisonings) are responsible for lost lives, decreased quality of life, and substantial health care costs (5). While injuries impact everyone, people of color and those with lower incomes are particularly at risk. Comprehensive, integrated, quality strategies prevent unintentional injuries in the first place, keeping communities safe and thriving (5).

CHRONIC LOWER RESPIRATORY DISEASE

Rank: 4
 Previous Rank: 4
 Deaths: 1071 in 2013-2017, 223 in 2017
 Age-adjusted death rate: 48.2 per 100,000 population
 Percentage of total deaths: 5.6 percent

Chronic lower respiratory disease (CLRD) is a collection of lung diseases that cause airflow blockage and breathing-related issues (6). CLRD includes primarily chronic obstructive pulmonary disease (COPD) but also bronchitis, emphysema, and asthma. Approximately 7 out of 100 deaths occurred in for those aged 60-89 in KCMO (Figure 4).

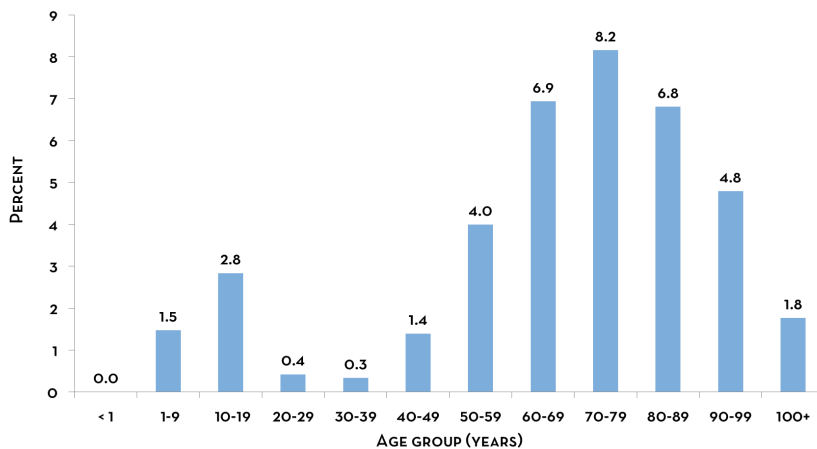


Figure 4. Percent of deaths due to CLRD within each age group. Source: Missouri Department of Health & Senior Services Death Data

PREVENTION STRATEGIES

Smoking is the biggest risk factor for COPD; it is a key factors in the

development and progression of the disease (6).

Other risk factors for COPD include:

- Exposure to air pollution
- Breathing secondhand smoke
- Working with chemicals, dust and fumes
- A genetic condition called Alpha-1 deficiency
- A history of childhood respiratory infection

SMOKING IS THE BIGGEST RISK FACTOR FOR CHRONIC OBSTRUCTIVE PULMONARY DISEASE.

Steps to Reduce Your Risk for CLRD

If you are concerned about developing CLRD, there are steps you can take to protect yourself.

- If you are a smoker, *stop smoking*. Quitting smoking is the single most important part of treatment for smokers diagnose with CLRD (6). The American Lung Association has many programs to help you quit for good (7).
- Avoid exposure to secondhand smoke. Make your home smoke free, and learn about your rights to a smoke free environment at work and in public places (6).
- Take care to protect yourself against air pollutants and respiratory diseases (6).

DEMENTIA EXCLUDING ALZHEIMER'S DISEASE

Rank: 5

Previous Rank: 5

Deaths: 1038 in 2013-2017, 208 in 2017

Age-adjusted death rate: 47.4 per 100,000 population

Percentage of total deaths: 5.5 percent

Dementia is not a specific disease, rather an overall term for a group of

symptoms associated with a severe decline in memory or other thinking skills that impairs a person's ability to perform everyday activities (8). Vascular dementia, which often occurs after a stroke, is the most common cause of non-Alzheimer's dementia (8). The death rate due to dementia has increased 36% from 2008 to 2017 (data not shown). The percentage of deaths due to dementia increases with age. Approximately 1 every 5 deaths occurred in those aged 100 or older, accounting for 18.8% for aged 100 or older (Figure 5).

Dementia is caused by damage to brain cells, which interferes with the ability of brain cells to communicate with each other. When brain cells cannot communicate normally, thinking, behavior and feelings can be affected (8).

PREVENTION STRATEGIES

While most changes in the brain that cause dementia are permanent and worsen over time, thinking and memory problems caused by depression, excess alcohol use, and/or vitamin deficiencies may improve when the condition is treated or addressed (8).

Engagement in mentally stimulating activities can also lower your risk of developing dementia (9). We can strengthen our brain at any age, through workplace achievement and leisure activities such as reading newspapers, playing card games, or learning a new language or skill (9). Nowadays, there are many apps that are easily downloaded to a smartphone or tablet that can stimulate the mind.

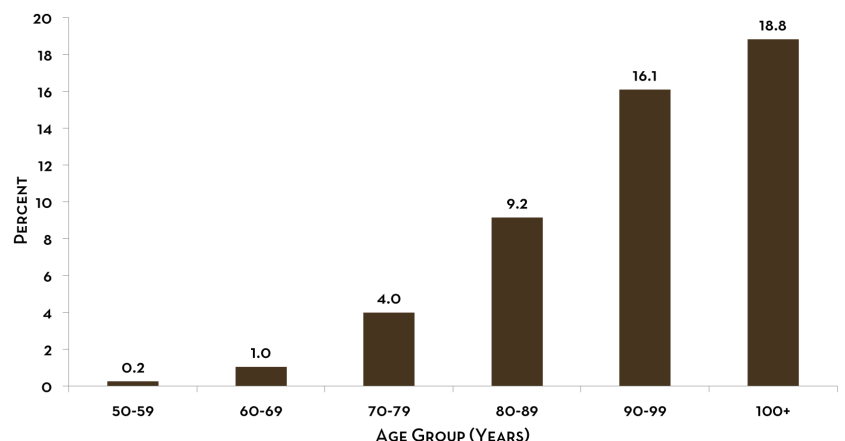


Figure 5. Percent of deaths due to dementia within each age group. Note: percent of dementia deaths for all age groups less than 50 years is 0.0. Source: Missouri Department of Health & Senior Services Death Data

Many other factors affect how the brain ages, including physical activity, mental health, sleep and diet. The role of physical activity in brain health may be especially important. This is because being physically active keeps the heart fit, which in turn keeps the brain fit (9, 10). The same risk factors for heart disease may also put people at risk for developing dementia later in life, so if you are focused on preventing heart disease, you may also be decreasing your risk for dementia.

STROKE

Rank: 6

Previous Rank: 6

Deaths: 954 in 2013-2017, 191 in 2017

Age-adjusted death rate: 43.1 per 100,000 population

Percentage of total deaths: 5.0 percent

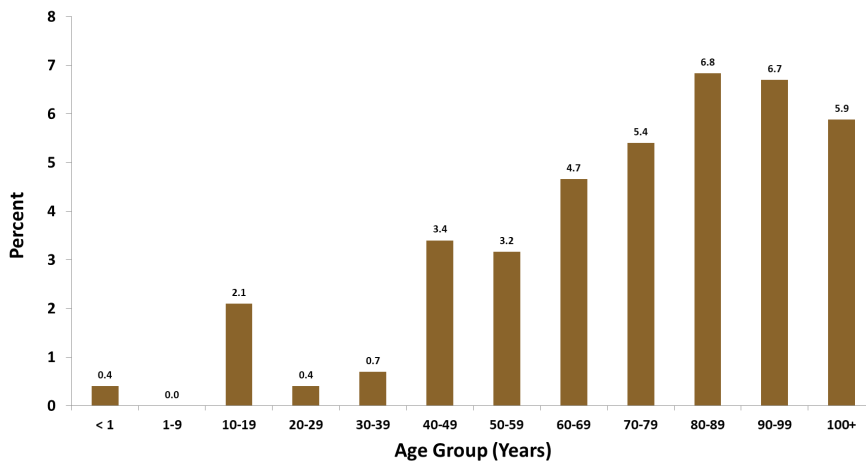


Figure 6. Percent of deaths due to stroke within each age group. Source: Missouri Department of Health & Senior Services Death Data

A stroke occurs when blood circulation to the brain is blocked, often resulting in the death of brain cells due to decreased blood flow and a subsequent lack of oxygen (11). Stroke accounted for 5.0% of all deaths in KCMO from 2013-2017. Those aged 80-99 are the most likely to die from a stroke (Figure 6).

PREVENTION STRATEGIES

High blood pressure, high cholesterol, and smoking are major risk factors for stroke (11). Several other medical conditions and unhealthy lifestyle choices can increase

your risk for stroke, such as diabetes and physical inactivity (11).

Although you cannot control all of your risk factors for stroke, you can take steps to prevent stroke and its complications. Stroke prevention measures include (11):

- Eating a healthy diet and maintaining a healthy weight
- Not smoking
- Limiting alcohol use
- Managing cholesterol levels
- Controlling blood pressure
- Managing diabetes & any other chronic conditions

INFECTIONS AND INFECTIOUS DISEASES

Rank: 7

Previous Rank: 7

Deaths: 865 in 2013-2017, 177 in 2017

Age-adjusted death rate: 38.6 per 100,000 population

Percentage of total deaths: 4.6 percent

Infectious disease illnesses are caused by organisms usually unseen by the naked eye, such as bacteria, viruses, fungi, or parasites that are passed from one person to another (12). Infections or infectious disease are the leading cause of death worldwide and account for 4.6% of all deaths in KCMO, impacting all age groups (Figure 7). Influenza (flu) and pneumonia accounted

for 37% of all infections or infectious disease deaths for those aged 5-34 (data not shown). Flu and pneumonia accounted 66% of all infections or infectious disease deaths for those aged 90-99 and 82% of deaths in this category for those aged 100 or older (data not shown).

VACCINATIONS ARE THE SINGLE MOST IMPORTANT WAY TO PREVENT A DEATH DUE TO INFECTIONS OR INFECTIOUS DISEASE.

PREVENTION STRATEGIES

Get Vaccinated

- Get a flu shot every year to prevent seasonal influenza. The flu is a common cause of pneumonia, so preventing the flu is a good way to prevent pneumonia.
- Children younger than 5 and adults 65 and older should get vaccinated against pneumococcal pneumonia, a common form of bacterial pneumonia. The pneumococcal vaccine is also recommended for all children and adults who are at increased risk of pneumococcal disease due to other health conditions. There are two types of pneumococcal vaccine. Talk to your healthcare provider to find out if one of them is right for you.
- There are several other vaccines that can prevent infections by bacteria and viruses that may lead to pneumonia, including pertussis, chicken pox and measles. Please talk to your doctor about whether you and your children are up to date on your vaccines and to determine if any of these vaccines are appropriate for you.

DIABETES

Rank: 8

Deaths: 539 in 2013-2017, deaths: 101 in 2017

Age-adjusted death rate: 23.9 per 100,000 population

Percentage of total deaths: 2.8 percent

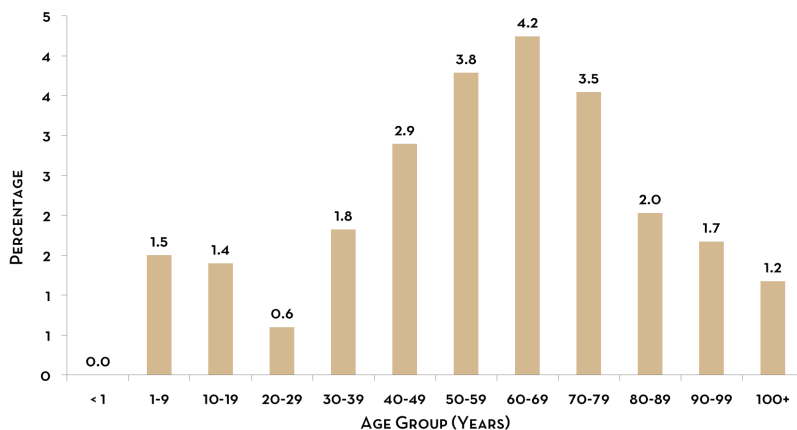


Figure 8. Percent of deaths due to diabetes within each age group. Source: Missouri Department of Health & Senior Services Death Data, 2013-2017

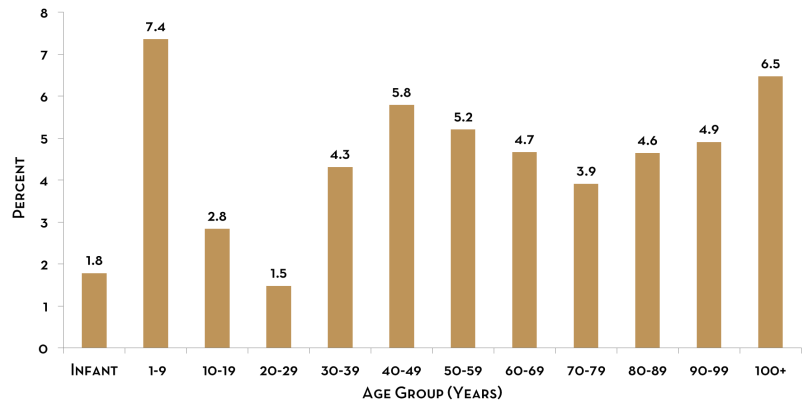


Figure 7. Percent of deaths due to infections or infectious diseases within each age group. Source: Missouri Department of Health & Senior Services Death Data

Diabetes is a disease in which blood sugar levels are above normal (13). High levels of sugar in the blood can lead to extreme tiredness, more infections & slower recovery, while also possibly leading to heart, kidney, and nerve damage and dental problems (13). The percentage of all deaths due to diabetes increased with age up to 69 years, and then decreased with age (Figure 8).

PREVENTION STRATEGIES

Type 1 diabetes is an autoimmune condition where the body's immune system misidentifies the insulin-producing cells in the pancreas and attacks these cells (14). Researchers are making progress in identifying the involvement of genes and triggering factors that predispose some individuals to develop type 1 diabetes, but there is no known way to prevent type 1 diabetes.

When it comes to type 2 diabetes—the most common type of diabetes—prevention is a big deal. It's especially important to make diabetes prevention a priority if you are at increased risk of developing the disease. Taking steps now can help you avoid serious health complications mentioned earlier. A number of studies have shown that regular physical activity can significantly reduce the risk, as can maintaining a healthy body weight by making healthier choices (13). You should talk to your doctor if you are 45 years or older and are overweight, or if you are younger, overweight and have a family history of diabetes (14).

KIDNEY DISEASE

Rank: 9

Previous Rank: 9

Deaths: 538 in 2013-2017, 121 in 2017

Age-adjusted death rate: 24.1 per 100,000 population

Percentage of total deaths: 2.8 percent

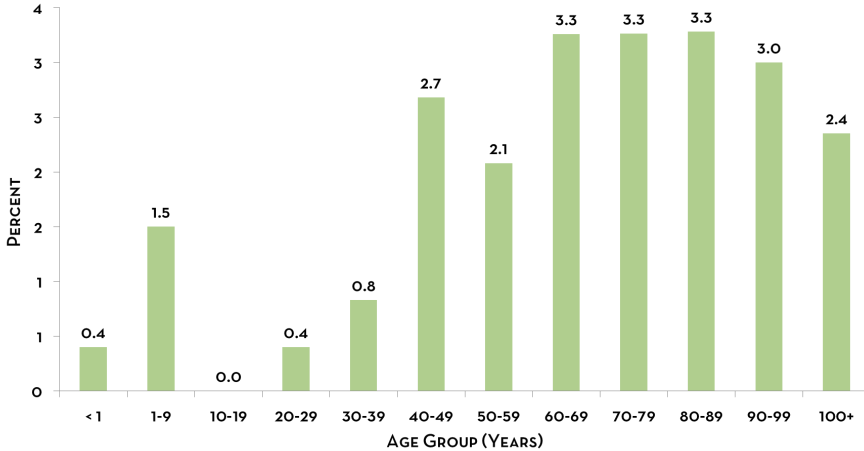


Figure 9. Percent of deaths due to kidney disease within each age group. Source: Missouri Department of Health & Senior Services Death Data, 2013-2017

Chronic kidney disease, (kidney disease) is a condition in which kidney function is gradually lost over time (15). As kidney disease progresses, the kidneys lose their ability to filter extra water and wastes out of your blood, these wastes build up and can make you feel sick. Complications, such as high blood pressure, anemia (low blood cell count), weak bones and nerve damage can develop (15). When kidney disease is allowed to progress, it may eventually lead to kidney failure, which requires dialysis or a kidney transplant to maintain life (15).

PREVENTION STRATEGIES

Kidney disease may be caused by diabetes, high blood pressure or other chronic diseases (15). So, working to reduce your risk of those conditions can also help reduce your risk of developing kidney disease. To reduce your risk of chronic kidney disease:

- Limit intake of alcohol
- Maintain a healthy weight
- Quit smoking
- Manage medical conditions with

the help of a doctor or health care professional.

HOMICIDE

Rank 10

Previous Rank: 11

Deaths: 512 in 2013-2017, 132 in 2017

Age-adjusted death rate: 21.0 per 100,000 population

Percentage of total deaths: 2.7 percent

Homicide has risen to become the tenth leading cause of death in KCMO. Every member of the KCMO community is harmed by homicide and violence. Increased health care costs, decreases in property values, disruptions in social services and threats to the viability of businesses all occur when homicides are as prevalent as they are in KCMO (16). Homicide mainly occurred in those aged 1-39 (Figure 10). The peak is for those

aged 20-29 and accounting for nearly 40% of all deaths within this age group. In other words, homicide represented 40 deaths out of 100 total deaths in those aged 20-29 from 2013-2017.

PREVENTION STRATEGIES

Homicide incidents should not be seen as single events but as indicators of changes in the underlying social and economic conditions of a city, including race, poverty and social connectedness (17). The population at greatest risk for a homicide-related death continues to be young Black males living in KCMO's lowest life expectancy ZIP codes (data not shown). While the

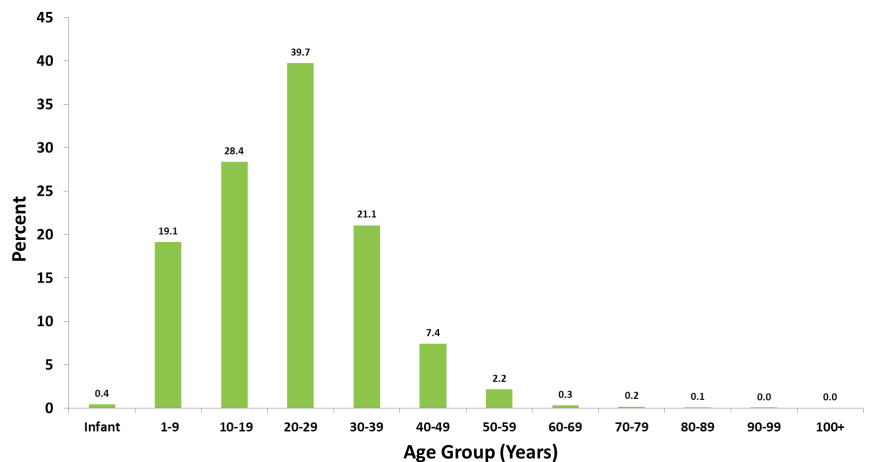


Figure 10. Percent of deaths due to homicide within each age group. Source: Missouri Department of Health & Senior Services Death Data, 2013-2017

successfulness of local interventions are tied to the unique conditions of each area, research continually finds that the interventions most successful at reducing homicide come at the policy level or are grass roots initiatives driven by multi-sector collaborations (17). Successful prevention strategies include school-based programs that build communication skills to solve problems in non-violent ways; community-based programs that ‘interrupt’ retaliatory violence; and economic, policy, and environmental approaches that enhance safety and increase opportunities for positive participation in the community (16).

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