

MISSION: TO IMPROVE THE HEALTH OF THE PEOPLE AND COMMUNITIES WE SERVE.



# Community Health Needs Assessment and Implementation Plan **2022**



**Missouri Baptist**  
MEDICAL CENTER

**BJC** HealthCare

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## Executive Summary

Missouri Baptist Medical Center (MBMC) is a 480-bed, acute-care hospital located in Town and Country, a western suburb of St. Louis County, Missouri. The hospital offers a full continuum of medical and surgical services, as well as 24-hour adult and pediatric emergency services. Additionally, MBMC's outpatient facilities in Sunset Hills and Ellisville, suburbs of St. Louis County, provide many key services in convenient locations. What began as a small hospital in 1884 has grown into a thriving medical center delivering high quality health care services to patients across the St. Louis region. The hospital has also established effective partnerships towards the goal of improving the health of the community. (See Appendix A for additional information)

Like all nonprofit hospitals, MBMC is required by the Patient Protection and Affordable Care Act (PPACA) to conduct a community health needs assessment (CHNA) and create an implementation plan every three years. MBMC completed its first CHNA and implementation plan in 2013 and again in 2016 and 2019. Reports were posted to the hospital's website to ensure easy access to the public.

As part of this assessment, each hospital is required to define its community. Once the community is defined, input must be solicited from those who represent the broad interests of the community served by the hospital, as well as those who have special knowledge and expertise in the area of public health. This process occurred in two phases.

In the past, community stakeholder health needs assessments were conducted in person via a moderated discussion. Due to COVID-19, BJC HealthCare, along with collaborative health system and hospital partners, conducted an online survey for the safety of community stakeholders. The survey provided stakeholders an opportunity to rank community health needs compiled by these partners.

During phase two, findings from the stakeholder survey were reviewed and analyzed by an internal hospital work group of clinical and non-clinical staff. Using multiple sources, including Conduent Healthy Communities Institute, a secondary data analysis was conducted to further assess the identified needs. This analysis identified unique health disparities and trends evident in St. Louis County when compared to the state.

At the conclusion of the comprehensive assessment process to determine the most critical needs in west and south St. Louis County, the work group concluded that it will present the following two proposals to the Executive Team for the hospital's implementation plan: Option 1 - combine Diabetes and Obesity or Option 2 - Cancer. After thorough discussion with the Executive Team around resources, the Executive Team decided on Option 2 - Cancer.

The analysis and conclusions will be presented and reviewed for approval by the MBMC Board of Trustees.

# Community Description

## GEOGRAPHY

MBMC is a member of BJC HealthCare, one of the largest, nonprofit health care organizations in the country. BJC HealthCare hospitals serve urban, suburban and rural communities through 15 hospitals and multiple community health locations primarily in the greater St. Louis, southern Illinois and mid-Missouri regions.

MBMC is one of three BJC HealthCare hospitals located in St. Louis County, along with Christian Hospital and Barnes-Jewish West County Hospital.

## ST. LOUIS COUNTY SUB-COUNTY: WEST COUNTY AND SOUTH COUNTY

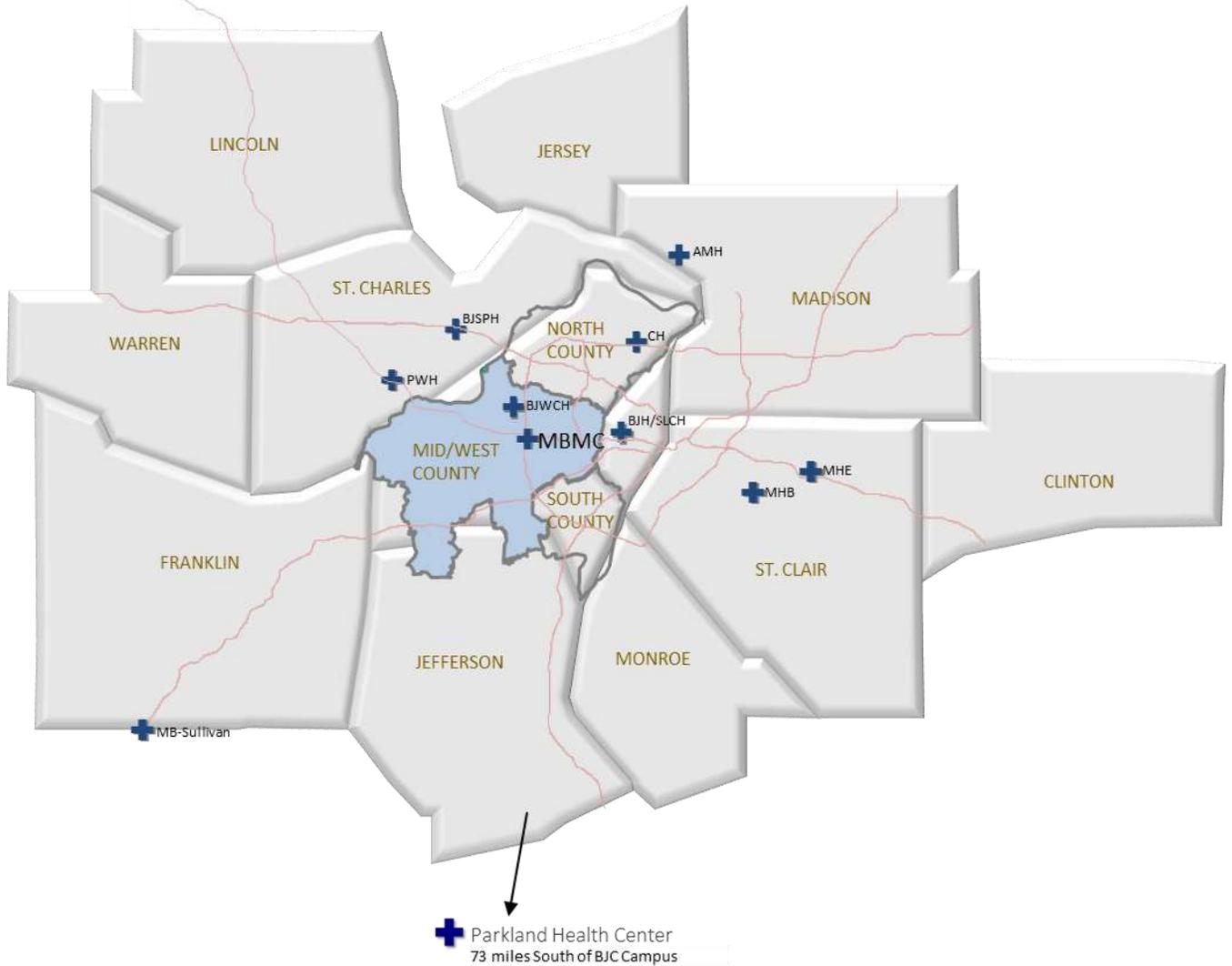
For the purpose of this report, MBMC defined its community as St. Louis County and further identified West County, Mid County and South County as specific focus areas. Most of the available data to complete the CHNA compared St. Louis County and Missouri. Whenever possible, data analysis was included on the sub-counties of St. Louis County: Mid County, North County, West County and South County.



MBMC's community is defined by its Primary Service Area in Mid/West and South St. Louis County in the map below.

### MBMC's Primary Service Area:

Mid/West St. Louis County MO (shaded in blue below)



## POPULATION

Population data are necessary to understand the health of the community and plan for future needs. In 2022 in St. Louis County, 35 percent of the population resided in North County; 18 percent in South County; 29 percent in West County; and 18 percent in Mid County. Mid County is made up of the central and eastern portion of St. Louis County.

West County is expected to have a 1 percent increase in its population from 2022 to 2027, and Mid County and South County are forecasted to remain flat. North County is estimated to have a 1 percent decline in population.

## INCOME

In West County, the median household income in 2020 was \$110,275 and projected to increase to \$121,947 by 2027. In South County, the median household income in 2020 was \$79,630 and projected to increase to \$88,612 by 2027. In North County, the median household income in 2020 was \$56,732 and estimated to increase to \$62,116 by 2027.

In West County, 13 percent of families with children were from single-parent households compared to 12 percent in South County; 10 percent in Mid County; and 29 percent in North County. Adults and children in single-parent households are at a higher risk for adverse health effects, such as emotional and behavioral problems, compared to their peers. Children in such households are more likely to develop depression, smoke and abuse alcohol and other substances. Consequently, these children experience increased risk of morbidity and mortality of all causes. Similarly, single parents suffer from lower perceived health and higher risk of mortality.

## EDUCATION

Individuals who do not finish high school are more likely than people who finish high school to lack the basic skills required to function in an increasingly complicated job market and society. Adults with limited education levels are more likely to be unemployed, on government assistance or involved in crime. The Healthy People 2030 national health target is to increase the proportion of students who graduate high school within four years of their first enrollment in ninth grade to 90.7 percent. In West County, 98 percent of the population age 25 and over had a high school diploma or higher education attainment compared to 96 percent South County; 97 percent in Mid County; and 92 percent in North County.

For many, having a bachelor's degree is the key to a better life. The college experience develops cognitive skills, and allows learning about a wide range of subjects, people, cultures and communities. Having a degree also opens career opportunities in a variety of fields and is often the prerequisite to a higher-paying job. It is estimated that college graduates earn about \$1 million more per lifetime than their non-graduate peers. In West County, 59 percent of the population age 25 and older had a bachelor's degree or higher compared to 39 percent in South County; 67 percent in Mid County; and 24 percent in North County.

TABLE 1: DEMOGRAPHIC OF MID, NORTH, SOUTH AND WEST ST. LOUIS COUNTY

	MID COUNTY		NORTH COUNTY		SOUTH COUNTY		WEST COUNTY		
	2022	2027	2022	2027	2022	2027	2022	2027	
<b>PERCENT POPULATION BY RACE /ETHNICITY</b>									
White	76.2	75.3	35.1	32.3	91.1	90.0	83.3	81.3	
African American	13.9	13.7	58.1	60.2	2.8	3.2	4.7	5.2	
Asian	6.0	6.7	20	22	3.3	3.7	8.5	9.5	
Two or More Races	2.8	3.1	29	13	2.0	2.2	2.5	2.8	
Other	0.9	0.9	16	18	0.6	0.7	0.9	0.9	
American Indian/AL Native	0.2	0.2	0.2	0.3	0.2	0.2	0.2	0.2	
Native Hawaiian/Pacific Islander	<0.1	<0.1	<0.1	<0.1	<0.1	<0.1	<0.11	<0.1	
<b>TOTAL POPULATION</b>	<b>187,398</b>	<b>186,834</b>	<b>360,730</b>	<b>358,125</b>	<b>182,757</b>	<b>182,859</b>	<b>292,050</b>	<b>295,284</b>	
<b>PERCENT MALE POPULATION BY AGE</b>									
<18	22.3	21.8	25.9	25.3	20.9	20.6	22	21.3	
18-44	35.9	35.6	36.1	35.7	33.1	32.3	32.4	33.1	
45-64	24.1	23.0	23.2	22.2	25.7	24.2	26.7	24.2	
65-Up	17.8	19.6	14.8	16.9	20.4	22.9	18.8	21.5	
<b>MALE TOTAL</b>	<b>89,179</b>	<b>89,049</b>	<b>168,579</b>	<b>167,944</b>	<b>87,796</b>	<b>87,954</b>	<b>140,631</b>	<b>142,142</b>	
<b>PERCENT FEMALE POPULATION BY AGE</b>									
<18	19.3	19.1	21.9	21.4	18.2	18.2	19.7	19.0	
18-44	33.4	32.6	34.4	33.1	31.2	31.3	30.7	30.9	
45-64	24.8	23.9	25.1	24.7	25.4	24.1	27.4	25.3	
65-Up	22.5	24.4	18.6	20.8	25.2	27.4	22.2	24.9	
<b>FEMALE TOTAL</b>	<b>98,219</b>	<b>97,785</b>	<b>192,151</b>	<b>190,181</b>	<b>94,961</b>	<b>94,905</b>	<b>151,419</b>	<b>153,142</b>	

Source: Explore Mo Health

## AGE

The age structure of a community is an important determinant of its health and the health services it will need. The distribution of the population across age groups was similar in North County, South County, West County and Mid County.

From 2022 to 2027, the 65 and up age group (male and female) is projected to increase by 14.4 percent in West County; 10.3 percent in South County; 11.9 percent in North County; and 9.3 percent in Mid County.

From 2022 to 2027, the <18 age group is expected to decrease by 2.3 percent in West County; 0.7 percent in South County; 3.0 percent in North County; and 1.4 percent in Mid County.

## RACE AND ETHNICITY

In North County, 58 percent identified as African American compared to 28 percent of residents in South County; 4.7 percent in West County; and 13.9 percent in Mid County.

Additional demographic data on St. Louis County is available in Appendix C.

## Previous CHNA Measurement and Outcomes Results

At the completion of the 2019 CHNA, MBMC identified Heart Health / Stroke and Diabetes as the top priority health needs where focus was most needed to improve the health of the community served by the hospital. The following table details goals and objectives to address these community health needs. Due to COVID-19, MBMC decided to suspend implementation strategies for these health needs for the safety and health of the community and staff.

TABLE 2: MISSOURI BAPTIST MEDICAL CENTER 2019 CHNA OUTCOMES	
HEART AND VASCULAR: HEART HEALTH AND STROKE	DIABETES
GOAL	GOAL
Improve cardiovascular health and quality of life through prevention, detection, and access to treatment of risk factors for heart attack and stroke	Reduce the disease burden of Diabetes Mellitus (DM) and improve the quality of life for all persons who have, or are at risk for DM.
OBJECTIVES	OBJECTIVE
<p>a) Screen 1,000 adults each year for modifiable risk factors listed above including blood pressure and cholesterol at Missouri Baptist Medical Center, Dierbergs Markets and/or other grocery stores and community centers in the South and West County area</p> <p>b) Provide 12 months of additional follow-up with 40 percent of clients who opt-in and are identified as in the high-risk range for heart disease</p>	<p>a) To increase early detection of pre-diabetes and improve the quality of life for all persons who have, or are at risk for diabetes.</p> <p>b) To increase the proportion of persons with diagnosed diabetes who receive formal diabetes education</p> <p>c) To increase the proportion of persons with diabetes whose condition has been diagnosed</p>
CURRENT STATUS	CURRENT STATUS
Due to COVID-19, the implementation plan was put on hold from 2020.	Due to COVID-19, the implementation plan was put on hold from 2020.

## Conducting the 2022 CHNA

### Primary Data Collection: Focus Group

Due to COVID-19, BJC HealthCare, along with collaborative partners SSM Health; Mercy Hospital St. Louis and Mercy Hospital South; and the St. Luke's network of care, which includes St. Luke's Hospital and St. Luke's Des Peres Hospital, conducted online surveys for the safety of our employees and of our community stakeholders who represent the broad interests of the community served by each hospital and those with special knowledge or expertise in public health. In the past, community stakeholder health needs assessments were conducted in person via a moderated discussion. (See Appendix D for the Stakeholder Assessment Report and Appendix E for the list of Participating Community Stakeholders)

#### Summary: Stakeholder Key Findings

Mental health is of greatest concern in West/South St. Louis County. Vaping and drug abuse were rated next in importance.

Stakeholders see the greatest potential to work together is around the issues of mental health and immunizations/ infectious diseases. Stakeholders ranked mental health at the highest level of concern and ability to collaborate. Immunizations and infectious disease and drug abuse ranked slightly lower in concern, but higher in potential for collaboration. Stakeholders most commonly identified new issues of concern related to mental health; however, they also mentioned substance abuse and affordable housing. The largest resource gaps in West/South St. Louis County were noted in the area of mental health.

Stakeholders identified several barriers as being of significant impact to accessing services in West/South St. Louis County, including scheduling services, inability to afford co-pays/insurance coverage, and lack of substance abuse /mental health services nearby.

Most stakeholders identified low-income populations as being at greatest risk for poor health outcomes in West/South St. Louis County. Over half of the stakeholders identify older adults 65+ and those suffering from substance abuse as also being at great risk.

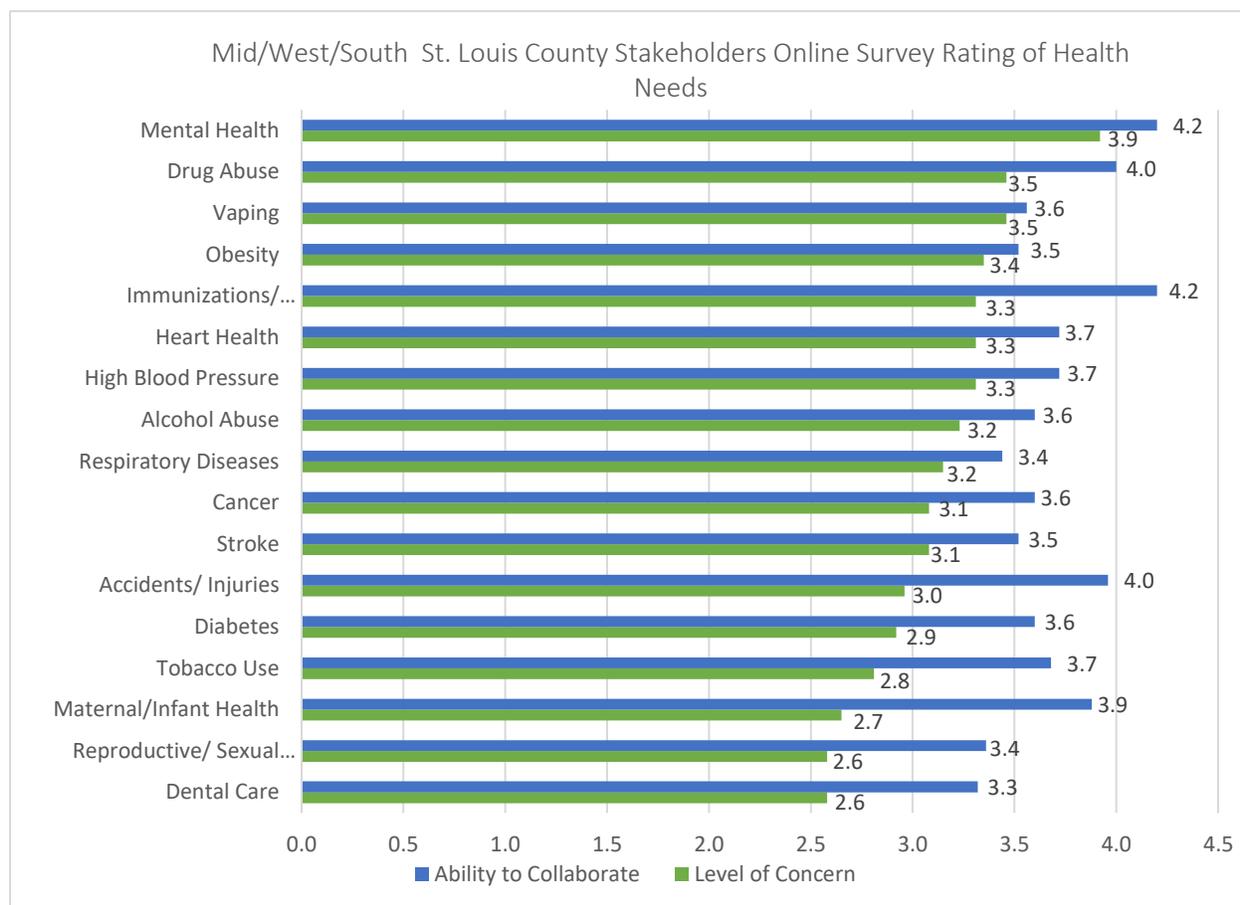
A majority of stakeholders identified exposure to drug use/abuse as the social factor having the greatest impact on the health of those living in West/South St. Louis County.

Symptoms of anxiety and depression and increasing feelings of loneliness/social isolation were noted as the greatest impact of COVID-19 on West/South St. Louis County residents.

Many ZIP codes were identified as being at risk in West/South St. Louis County. The most frequently mentioned was 63125 (Lemay/Mehlville) in South County.

## RATING OF NEEDS

Community stakeholders were given the list of community health needs compiled by survey partners using results from the previous CHNA. Stakeholders were directed to rank these needs on a scale of 1 (low) to 5 (high), based on their perceived level of community concern and the ability of community organizations to collaborate in addressing.



Mental Health and Drug Abuse were rated the highest in terms of level of concern and Mental Health and Immunization/Infectious Diseases were rated the highest for ability to collaborate.

## Secondary Data Summary

Based on the needs reviewed by community stakeholders (see graph on previous page), key areas were identified for a secondary data analysis. These represent the areas of greatest concern identified by the stakeholders.

The majority of the analysis was completed comparing St. Louis County and Missouri. While demographic data was available for Mid County and West County, health data was combined for these two sub counties of St. Louis County as Mid/West County.

In order to provide a comprehensive overview (analysis of disparity and trend) the most up-to-date secondary data from Conduent Healthy Communities Institute (HCI) was included for the needs listed below.

Conduent Healthy Communities Institute (HCI), an online dashboard of health indicators for St. Louis County, offers the ability to evaluate and track the information against state and national data and Healthy People 2020 and 2030 goals. Sources of data include the National Cancer Institute, Environmental Protection Agency, U.S. Census Bureau, U.S. Department of Education, and other national, state, and regional sources.

Other data sources included:

Missouri Department of Mental Health provides numerous comprehensive reports and statistics on mental health diseases, alcohol and drug abuse.

Missouri Information for Community Assessment (MICA) is an online system that helps to prioritize diseases using publicly available data. The system also provides for the subjective input of experts to rank their perceived seriousness of each issue.

Explore MO Health is a tool that allows users to explore hyperlocal health data to better understand the factors that can influence health outcomes.

### Community Health Needs

- Asthma
- Cancer
- Diabetes
- Heart Health/Stroke
- Maternal/Infant Health
- Mental Health
- Obesity
- Sexually Transmitted Infections
- Substance Abuse

While MBMC identified one need as its primary focus, the following needs will continue to be appropriately addressed by the hospital and other organizations in St. Louis County.

## ASTHMA

Asthma is a chronic lung disease characterized by periods of wheezing, chest tightness, shortness of breath and coughing. Symptoms often occur or worsen at night or in the early morning. These occurrences, often referred to as “asthma attacks,” are the result of inflammation and narrowing of the airways due to a variety of factors or “triggers.”

For the three-year period ending 2019, the number of Asthma cases per 1,000 population were: Mid/West County (36.57); South County (35.35); and North County (107.94), which was nearly triple the rate.

For the three-year period ending in 2019, the number of Respiratory Disease cases were: Mid/West County (70.53); South County (86.9); and North County (174.14), which was approximately 2.5 times the rate in Mid/West County and double the rate in South County.

Asthma death rates (2009-2019), hospitalization (2011-2015) and emergency room visits (2011-2015) were significantly higher among African Americans when compared to Whites in St. Louis County. While the magnitude of the racial disparity in terms of rate in St. Louis County is roughly consistent with state levels, hospitalization rates are 4.4 percent higher and emergency room visits rates are 10.4 percent higher for the African American population in St. Louis County compared to the state.

For the three-year period ending in 2019, the number of Chronic Obstructive Pulmonary Disease cases per 1,000 population were: Mid/West County (33.96); South County (51.55); and North County (66.2). The North County rate was 95 percent higher than the rate in Mid/West County and 28 percent higher than the rate in South County.

## CANCER

Cancer is a leading cause of death in the U.S., with more than 100 different types of the disease. According to the National Cancer Institute, lung, colon and rectal, breast, pancreatic and prostate cancer lead in the greatest number of annual deaths.

For the three-year period ending 2019, the rate of cancer cases was highest in South County (184.8) followed by Mid/West County (181.3) and North County (157.5).

When comparing the All-Cancer incident rate per 100,000 population by race in St. Louis County, African Americans had the highest rate of 481 followed by Whites at 476. These rates are 2.4 percent higher for African Americans and 4.7 percent higher for Whites in the state as a whole. Both Asian/Pacific Islander and Hispanics in St. Louis County had lower rates than the state for their racial groups.

St. Louis County had a higher age-adjusted All-Cancer incidence rate (cases per 100,000 population) when compared to Missouri. For the five-year period ending 2019, St. Louis County's rate of 471.2 was 4.2 percent higher than the state rate of 452.3.

St. Louis County had a lower age-adjusted All-Cancer death rate (deaths per 100,000 population) when compared to the state rate. For the five-year period ending in 2019, St. Louis County's rate of 154.7 was 7.0 percent lower than the state rate of 166.3.

When comparing the All-Cancer death rate per 100,000 population by race in St. Louis County, African Americans had the highest rate of 201.0 followed by Whites at 146.3. Hispanics had the lowest rate of 73.6. African Americans and Asian/Pacific Islander racial groups both had a higher rate in St. Louis County compared to the rate in the state.

## **DIABETES**

Diabetes is a leading cause of death in the U.S. This disease can have harmful effects on most of the organ systems in the human body. It is a frequent cause of end-stage renal disease, non-traumatic lower-extremity amputation, and a leading cause of blindness among working-age adults. Persons with diabetes are also at increased risk for coronary heart disease, neuropathy and stroke. Diabetes disproportionately affects minority populations and the elderly, and its incidence is likely to increase as minority populations grow and the U.S. population becomes older.

For the three-year period ending 2019, the North County region of St. Louis County had the highest rate of Diagnosed Diabetes Cases at 201.25 per 1,000 population which was 93 percent higher than the rate in Mid/West County and 55 percent higher than the rate in South County.

St. Louis County continued to have a lower age-adjusted death rate due to Diabetes (deaths per 100,000 population) when compared to the state rate.

For the five-year period ending 2019, St. Louis County's rate of 16.1 was 21.4 percent lower than the state rate of 20.5.

For the five-year period ending 2019, Whites in St. Louis County had a 35.9 percent lower age-adjusted death rate due to Diabetes when compared to Whites in the state. The African American rate was about the same in St. Louis County compared to the state (33.1 v 33.2).

The rate for adults 20 years and older in St. Louis County has remained relatively flat at 8.9 percent from 2017 to 2019.

## **HEART HEALTH & STROKE**

Heart disease and stroke are among the most preventable diseases in the U.S. yet are the most widespread and costly health conditions facing the nation today. Heart disease and stroke are the first and third leading causes of death for both women and men.

Cerebrovascular disease is a leading cause of death in the United States, and although it is more common in older adults, it can occur at any age. The most important modifiable risk factor for cerebrovascular disease and stroke is high blood pressure. Other risk factors include high cholesterol, heart disease, diabetes mellitus, physical inactivity, obesity, excessive alcohol use and tobacco use.

For the three-year period ending 2019, the South County region of St. Louis County had the highest number of diagnosed Heart Diseases cases per 1,000 population at 201.2, which was 29 percent higher than the rate in Mid/West County (155.5) and 3.5 percent higher than the rate in North County (194.3).

For the three-year period ending 2019, the North County region of St. Louis County had the highest number of diagnosed Ischemic Stroke cases per 1,000 population at 8.8, which was 27 percent higher than the rate in Mid/West County (6.9) and 33 percent higher than the rate in South County (6.6).

For the four-year period ending in 2019, St. Louis County's age-adjusted death rate (per 100,000 population) due to Cerebrovascular Disease (stroke) was 6 percent higher when compared to the state rate. The higher rate was driven by African Americans, who had a 10.2 percent higher rate than African Americans in the state. Whites had a 2.9 percent lower rate in the county compared to the state. Another factor contributing to St. Louis County's higher rate was gender, where males had a rate 13 percent higher than males in the state.

For the four-year period ending in 2019, St. Louis County's age-adjusted death rate (per 100,000 population) due to Heart Disease was 7.9 percent lower when compared to the state rate. However, when comparing by race, African Americans in St. Louis County had a 4.6 percent higher rate compared to African Americans in the state.

For the five-year period ending 2019 compared to the period ending in 2015, the age-adjusted death rate due to Heart Disease for St Louis County remained flat at 175.9 deaths per 100,000 population while the state rate declined 2 percent to 190.9 for the same time period.

For the three-year period ending in 2019, the North County region of St. Louis County had the highest number of Hypertension cases per 1,000 population at 351.54, which was 52.4 percent higher than the rate in Mid/West County (230.69) and 28 percent higher than the rate in South County (274.31).

## **MATERNAL AND INFANT HEALTH**

Infant mortality rate continues to be one of the most widely used indicators of the overall health status of a community. The leading causes of death among infants are birth defects, preterm delivery, low birth weight, Sudden Infant Death Syndrome (SIDS), and maternal complications during pregnancy. This is a Healthy People 2030 Leading Health Indicator. The Healthy People 2030 national health target is to reduce the rate of infant deaths to 5.0 deaths per 1,000 live births.

Babies born premature are likely to require specialized medical care, and oftentimes must stay in intensive care nurseries. While there have been many medical advances enabling premature infants to survive, there is still risk of infant death or long-term disability. The most important things an expectant mother can do to prevent prematurity and low birth weight are to take prenatal vitamins, stop smoking, stop drinking alcohol and using drugs, and get prenatal care. The Healthy People 2030 national health target is to reduce the proportion of infants who are born preterm to 9.4 percent.

While the infant mortality rate in St. Louis County has steadily declined from 2015-2019, it's rate was slightly higher than the rate in Missouri (6.6 percent vs. 6.4 percent).

For the three-year period ending in 2019 in St. Louis County, the rate of mothers who received early prenatal care was slightly higher than the rate in the state (74.7 percent vs. 72.5 percent). When comparing the rates by race, every racial group in the county had a higher rate compared to the state rate except for American Indian/Alaska Native. In St. Louis County, White mothers had the highest rate at 82.3 percent, while American Indian/Alaska Natives had the lowest at 58.3 percent.

For 2019, African American mothers had the highest preterm birth rate at 16.3 percent compared to White and Hispanic mothers at 10 percent.

### **MENTAL/BEHAVIORAL HEALTH: MENTAL HEALTH**

Individuals struggling with serious mental illness are at higher risk for homicide, suicide, and accidents as well as chronic conditions including cardiovascular and respiratory diseases and substance use disorders. In state fiscal year 2020, 6,965 St. Louis County residents received treatment for serious mental illness at publicly-funded facilities. In St. Louis County, 12.7 percent of adults aged 18 years and older did not have good mental health for 14 days or more. While there are data on those who receive treatment, data on mental health in the general population is very limited. This is especially true at the local level.

For the three-year period ending 2019, the North County region of St. Louis County had the highest rate of diagnosed Mental Health disorder cases per 1,000 population at 45.45, which was 62.1 percent higher than the rate in Mid/West County (28.03) and 52.9 percent higher than the rate in South County (29.73).

### **MENTAL / BEHAVIORAL HEALTH: SUBSTANCE USE**

The availability of county-level data on substance use is limited. The National Survey on Drug Use and Health (NSDUH) and the Centers for Disease Control and Prevention's (CDC) PLACES are two data sources used to report data for adults at regional and county levels. In St. Louis County, the prevalence of binge drinking among adults 18 years and older is 17.8 percent. The

prevalence of current smoking among the same age group is 15.4 percent. Alcohol is the most commonly used substance in Missouri adults. In the Eastern region, approximately 59.5 percent of adults currently drink alcohol, and 27.9 percent have had 5 or more drinks of alcohol on a single occasion in the past 30 days. Cigarette use is of concern across the state. In the Eastern region, 19.3 percent of adults currently use cigarettes compared to 22.6 percent statewide.

Marijuana use in Missouri continues to be of interest, particularly with recent shifts in legality of adult use across the nation and medical marijuana sales in the state since October 2020. In the Eastern region, approximately 9.1 percent of adults currently used marijuana in the past 30 days.

Prescription drug misuse is of growing concern both across the nation and in Missouri, where 3.8 percent of adults in the Eastern region reported misuse of prescription pain medication over the past year. (Behavioral Health Profile of St. Louis County 2016-2018)

For the three-year period ending 2019 Mid/West County had the lowest rate (number of cases per 1,000 population) of opioid use at 15.56 compared to South County at 19.84 and North County at 37.17.

For the three-year period ending 2019 Mid/West County had the lowest rate (number of cases per 1,000 population) of tobacco use at 145.62 compared to South County at 191.25 and North County at 319.09.

For the three-year period ending 2019 Mid/West County had the lowest rate (number of cases per 1,000 population) of alcohol use at 3.83 compared to South County at 4.49 and North County at 6.79.

## **OBESITY**

The percentage of obese adults is an indicator of the overall health and lifestyle of a community. Obesity increases the risk of many diseases and health conditions including heart disease, type 2 diabetes, cancer, hypertension, stroke, liver and gallbladder disease, respiratory problems, and osteoarthritis.

For the three-year period ending 2019, the number of Obesity cases per 1,000 population were: Mid/West County (46.2); South County (60.6); and North County (105.94).

## **SEXUALLY TRANSMITTED INFECTIONS**

Chlamydia, one of the most frequently reported bacterial sexually transmitted infections (STIs) in the United States, is caused by the bacterium, *Chlamydia trachomatis*. Although symptoms of chlamydia are usually mild or absent, serious complications that cause irreversible damage, including infertility, can occur "silently" before a woman ever recognizes a problem. Under-reporting of chlamydia is substantial because most people with chlamydia are not aware of their infections and do not seek testing. The Centers for Disease Control and Prevention recommends that all sexually active women ages 25 or younger be tested annually for chlamydia. Females ages 15 to 19 consistently have the highest rate of chlamydia compared with any other age or sex group according to the Centers for Disease Control and Prevention. This group may be particularly susceptible because the cervix is not yet fully developed. Increased screening in this group, however, may partially contribute to increased rates of reported chlamydia.

For the three-year period ending 2019, the number of sexually transmitted infectious cases per 1,000 population were: Mid/West County (10.92); South County (13.6); and North County (26.51).

For the five-year period ending 2014 in St. Louis County, African Americans had the highest chlamydia rate among females ages 15-19 at 10,205 cases per 100,000 population. This was over six times higher than the rate among Whites at 1,648.

## **WORK GROUP PRIORITIZATION MEETINGS**

MBMC selected 17 employees to participate on an internal CHNA work group from various hospital departments. (See Appendix F)

To prepare for the work group meeting, members were sent the list of the needs identified by the stakeholders. (Table 3)

TABLE 3: ST. LOUIS COUNTY COMMUNITY HEALTH NEEDS RANKED BY STAKEHOLDERS

Accidents/Injuries	Heart Health	Reproductive/Sexual Health
Alcohol Abuse	High Blood Pressure	Respiratory Diseases
Cancer	Immunization/Infectious Diseases	Stroke
Dental Care	Maternal/Infant Health	Tobacco Use
Diabetes	Mental Health	Vaping
Drug Abuse	Obesity	

Additionally, the work group was instructed to rank the seriousness and feasibility of addressing these health needs online using a Likert scale of 1-5. A Likert scale is a psychometric scale commonly used in research that employs questionnaires. The scores were then averaged for seriousness and feasibility and ranked.

The work group met on May 16, 2022, to review the purpose for the CHNA, role of the work group and goals for the project. The group reviewed the key findings from the 2019 report and noted that the hospital is trying to conduct some screenings later in 2022 to fulfill needs identified in 2019 and put on hold due to COVID-19. The 2021 stakeholder group perceptions were then discussed:

- Mental Health, Vaping and Drug Abuse were significant areas of need.
- Mental Health provides the biggest opportunity for collaboration.
- Remaining results from the stakeholder’s report aligned with the work group.

Next, the work group discussed the results of the ranking. Table 4 shows the results of this ranking.

TABLE 4: MISSOURI BAPTIST MEDICAL CENTER INTERNAL WORK GROUP PRELIMINARY HEALTH NEEDS RANKING BY SERIOUSNESS AND FEASIBILITY

	HEALTH NEEDS	SERIOUSNESS: AVERAGE	RANK	HEALTH NEEDS	FEASIBILITY AVERAGE
1	Mental Health	4.69	1	Heart Health	4.31
2	Diabetes	4.38	1	High Blood Pressure	4.31
2	High Blood Pressure	4.38	3	Maternal / Infant Health	4.15
2	Stroke	4.38	3	Stroke	4.15
5	Heart Health	4.31	5	Diabetes	4.08
6	Drug Abuse	4.23	6	Immunizations / Infectious Diseases (COVID-19, Influenza, Pneumonia)	4.00
7	Cancer	4.15	7	Cancer	3.92
8	Obesity	4.08	8	Obesity	3.69
9	Immunizations / Infectious Diseases (COVID-19, Influenza, Pneumonia)	3.69	8	Respiratory Diseases (Allergies, Asthma, COPD)	3.69
10	Alcohol Abuse	3.62	10	Mental Health	3.62
10	Maternal / Infant Health	3.62	11	Reproductive / Sexual Health (Including Sexually Transmitted Infections)	3.31
12	Respiratory Diseases (Allergies, Asthma, COPD)	3.38	12	Alcohol Abuse	3.15
13	Vaping	3.31	12	Dental Care	3.15
14	Tobacco Use	3.15	14	Tobacco Use	2.92
15	Accidents / Injuries	2.77	15	Drug Abuse	2.85
15	Dental Care	2.77	16	Vaping	2.77
17	Reproductive / Sexual Health (Including Sexually Transmitted Infections)	2.69	17	Accidents / Injuries	2.69

The members reviewed both the seriousness and feasibility of addressing needs. The following points summarize the discussion of the work group members.

- Obesity is a health issue that impacts all the top health needs.
- While Mental Health ranked as a top need in terms of seriousness for the workgroup and the stakeholders, the hospital does not possess the resources to impact this need.
- The work group members were not surprised by the needs on this list.

After thorough review of the rankings in Table 4, the team decided to guide their discussion using the top 10 needs ranked based on feasibility (Table 5).

TABLE 5: MISSOURI BAPTIST MEDICAL CENTER INTERNAL WORK GROUP PRELIMINARY HEALTH RANKING BY FEASIBILITY: TOP TEN HEALTH NEEDS RANKING

RANK BY FEASIBILITY	HEALTH NEEDS	FEASIBILITY AVERAGE	RANKING BY SERIOUSNESS	SERIOUSNESS AVERAGE
1	Heart Health	4.31	5	4.31
2	High Blood Pressure	4.31	2	4.38
2	Maternal / Infant Health	4.15	10	3.62
3	Stroke	4.15	2	4.38
5	Diabetes	4.08	2	4.38
6	Immunizations / Infectious Diseases (COVID-19, Influenza, Pneumonia)	4.00	9	3.69
7	Cancer	3.92	7	4.15
8	Obesity	3.69	8	4.08
9	Respiratory Diseases (Allergies, Asthma, COPD)	3.69	12	3.38
10	Mental Health	3.62	1	4.69

The team discussion centered around the top 10 needs based on current and future resources. This helped the team to narrow the list to six health needs (Table 6).

TABLE 6: THE TOP SIX COMMUNITY HEALTH NEEDS SELECTED BY MISSOURI BAPTIST MEDICAL CENTER INTERNAL TEAM

Cancer
Diabetes
Heart Health
Mental Health
Obesity
Stroke

Following further discussion of these results, the work group agreed upon needs for priority ranking. The team made its decision considering available resources.

The work group used a ranking process to assign weight to criteria by using the established criteria for priority setting above. Criteria of overriding importance were weighted as “3,” important criteria were weighted as “2,” and criteria worthy of consideration, but not a major factor, were weighted as “1.” Health needs were then assigned a rating ranging from one (low

need) to five (high need) for each criteria. The total score for each need was calculated by multiplying weights by rating.” This process was done individually. (Table 7)

TABLE 7: CRITERIA FOR PRIORITY SETTING			
	RATING	WEIGHT	SCORE
How many people are affected by the problem?			
What are the consequences of not addressing this problem?			
Are existing programs addressing this issue?			
How important is this problem to community members?			
How does this problem affect vulnerable populations?			
TOTAL SCORE			

Table 8 shows the results of the priority ranking by the work group. Discussion points included:

- The work group discussed and agreed to remove Immunizations, Respiratory Diseases and Mental Health.
- Mental Health was more fully discussed and recognized by the work group as a critical problem. It was noted that while the hospital should not focus on Mental Health due to a lack of resources, the hospital does have a role in being present in the community to help address the issue of Mental Health. Work group members acknowledged that the mental health of patients and the community can be impacted by educating hospital staff on ways to identify mental health issues in patients and connect these patients with existing community resources. Group members also discussed the start of the hospital’s Behavioral Health program, so it may be too early to focus on this need at this time.
- The group also talked about the importance of stroke education in the community since international research suggests a 25 to 35 percent increased risk of stroke since COVID-19.
- A profound discussion focused on the 2019 CHNA. While Heart Health/Stroke and Diabetes were chosen as focus areas for the 2019 CHNA, the team discussed that because the Community Education department was dissolved, no resources were available to address these needs. Further, unless additional resources are provided by the hospital’s leadership, these needs cannot be addressed at this time.

TABLE 8: MISSOURI BAPTIST MEDICAL CENTER INTERNAL WORK GROUP TOP SIX HEALTH NEEDS GROUP RANKING

RANK	HIGHEST-LOWEST	TOTAL SCORE
1	Diabetes	75
2	Stroke	72
3	Mental Health	72
4	Obesity	69
5	Heart Health	66
6	Cancer	49

Table 9 highlights the needs ranked by the St. Louis County stakeholders and the MBMC work group. Similarities observed in the top needs include Drug Abuse and Mental Health.

TABLE 9: SECONDARY DATA BY CONDUENT HEALTHY COMMUNITIES INSTITUTE VS. ST. LOUIS COUNTY STAKEHOLDERS RANKING OF HEALTH NEEDS

RANKING	CONDUENT HEALTHY COMMUNITIES INSTITUTE SECONDARY DATA HIGHEST TO LOWEST RATING	STAKEHOLDERS RANKING OF HEALTH NEEDS HIGHEST TO LOWEST
1	Alcohol & Drug Use	Mental Health
2	Maternal, Fetal & Infant Health	Drug Abuse
3	Mental Health & Mental Disorders	Vaping
4	Heart Disease & Stroke	Obesity
5	Environmental Health	Immunizations/ Infectious Diseases
6	Physical Activity	Heart Health
7	Women's Health	High Blood Pressure
8	Cancer	Alcohol Abuse
9	Children's Health	Respiratory Diseases
10	Diabetes	Cancer
11	Economy	Stroke
12	Wellness & Lifestyle	Accidents/ Injuries
13	Health Care Access & Quality	Diabetes
14	Immunizations & Infectious Diseases	Tobacco Use
15	Respiratory Diseases	Maternal/Infant Health
16	Oral Health	Reproductive/ Sexual Health
17	Education	Dental Care

The work group also reviewed results of the secondary data using the Healthy Communities Institute (HCI) Data Scoring Tool, which compares data from similar communities in the nation. The tool provides a systematic ranking of indicators for the county and helps prioritize the needs. The scoring is based on how a county compared to other similar counties within the state, the U.S. and Healthy People 2030 targets, depending on data availability. The team reviewed the scores by indicators.

Table 10 shows:

- primary data from the stakeholder ranking
- needs identified by the internal work group ranking
- results of HCI scoring tools

TABLE 10: TOP SIX SECONDARY DATA VS. COMMUNITY STAKEHOLDERS RANKING VS. MISSOURI BAPTIST MEDICAL CENTER INTERNAL WORK GROUP RANKING

RANKING	CONDUENT HEALTHY COMMUNITIES INSTITUTE SECONDARY DATA HIGHEST TO LOWEST RATING	STAKEHOLDERS RANKING OF HEALTH NEEDS HIGHEST TO LOWEST	MISSOURI BAPTIST MEDICAL CENTER INTERNAL WORK GROUP RANKING OF COMMUNITY HEALTH NEEDS
1	Alcohol & Drug Use	Mental Health	Diabetes
2	Maternal, Fetal & Infant Health	Drug Abuse	Stroke
3	Mental Health & Mental Disorders	Vaping	Mental Health
4	Heart Disease & Stroke	Obesity	Obesity
5	Environmental Health	Immunizations/ Infectious Diseases	Heart Health
6	Physical Activity	Heart Health	Cancer

- Mental Health was ranked in the top tier of needs by all three groups.
- Drug Abuse was ranked first by Conduent and second by the stakeholders.
- Diabetes, Cancer and Obesity were only ranked by the work group.
- Stroke was ranked fourth by Conduent and second by the work group.
- Heart Health was ranked by all three groups: fourth by Conduent; sixth by stakeholders and fifth by work group.

## SUMMARY

Following the priority ranking, work group members agreed to combine the needs of Diabetes and Obesity as these two areas ultimately impact Heart Health and Stroke. The work group will request the allocation of additional resources to meet the needs of this effort. A new program was suggested that would allow follow-up with diabetic patients following discharge. The group decided that Cancer should be the hospital’s area of focus if resources are unavailable. The Cancer IQ program, an initiative where resources are already available, was suggested as a second choice.

Other discussion included limited or no current resources available to focus on Heart Health, Stroke or Nutrition. Additionally, the work group agreed that the hospital has no resources available for Mental Health and acknowledged that it often serves in a reactive role.

At the conclusion of the comprehensive assessment process to determine the most critical needs in west and south St. Louis County, the work group concluded that it will present the following two proposals to the Executive Team for the hospital’s implementation plan:

- Primary Choice - Combine Diabetes & Obesity, if Executive Team commits resources
- Secondary Choice – Cancer

After thorough discussion with the Executive Team around resources, including the dissolution of the hospital's Community Education program, the Executive Team decided on Option 2 – Cancer and plans to expand an existing cancer program.

# Appendices

## Appendix A: ABOUT MISSOURI BAPTIST MEDICAL CENTER

MBMC is an acute care hospital in St. Louis County, offers a full continuum of medical and surgical services, including heart care, cancer care, and women's and infants' services. The hospital has a 24-hour adult emergency department and cares for pediatric patients at a separate emergency department in collaboration with St. Louis Children's Hospital.

In 2016, MBMC was named a Magnet<sup>®</sup> hospital by the American Nurses Credentialing Center (ANCC). The prestigious designation is the highest credential a healthcare organization can receive for nursing excellence and quality patient care. MBMC is the first hospital in St. Louis County to achieve this recognition, which has been accomplished by less than 7 percent of hospitals nationwide. Additionally, U.S. News & World Report ranked the hospital #2 in the St. Louis metro area.

MBMC continues to redesign and expand its services to better meet the community's needs, including recent renovations to its Childbirth Center, Breast HealthCare Center, Center for Outpatient Therapy and Wellness and Surgical Evaluation Center, which is part of a new Surgical Home program to improve the continuum of care for surgical patients. The hospital has implemented new services, including a lung cancer screening program and the opening of its Wound Healing Center. Missouri Baptist also offers outpatient services at Sunset Hills and Rock Hill facilities, providing women's health, cancer, imaging and other services closer to home.

The hospital's Rural Outreach Program has been providing communities throughout Missouri and southern Illinois with access to MBMC specialty physicians since 1993.

The campus includes state-of-the-art patient towers, a nature trail and an extension of the Goldfarb School of Nursing at Barnes-Jewish College to train students to handle healthcare situations from complex births to post-surgery and critical care.

In 2020, MBMC provided \$22,112,354.00 in financial assistance and programs serving 24,117 persons. This total includes:

- \$12,778,613.00 in financial assistance and means-tested programs serving 8,715 individuals
- 14,846 individuals on Medicaid at a total net benefit of \$5,272,690.00

MBMC also provided a total of \$4,061,051.00 to 24,117 persons in other community benefits including, community health improvement services, subsidized health services and in-kind donations. (See Appendix B for Community Benefit Expenses)

## Appendix B: 2020 COMMUNITY BENEFIT EXPENSES

MISSOURI BAPTIST MEDICAL CENTER: 2020 TOTAL NET COMMUNITY BENEFIT EXPENSES		
CATEGORY	PERSONS SERVED	TOTAL NET BENEFIT
FINANCIAL ASSISTANCE AND MEANS-TESTED PROGRAMS		
Financial Assistance at Cost	8,715	\$ 12,778,613.00
Medicaid	14,846	\$ 5,272,690.00
<b>TOTAL FINANCIAL ASSISTANCE AND MEANS-TESTED PROGRAMS</b>	<b>23,561</b>	<b>\$ 18,051,303.00</b>
OTHER COMMUNITY BENEFITS		
Community Health Improvement Services	10,317	\$ 1,050,921.00
Health Professional	4	\$ 236,427.00
Subsidized Health Services	13,796	\$ 2,682,213.00
In-Kind Donation		\$ 91,490.00
<b>TOTAL OTHER COMMUNITY BENEFITS</b>	<b>24,117</b>	<b>\$ 4,061,051.00</b>
<b>GRAND TOTAL</b>	<b>47,678</b>	<b>\$ 22,112,354.00</b>

## Appendix C: ST. LOUIS COUNTY DEMOGRAPHIC

DEMOGRAPHIC OF ST. LOUIS COUNTY VS. MISSOURI		
	ST. LOUIS COUNTY	MISSOURI
<b>GEOGRAPHY</b>		
Land area in square miles, 2010	507.80	68,741.52
Persons per square mile, 2010	1967.2	87.1
<b>POPULATION</b>		
Population, total 2019	994,205	6,137,428
Population, total 2010	998,883	5,988,923
Population, Percent Change - 2010 -2017	0.5	2.5
<b>AGE</b>		
Persons Under 5 Years, Percent, 2019	5.8	6.0
Persons Under 18 Years, Percent, 2019	22.0	22.3
Persons 65 Years and over, Percent, 2019	18.5	17.3
<b>GENDER</b>		
Female Person, Percent, 2019	52.5	50.9
Male Persons, Percent, 2019	47.5	49.1
<b>RACE / ETHNICITY</b>		
White, Percent, 2019	67.9	82.9
White Alone, not Hispanic or Latino, Percent, 2019	65.3	79.1
African American Alone, Percent, 2019	25.0	11.8
Asian Alone, Percent, 2019	4.7	2.2
Hispanic or Latino, Percent, 2019	3.0	4.4
Two or More Races, Percent, 2019	2.1	2.4
American Indian and Alaska Native alone, Percent, 2019	0.2	0.6
Native Hawaiian and Other Pacific Islander Alone, Percent, 2019	<1	0.2
<b>LANGUAGE</b>		
Foreign Born Persons, Percent, 2015-2019	7.4	4.2

Source: Conduent Healthy Communities Institute

ST. LOUIS COUNTY DEMOGRAPHIC INCLUDING EDUCATION / INCOME / HOUSING VS. MISSOURI		
	ST. LOUIS COUNTY	MISSOURI
<b>HOUSING</b>		
Housing Units, Total, 2019	442,301	2,819,383
Homeownership, Percent, 2015-2019	63.1	57.8
Median Housing Units Value, Dollars, 2015-2019	198,800	157,200
<b>FAMILY &amp; LIVING ARRANGEMENTS</b>		
Households, Total, 2015-2019	405,984	2,414,521
Average Household Size persons per households, (2015-2019)	2.4	2.5
Population Age 5+ with Language other than English Spoken at Home, Percent, 2015-2019	9.3	6.3
<b>EDUCATION</b>		
High School Graduate or Higher, Percent of Persons Age 25+, 2015-2019	93.5	89.9
Bachelor's Degree or Higher, Percent of Persons Age 25+, 2015-2019	43.6	29.2
<b>INCOME &amp; POVERTY</b>		
Median Household Income, Dollars, 2015-2019	67,420	55,461
Per Capita Income, Dollars, 2015-2019	41,426	30,810
People Living Below Poverty Level, Percent, 2015-2019	9.7	13.7

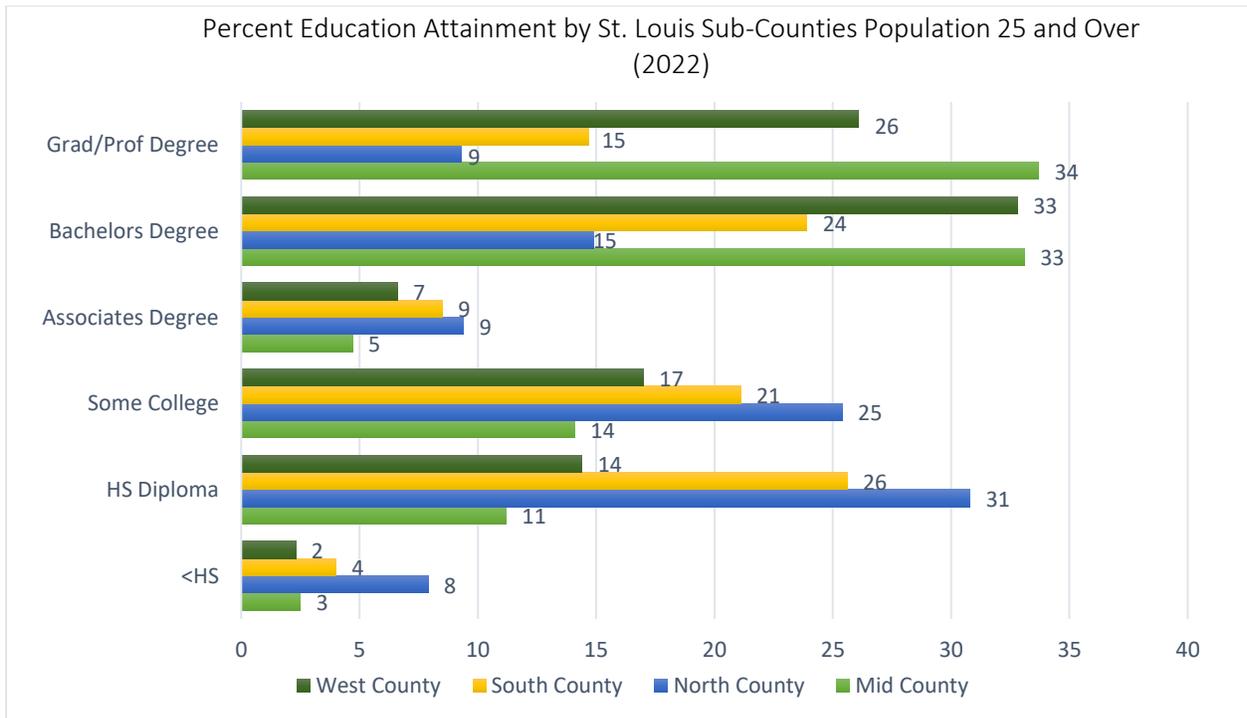
*Source: Conduent Healthy Communities Institute*

DEMOGRAPHIC OF SUB-COUNTIES OF ST. LOUIS COUNTY									
		MID COUNTY		NORTH COUNTY		SOUTH COUNTY		WEST COUNTY	
		2022	2027	2022	2027	2022	2027	2022	2027
POPULATION BY RACE /ETNICITY									
	White	142,867	140,709	126,726	115,635	166,518	164,499	243,194	240,213
	African American	26,039	25,574	209,412	215,541	5,112	5,854	13,675	15,255
	Asian	11,250	12,611	7,287	7,958	6,021	6,849	24,778	28,097
	Two or More Races	5,163	5,735	10,614	11,758	3,622	4,084	7,190	8,237
	Other	1,643	1,764	5,742	6,271	1,119	1,210	2,543	2,803
	American Indian/Ak Native	392	399	865	898	327	330	592	608
	Native Hawaiian/Pacific Islander	44	42	84	64	38	33	78	71
	<b>TOTAL POPULATION</b>	<b>187,398</b>	<b>186,834</b>	<b>360,730</b>	<b>358,125</b>	<b>182,757</b>	<b>182,859</b>	<b>292,050</b>	<b>295,284</b>
MALE POPULATION BY AGE									
	<18	19,843	19,421	43,630	42,484	18,317	18,147	30,941	30,222
	18-44	32,040	31,704	60,890	59,878	29,022	28,391	45,632	47,037
	45-64	21,462	20,441	39,080	37,212	22,588	21,281	37,586	34,359
	65-Up	15,834	17,483	24,979	28,370	17,869	20,135	26,472	30,524
	<b>MALE TOTAL</b>	<b>89,179</b>	<b>89,049</b>	<b>168,579</b>	<b>167,944</b>	<b>87,796</b>	<b>87,954</b>	<b>140,631</b>	<b>142,142</b>
FEMALE POPULATION BY AGE									
	<18	18,982	18,637	42,159	40,748	17,323	17,260	29,846	29,121
	18-44	32,851	31,921	66,044	62,874	29,641	28,796	46,469	47,265
	45-64	24,332	23,389	48,288	47,015	24,104	22,890	41,421	38,677
	65-Up	22,054	23,838	35,660	39,544	23,893	25,959	33,683	38,079
	<b>FEMALE TOTAL</b>	<b>98,219</b>	<b>97,785</b>	<b>192,151</b>	<b>190,181</b>	<b>94,961</b>	<b>94,905</b>	<b>151,419</b>	<b>153,142</b>

Source: Explore Mo Health

TOTAL HOUSEHOLDS & FAMILY STRUCTURE OF SUB-COUNTIES OF ST. LOUIS COUNTY									
		MID COUNTY		NORTH COUNTY		SOUTH COUNTY		WEST COUNTY	
YEAR		2022	2027	2022	2027	2022	2027	2022	2027
TOTAL HOUSEHOLDS		80,911	81,088	145,932	145,557	78,843	79,171	115,673	117,180
MEDIAN HOUSEHOLD INCOME		\$ 103,153	\$ 115,199	\$ 56,732	\$ 62,116	\$ 79,630	\$ 88,612	\$ 110,275	\$ 121,947
FAMILY STRUCTURE									
Total Families		47,686	47,803	94,491	94,238	50,618	50,827	80,950	81,946
Married Couple W/ Children		16,758	16,710	19,269	19,176	13,931	13,972	28,647	28,935
Married Couple W/o Children		22,307	22,302	31,434	31,387	25,723	25,787	39,598	39,999
Female Householder W/ Children		3,775	3,855	22,464	22,442	4,148	4,208	5,258	5,408
Female Householder W/o Children		2,801	2,834	12,591	12,620	3,500	3,524	3,796	3,885
Male Householder W/ Children		1,101	1,137	4,735	4,651	2,016	2,029	2,006	2,046
Male Householder W/o Children		944	965	3,998	3,962	1,300	1,307	1,645	1,673

Source: Explore Mo Health



Source: Explore Mo Health

Appendix D: STAKEHOLDER ASSESSMENT OF THE HEALTH NEEDS OF WEST/SOUTH ST. LOUIS COUNTY

Prepared by:  
BJC Market Research  
January 10, 2021

## BACKGROUND

The Patient Protection and Affordable Care Act (PPACA) was passed in March 2010. It required that

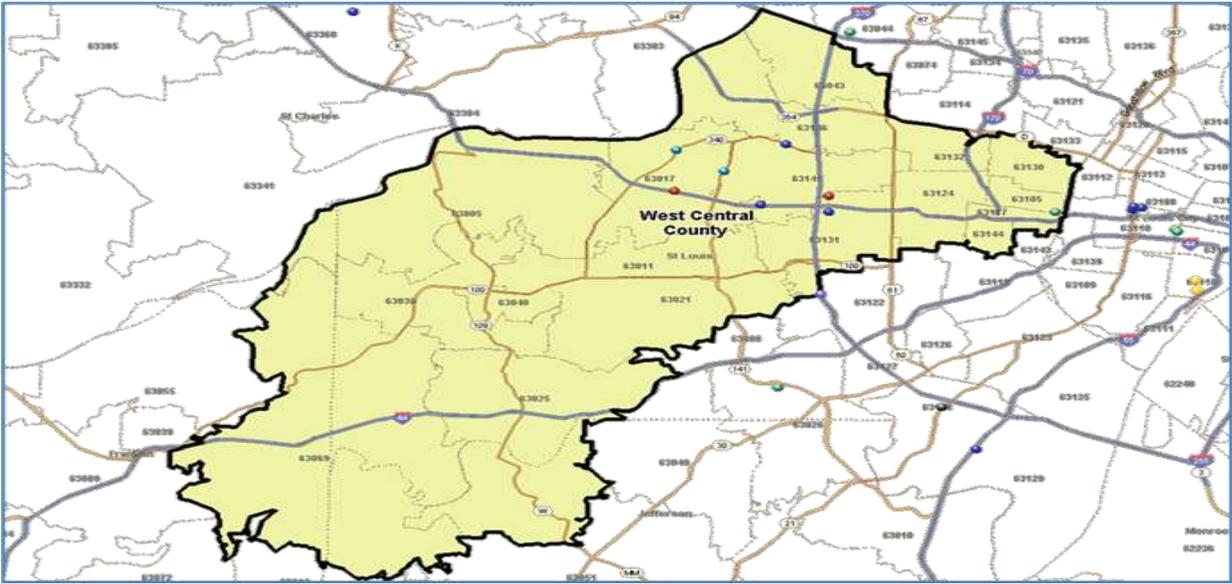
- Each 501(c)3 hospital must conduct a Community Health Need Assessment (CHNA) every three years.
- Each hospital must adopt an implementation strategy to meet the community health needs identified in the CHNA
- The CHNA and Implementation Plan must be widely available to the public.

The assessment is required to consider **input from those who represent the broad interests of the community served by the hospital**, including those with special knowledge or expertise in public health.

## METHODOLOGY

- In the past, community stakeholder health needs assessments were conducted in person via a moderated discussion.
- Due to COVID-19, BJC HealthCare, along with its collaborative partners, decided to conduct an online survey for the safety of our community stakeholders.
- Around June 7th, email invitations went out to 56 community stakeholders by presidents/representatives of Mercy St. Louis, St. Luke's Hospital, Barnes-Jewish West County Hospital and Missouri Baptist Medical Center. Several reminders were sent out before the survey was closed on June 30th.
- 29 community members provided us with feedback, for a 52% response rate.

MARKET DEFINITION: WEST/SOUTH ST. LOUIS COUNTY

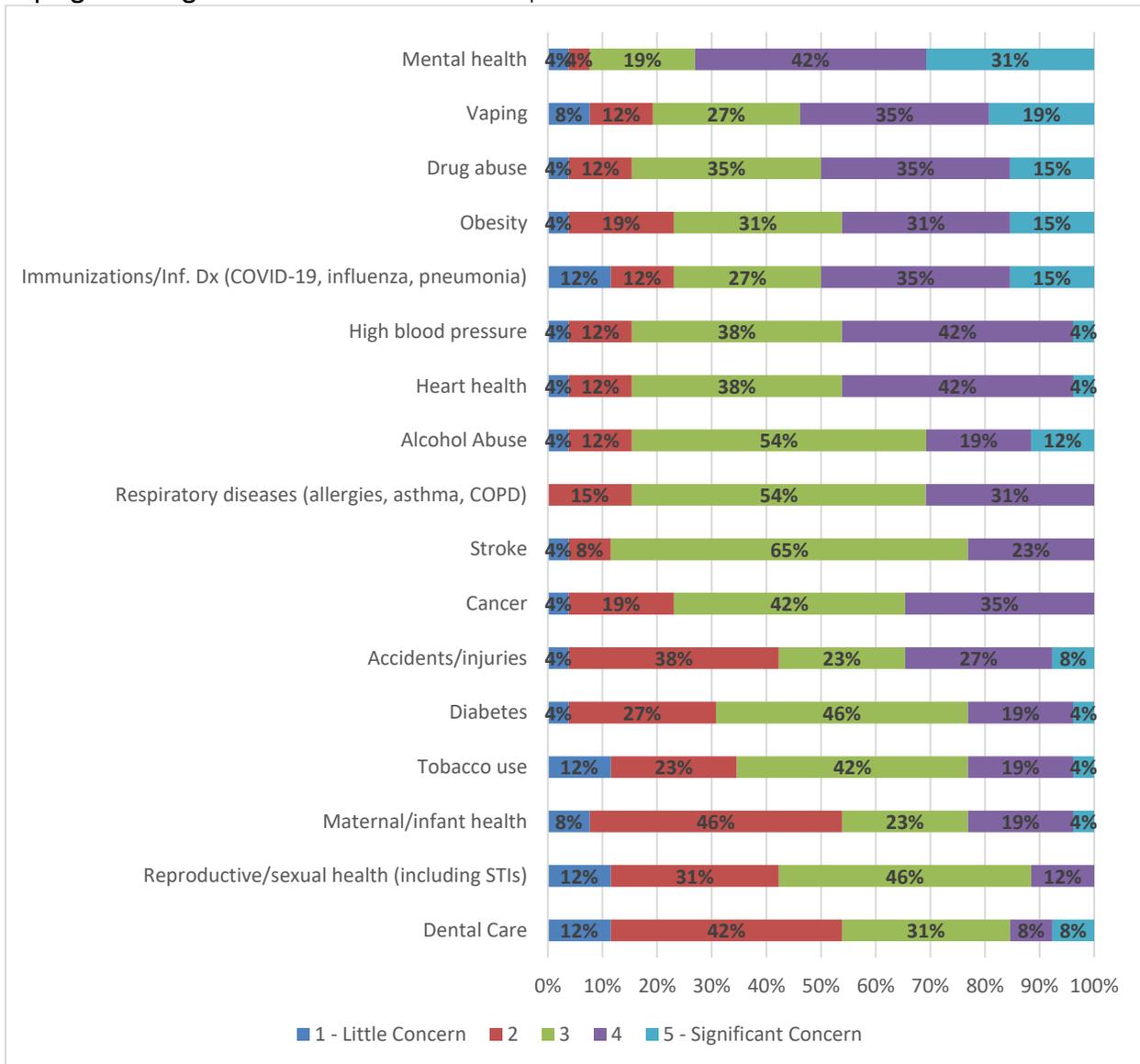


## KEY FINDINGS

- One need stood out as being of greatest concern in West/South St. Louis County: **Mental Health**. **Vaping** and **Drug Abuse** were rated next in importance.
- Stakeholders feel that the greatest potential to work together is around the issues of **Mental Health** and **Immunizations/ Infectious Diseases**.
- The stakeholders rate **Mental Health** at the highest level of concern and ability to collaborate. **Immunizations** and **Infectious Disease** and **Drug Abuse** rank slightly lower in concern, but higher in potential for collaboration.
- Stakeholders identify several barriers as being of significant impact to accessing services in West/South St. Louis County, including **scheduling services**, **inability to afford co-pays/insurance coverage**, and **lack of substance abuse /mental health services nearby**.
- Most stakeholders identify **low-income populations** as being at greatest risk for poor health outcomes in West/South St. Louis County. Over half of stakeholders identify older **adults 65+** and those suffering from **Substance Abuse** as also being at great risk.
- A majority of stakeholders identify **exposure to Drug Use/Abuse** as the social factor having the greatest impact on the health of those living in West/South St. Louis County. No other factors are identified by more than a third of stakeholders as having a significant impact on the community.
- Two out of three community stakeholders identify increasing **symptoms of anxiety** and **depression** and **increasing feelings of loneliness/social isolation** as the greatest impact of COVID-19 on West/South St. Louis County residents. **Difficulty managing remote learning** and **financial hardship** are identified by almost half of the stakeholders
- Stakeholders identified the largest resource gaps in West/South St. Louis County around the areas of **Mental Health**. **Affordable housing**, **food insecurity**, **jobs** and **substance abuse services** were each mentioned by a few.
- Stakeholders most commonly identified new issues of concern related to **Mental Health**. They also mentioned **Substance Abuse** and **affordable housing**.
- Stakeholders most frequently mentioned **county parks** and **green spaces** as local resources that promote health. A variety of other individual assets were also mentioned.
- Many stakeholders recognized the importance of **continued collaboration** and **improved communication** as a way to improve the health of the community.
- Many ZIP codes were identified as being at risk in West/South St. Louis County. The most frequently mentioned was 63125 (Lemay/Mehlville) in South County.

## PRIORITY HEALTH NEEDS FOR WEST/SOUTH STL COUNTY

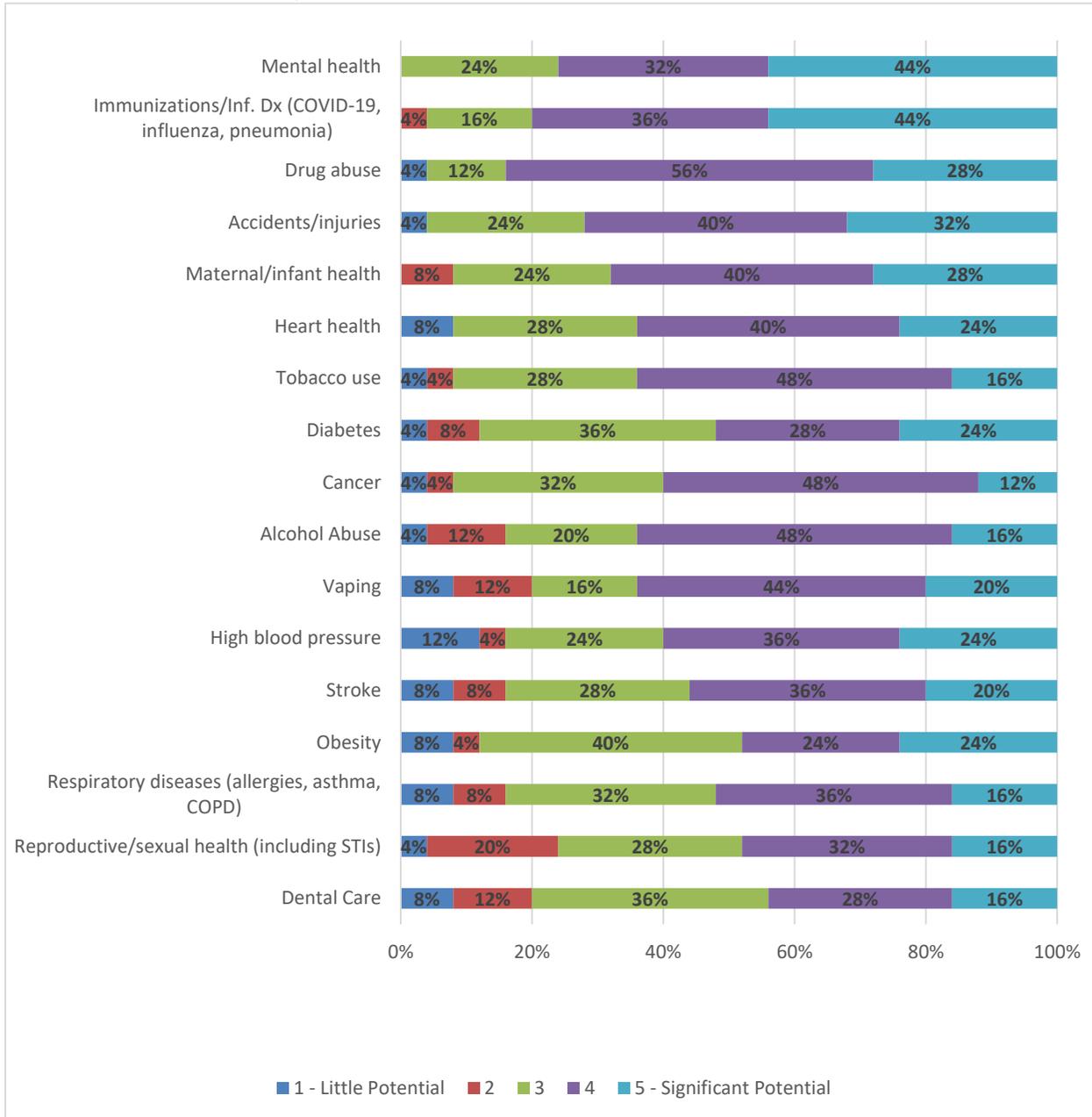
One need stood out as being of greatest concern in West/South St. Louis County: **mental health**. **Vaping** and **drug abuse** were rated next in importance.



**Q3 & Q4:** Thinking about West/South St. Louis County, please rate your level of concern about each of these health needs on a scale 1 (little concern) to 5 (significant concern).

## NEEDS WITH GREATEST POTENTIAL FOR COLLABORATION IN WEST/SOUTH STL COUNTY

Stakeholders feel that the greatest potential to work together are around the issues of **mental health** and **immunizations/ infectious diseases**.

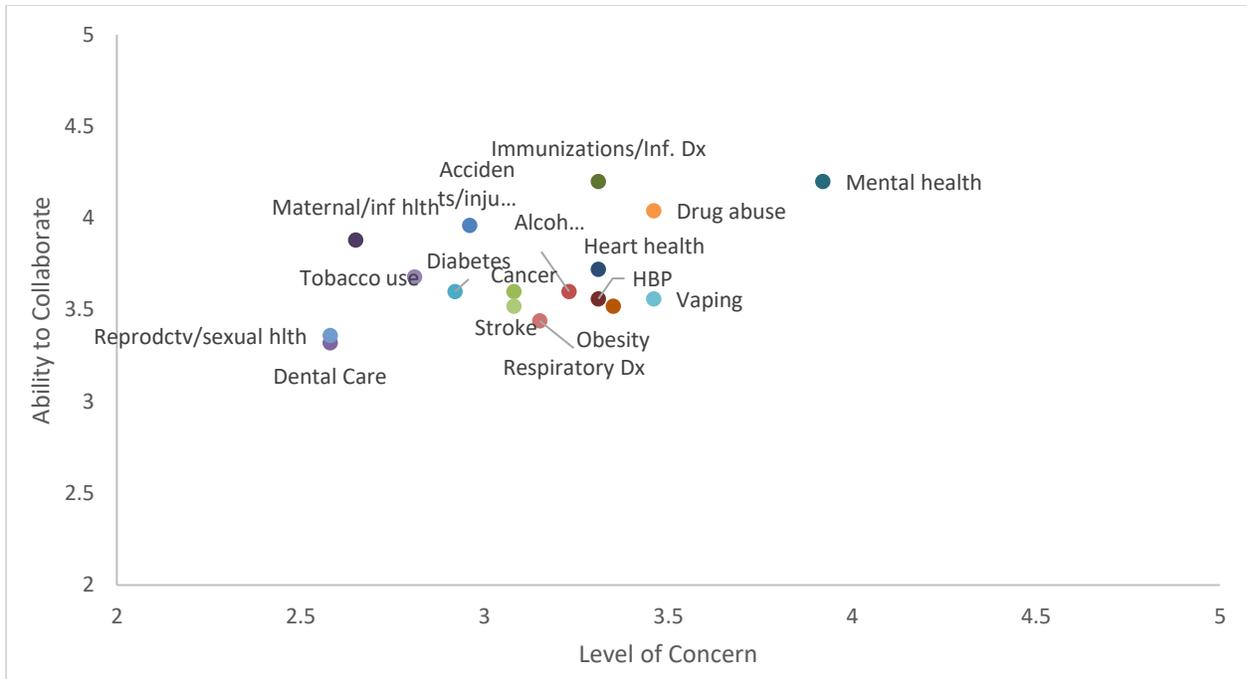


*Q5 & Q6: How would you rate the potential of community partners in West/South STL County to work together to address each of these health needs? Please rate each on a scale 1 (little potential) – 5 (significant potential).*

## LEVEL OF CONCERN BY ABILITY TO COLLABORATE

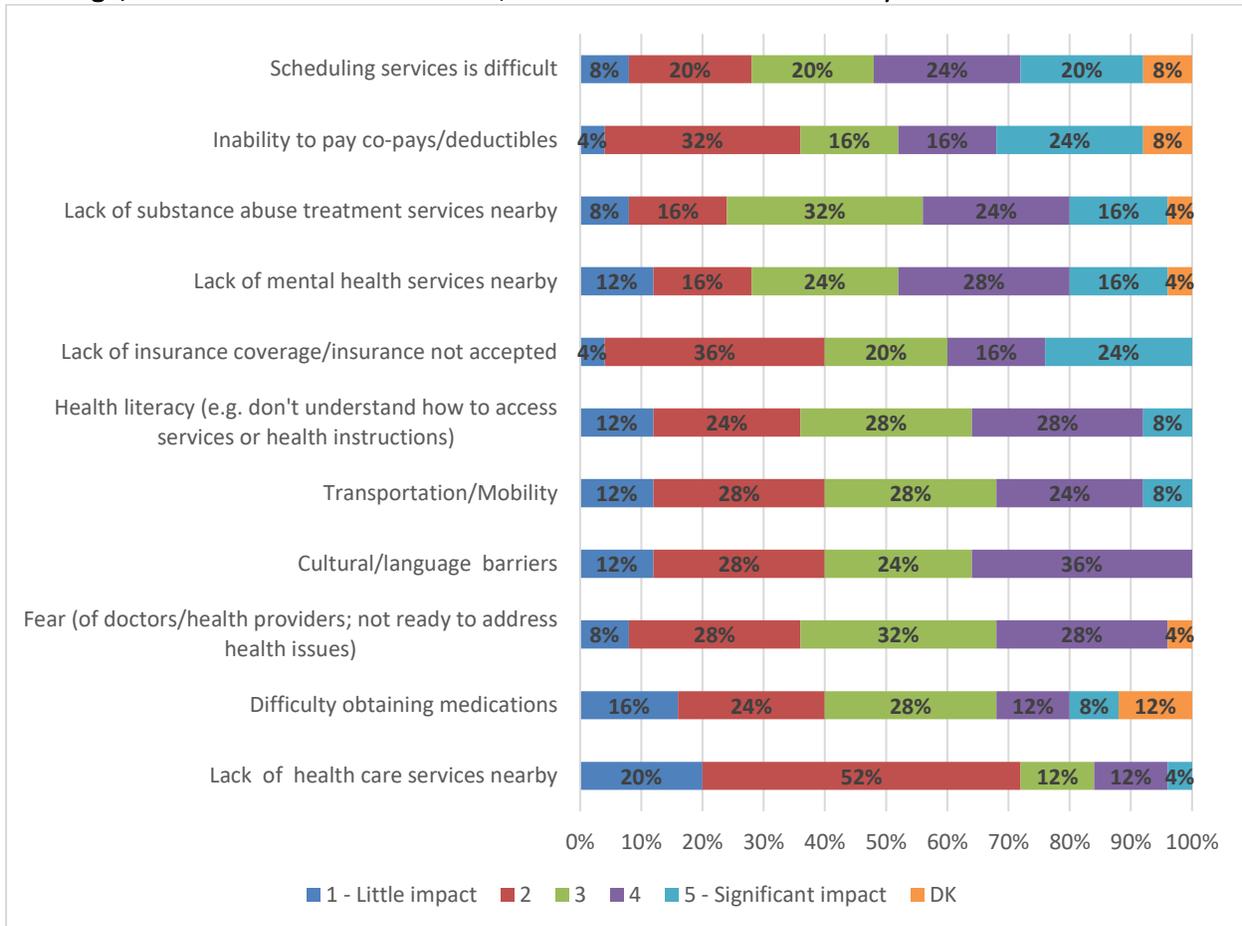
The stakeholders rate **mental health** at the highest level of concern and ability to collaborate. **Immunizations and infectious disease** and **drug abuse** rank slightly lower in concern, but higher in potential for collaboration.

Health Need	Level of Concern	Ability to Collaborate
Mental Health	3.92	4.2
Drug Abuse	3.46	4
Vaping	3.46	3.56
Obesity	3.35	3.52
Immunizations/ Infectious Diseases	3.31	4.2
Heart Health	3.31	3.72
High Blood Pressure	3.31	3.72
Alcohol Abuse	3.23	3.6
Respiratory Diseases	3.15	3.44
Cancer	3.08	3.6
Stroke	3.08	3.52
Accidents/ Injuries	2.96	3.96
Diabetes	2.92	3.6
Tobacco Use	2.81	3.68
Maternal/Infant Health	2.65	3.88
Reproductive/ Sexual Health	2.58	3.36
Dental Care	2.58	3.32



## GREATEST BARRIERS TO ACCESS IN WEST/SOUTH STL COUNTY

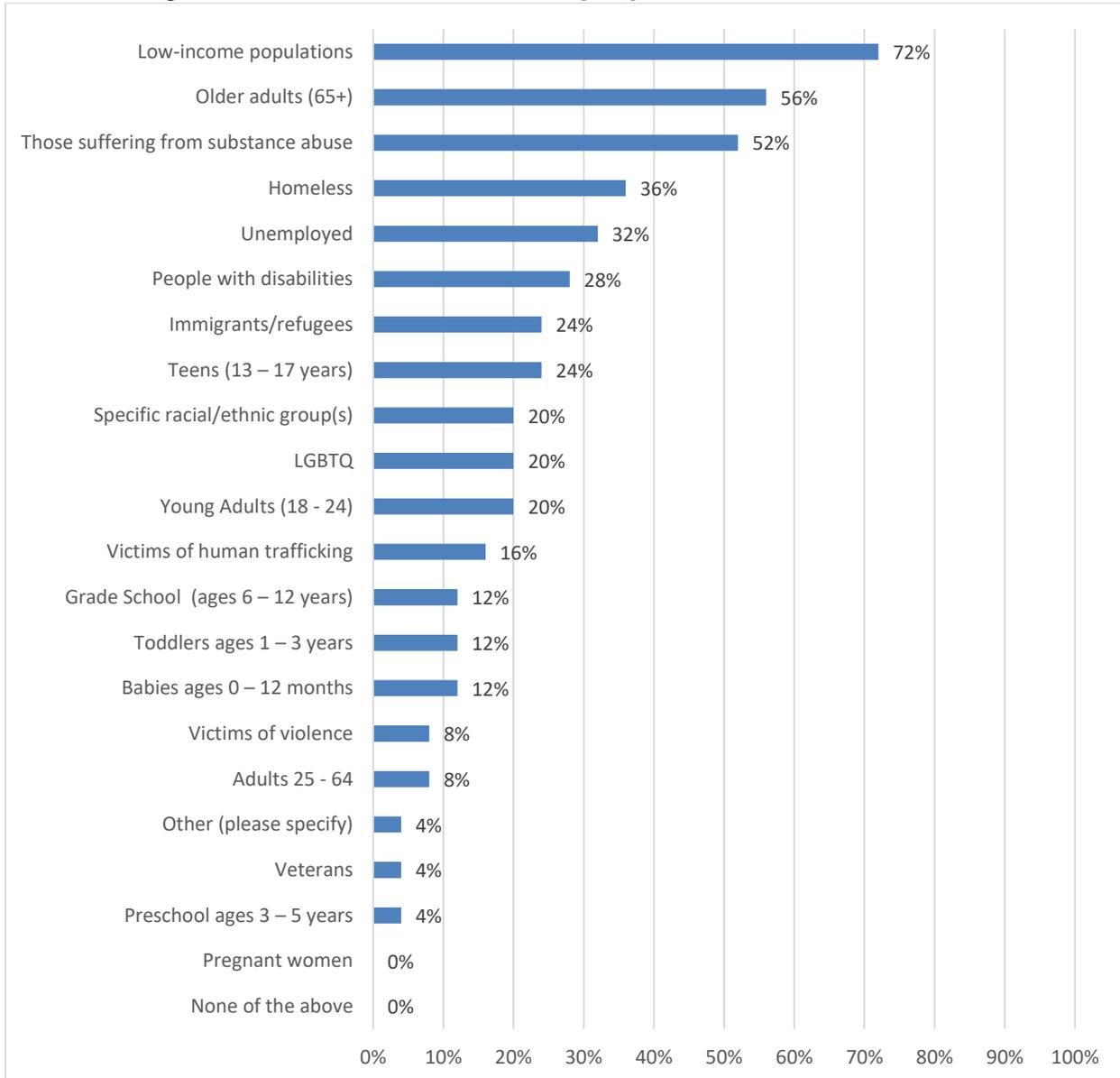
Stakeholders identify several barriers as being of significant impact to accessing services in west/south St. Louis County, including **scheduling services, inability to afford co-pays/insurance coverage, and lack of substance abuse /mental health services nearby.**



**Q7:** How impactful are each of the following barriers in West/South STL County to accessing health care? Rate each on a scale of 1 (little impact) – 5 (significant impact).

## POPULATIONS AT GREATEST RISK IN WEST/SOUTH STL COUNTY

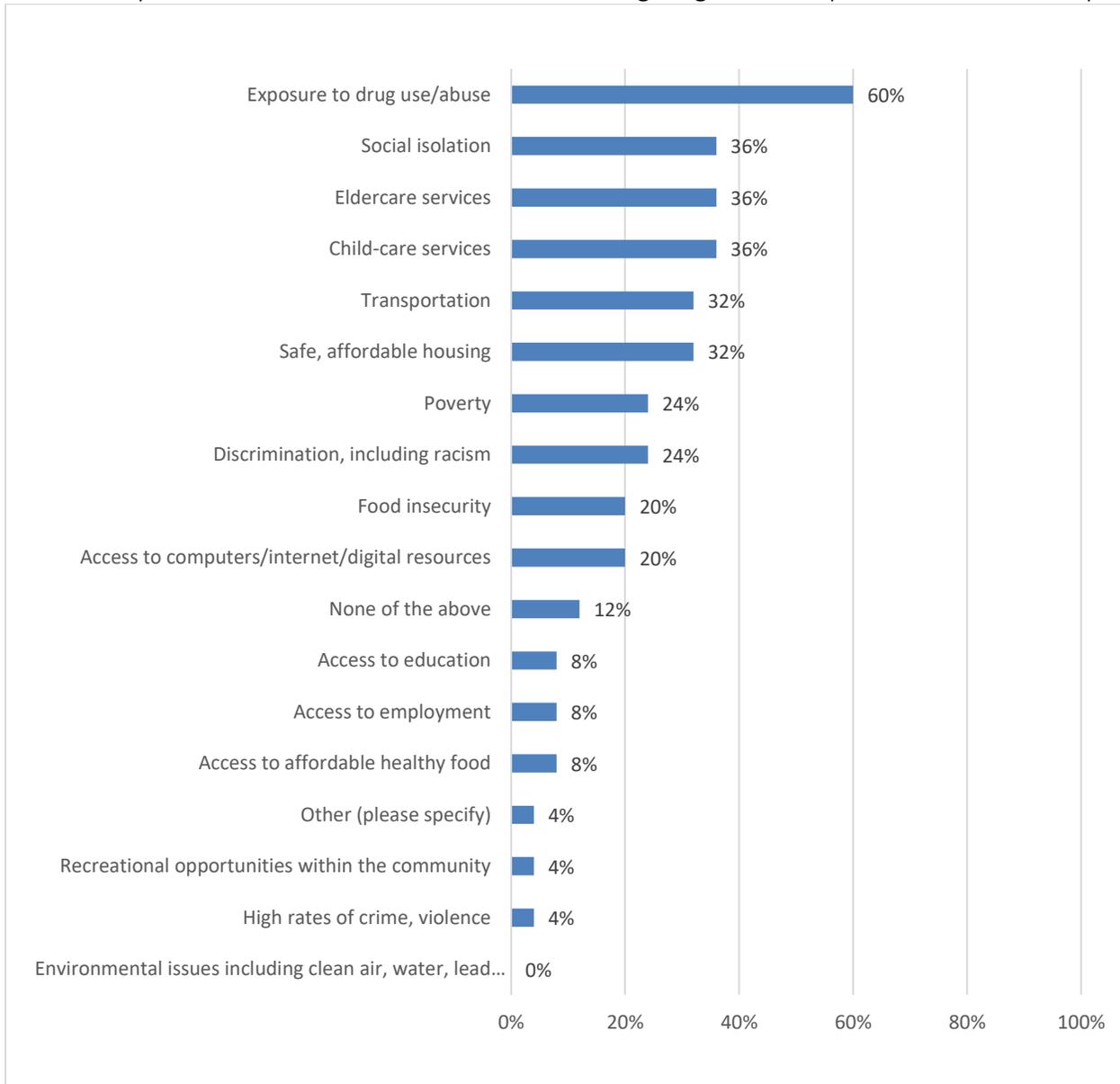
Most stakeholders identify **low-income populations** as being at greatest risk for poor health outcomes in West/ South STL County. Over half of stakeholders identify **older adults 65+** and **those suffering from substance abuse** as also being at great risk.



*Q8: Among those you serve in West/South STL County, which of the following populations are most at risk for poor health outcomes? Pick no more than five.*

## SOCIAL FACTORS IMPACTING WEST/SOUTH STL COUNTY

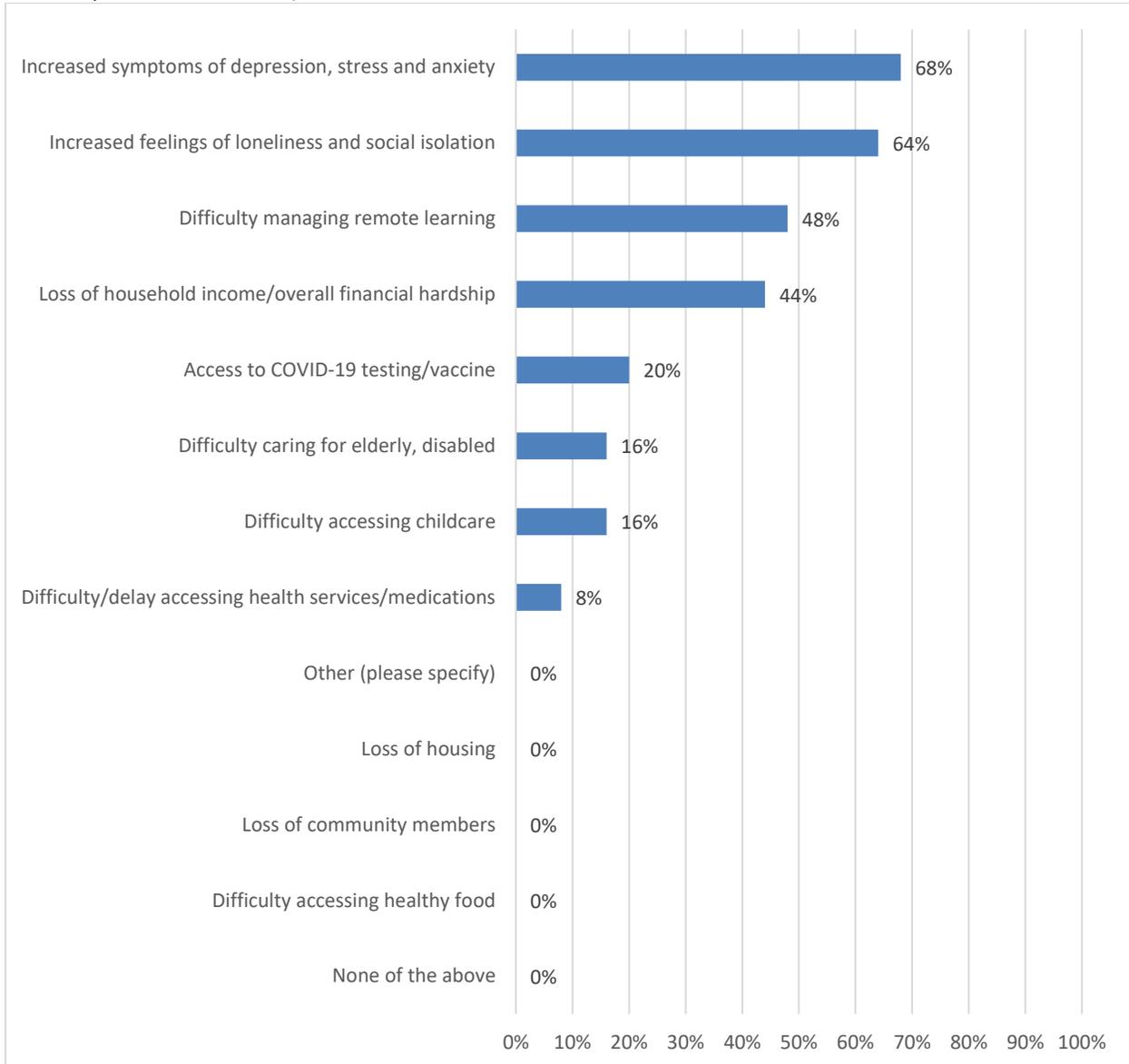
A majority of stakeholders identify **exposure to drug use/abuse** as the social factor having the greatest impact on the health of those living in West/South STL County. No other factors are identified by more than a third of stakeholders as having a significant impact on the community.



*Q9: Which of the following social factors have historically had the greatest impact on the health of the communities you serve in West/South STL County. Pick no more than five.*

## COVID-19'S IMPACT ON WEST/SOUTH STL COUNTY

Two out of three community stakeholders identify **increasing symptoms of anxiety and depression** and **increasing feelings of loneliness/social isolation** as the greatest impact of COVID-19 on West/South STL County residents. **Difficulty managing remote learning** and **financial hardship** are identified by almost half.



**Q10:** Thinking about the COVID-19 pandemic and its impact on West/South STL County, which of the following have had the greatest impact on the health of the community? Pick no more than three.

## BIGGEST GAPS IN RESOURCES

Stakeholders identified the largest resource gaps in West/South STL County around the areas of **mental health**. **Affordable housing**, **food insecurity**, **jobs** and **substance abuse services** were each mentioned by a few.

NEED	GAP
Mental Health (7 comments)	Lack of mental health
	Mental health services. (2)
	Mental health resources are available, however appointments are often a long wait
	Access to mental health care that is substantial. We encounter individuals on a recurring basis.
	I feel like the ability and capacity of mental health resources could be better. Mercy & Highland Center seem overtaxed. BJC downtown seems to have the best program (in partnership with Wash U)
	Awareness and availability of resources that address behavioral health issues
Affordable Housing (2 comments)	Housing- affordable housing in west St. louis county is non-existent. And the requirements to rent at some locations (apartments or homes) are unrealistic (i.e. "income must be 4Xs the rent" or "750 credit score required" "no previous evictions"). This leaves a subset population "unrentable" even if they could afford it.
	There is little in the way of affordable housing within this community; the current housing market has worsened this situation considerably. When families are forced to spend more than they can comfortably afford for housing, they become unable to afford other items such as appropriate medical care and food.
Food Insecurity (2 comments)	Food insecurity
	Food available for all
Jobs (2 comments)	Lack of jobs that provide a live-able wage Poverty and low income creates barrier to services, housing and resources.
	Income
Substance abuse services (2 comments)	Substance use services
	Substance use prevention
Access to technology	Access to computers and devices for children to do classwork remotely
Disparities	Connection to larger equity issues and being part of efforts to address disparities in the region and make it an equitable region for all.
Lack of preparedness	It was the general lack of preparedness by the healthcare community and public health for the pandemic. However, it has provided an opportunity for a system-level change. This is the 1st time in my 45 years as a nurse that we are including all healthcare stakeholders. I hope this continues for future planning.
Transportation	Transportation for the elderly.

**Q11:** *What are the biggest gaps in resources within this community to address the needs that you have identified? Please mention the need along with the missing resources.*

## NEW/ADDITIONAL HEALTH/SOCIAL ISSUES

Stakeholders most commonly identified new issues of concern related to **mental health**. They also mentioned **substance abuse** and **affordable housing**.

NEED	DESCRIPTION
Mental Health (8 comments)	Depression, anxiety and substance use among all populations.
	Substance use and mental health disparities;
	Mental Health issues; specifically depression and anxiety after being in quarantine.
	I think the impact of COVID 19, the isolation, the schools shutting down, the frequent quarantines for some will have far reaching mental/social health impacts for years to come.
	New program related to those in mental health crisis, coordinated at DePaul Health Center, but not conveniently located.
	Increase in anxiety and depression in children/youth and a lack of mental healthcare professionals.
	Mental health concerns as well as an increase in substance use
Substance abuse (4 comments)	Substance use and mental health concerns
	Depression, anxiety and substance use among all populations.
	Substance use and mental health disparities;
	Mental health concerns as well as an increase in substance use
Affordable Housing (2 comments)	Substance use and mental health concerns
	We desperately need affordable housing, and landlords who are willing to rent to folks without perfect renting history.
Affordable healthcare	Housing
Affordable healthcare	We also desperately need affordable healthcare. We have client who put small issues off so long (out of fear of price) that they become bigger (and even more dangerous/ expensive) health issues.
Care for the elderly	Care for the elderly
Human trafficking	Human trafficking
Livable wage	Income inequality, need for livable wage.
Regional support	This community is part of the larger St. Louis community and need to play a significant role in lifting others in our community.
Affordable healthcare	We also desperately need affordable healthcare. We have client who put small issues off so long (out of fear of price) that they become bigger (and even more dangerous/ expensive) health issues.
Care for the elderly	Care for the elderly
Human trafficking	Human trafficking
Livable wage	Income inequality, need for livable wage.
Regional support	This community is part of the larger St. Louis community and need to play a significant role in lifting others in our community.

*Q12: What new/additional health or social issues are you aware of in this community that may not be widely known, yet are a concern for the future?*

## COMMUNITY ASSETS THAT PROMOTE COMMUNITY HEALTH

Stakeholders most frequently mentioned **county parks and green space** as local resources that promote health. A variety of other individual assets were also mentioned.

RESOURCE TYPE	RESOURCE
Parks/green space (4 comments)	Lot's of parks and green space that provide free spaces to recreate.
	I feel you are already aware of the great benefit of being outside and promoting all parks and trails in this area.
	PARKS AND RECREATION
	We have a lot of amazing green spaces which could be better utilized for free or low cost programming such as community vegetable gardens, outdoor education, and conservation.
Charitable organizations (2 comments)	We also have a really great network of Saint Vincent De Paul Societies in the West St Louis County area. They are a huge help to our clients.
	NAMI, BHR
Civic collaboration	Police and fire districts work well together.
Local collaboration	Police and fire districts work well together.
Sidewalks	Sidewalks encourage walking and meeting your neighbors, even if 6 feet apart. Lack of sidewalks... a definite barrier to physical and mental health.
Sliding-scale health services	We refer to the free or sliding scale fee clinics at the local universities very frequently, and we get really good feedback from clients regarding these services.
Urgent care	Outstanding urgent care

**Q13:** *Think about health assets or resources as people, institutions, services, supports built resources (i.e., parks) or natural resources that promote a culture or health. What are the health assets or resources in West/Central STL County that we may not be aware of?*

## IDEAS FOR IMPROVING THE HEALTH OF THE COMMUNITY

Many stakeholders recognized the importance of **continued collaboration** and **improved communication** as a way to improve the health of the community.

NEED	DESCRIPTION
Continued Community Collaborations (8 comments)	Align with existing initiatives and promote operational practices that maximize existing resources and introduce efficiency. Cultivate a climate of trust, transparency, coordination, partnership, and inclusivity with stakeholders.
	Work with regional partners, share resources, work as a cohesive region
	Additional Partnerships of all providers
	Being supportive each of other and willing to share the wealth of knowledge that exists in this area.
	Covid was a good example of collaboration expand to other issues
	We have many hospitals in the area, the resources exist already.
	Coming together to move forward for better system-level preparedness for emerging threats and diseases.
Increased communication ( 8 comments)	Partnerships can be quite effective in addressing gaps in service or other concerns but it often takes leadership from the outside to help organizations envision some of those partnerships.
	Bettering the communication
	Community stakeholders need to continue strengthening what they are good at, and communicating those services to the broad public on multiple platforms.
	Clear and consistent and "grass roots" messaging on COVID-19 vaccine safety.
	Provide opportunities for agencies to share their resources with the community.
	Raise awareness of resources and increase access
	Social media and print media campaigns
Advocate for more mental health resources (2 comments)	Speakers in schools and high schools
	Speakers for parents groups
Advocate for more mental health resources (2 comments)	Advocating for more mental health professionals, especially for kids/youth.
	There need to be more federally funded mental health providers to meet the tremendous need for these services.
Increase acceptance of Medicaid/ACA plans	Health care providers who typically do not accept Medicaid or ACA plans should start accepting these plans.
Pop-up clinics	Maybe offer pop up clinics that are free to local residents. I think there would be no reason then for anyone to go without care.
Sliding-scale child care	And excellent childcare that is available on a sliding scale basis is also needed.
Support candidates focused on community health	Vote in policy-makers who prioritize people over profit.

**Q14:** *How can community stakeholders in West/South STL County work together to use their collective strengths to improve the health of the community?*

## COMMUNITIES AT GREATEST RISK

There were a wide variety of areas identified as being at risk in West/South St. Louis County. The most frequently mentioned was 63125 (Lemay/Mehlville) in South County.

NEED	DESCRIPTION
63125 (5 mentions)	Lemay/Mehlville
63123 (3 mentions)	Affton
63146 (3 mentions)	Unincorporated St. Louis County
63088 (2 mentions)	Valley Park
63141 (2 mentions)	Creve Coeur
63025 (2 mentions)	Eureka
63011	Ballwin
63021	Ballwin
63043	Maryland Heights
63069	Pacific
63121	Normandy (North STL County)
63122	Kirkwood
63126	Sappington/Crestwood
63128	Sappington
63129	Oakville
63131	Des Peres
63132	Olivette

**Q15:** *Within West/South STL County, which communities, neighborhoods or ZIP codes are especially vulnerable or at risk?*

### NEXT STEPS

Using the input received from community stakeholders, Christian Hospital will consult with its internal workgroup to evaluate this feedback. They will also consider other secondary data and determine whether/how their priorities should change. The final needs assessment and implementation plan is due by December 31, 2022.

## Appendix E: PARTICIPATING STAKEHOLDERS

### ONLINE SURVEY PARTICIPATING MID/SOUTH/WEST ST. LOUIS COUNTY STAKEHOLDERS

LAST NAME	FIRST NAME	ORGANIZATION	TITLE	CITY/TOWN
Armbruster	Jenny	PreventEd (formerly NCADA)	Deputy Executive Director	St. Louis
Brown	Greg	Eureka Fire Protection District	Fire Chief	Eureka
Carl	Kevin	Hancock Place School District	Superintendent	St. Louis
Cavins	James	Town and Country, Missouri Police Department	Chief of Police	Town and Country
Donaldson	Kate	St. Louis County Department of Public Health	Director, Office of Strategy & Planning	Berkeley
Harms	Douglas	City of Des Peres	City Administrator	Des Peres
Jaudes	Suzanne	Maryville University	Director of Health and Wellness	St. Louis
Johnston	Beth	Lindbergh Schools	Chief Communications Officer	St. Louis
Jones	Tim	Des Peres St. Luke's Advisory Board Member	Board Member	Eureka
Keating	Erica	The Lindbergh Schools Foundation	Director	St. Louis
Linza	Zoe	Advisory Board Des Peres	Secretary	Kirkwood
Lorden	Tammie	Maryville University	Manager, HR Operations	St. Louis
Mccue	Molly	Lemay Child and Family Center	Executive Director	St. Louis
Miller	Barry	Metrowest Anesthesia Group	Anesthesia department chairman	St. Louis
Mundel	Captain James	St. Louis County Police	Precinct Commander	Wildwood
Neumann, RN	Linda	St. Louis Suburban School Nurses Association	Past President	St. Louis
Pyatt	Amber	Missouri Baptist University	Dean of Nursing	St. Louis
Romas	Jon	Creve Coeur Police Department	Captain	Creve Coeur
Rose	Pam	Comtrea	Resident Assistant	St. Louis
Schaefer	Leah	PreventEd	Director of Prevention Education	St. Louis

## APPENDIX E: PARTICIPATING STAKEHOLDERS CONTINUED:

### ONLINE SURVEY PARTICIPATING MID/SOUTH/WEST ST. LOUIS COUNTY STAKEHOLDERS

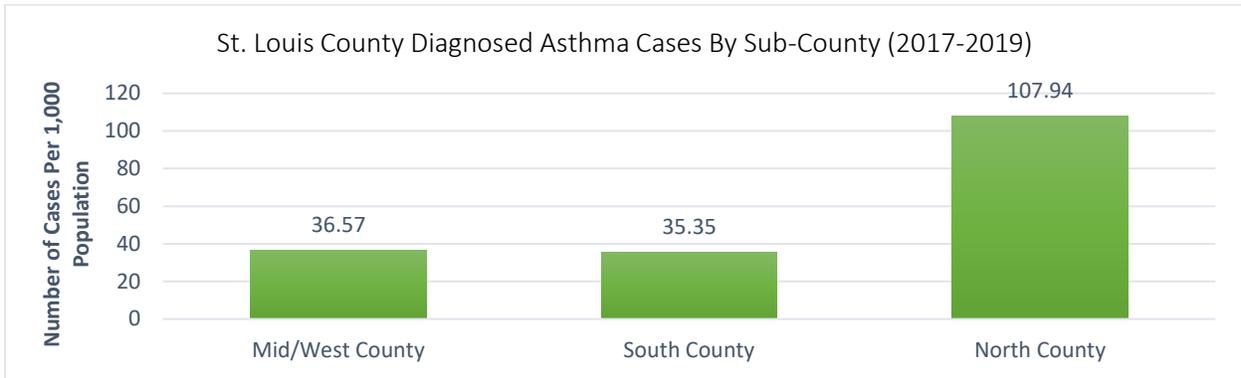
LAST NAME	FIRST NAME	ORGANIZATION	TITLE	CITY/TOWN
Smith	David	Kirkwood Fire Department	Deputy Chief / CMO	Kirkwood
Todd	Lloyd	Event Exhibits, Inc.	Owner/CEO	Kirkwood
Traver	Gena	Saint Louis County Department of Health	Community Health Manager	Berkeley
Vandable	Niki	Circle Of Concern	Director of Client Services	Valley Park
Wehr	Amy	Rockwood School District	Supervisor, Wellness & Health Services	Eureka
Wiegand	Melichar	Eureka Police Dept	Chief	Eureka
Wittels	Lynn	Jewish Community Center	President & CEO	St. Louis

## Appendix F: MISSOURI BAPTIST MEDICAL CENTER INTERNAL WORK GROUP

MISSOURI BAPTIST MEDICAL CENTER INTERNAL WORK GROUP			
LAST NAME	FIRST NAME	TITLE	DEPARTMENT
Allen	Garrett	Director, Strategic Planning and Oncology Service Line	Oncology Product Line
Anand	Nitin	WURP Physician IL	Anesthesiology-Clinical Operations
Apter	Caroline	Manager, Patient Care	Oncology Product Line
Bauer	Nicholas	Manager, Patient Care -IV	Neurology Step Down Unit
Beirne	Shannon	Manager, Patient Care -IV	Emergency Room
Boehm	Carol	Program Manager	Financial Services
Bruegenhemke	Jane	Director, Acute and Critical Care	Nursing Administration
Byrne	Heather	Manager, Patient Care-IV	Cardiovascular Recovery Unit
Collins	Cherese	Physician	OBGYN Associates of St. Louis (BJCMG practice)
Colquitt	Sandi	Sr. Coordinator Staffing	Labor & Delivery Room
Donnelly	Shelley	Nurse Coordinator	Institute of Clinical Nursing Practice
Johnson	Karen	Rep, Patient Services-Lead	BJCMG Primary Care
Johnson	Carol	Rep Patient Access I	RCM-Patient Access-BJH
Kelly	Kelli	Manager, Patient Access	RCM-Patient Access
McGinnins	Lauren	Manager, Patient Experience	Patient Relations
Miller	Deanna	Manager, Clinical Dietician	Food and Nutrition Inpatient Dieticians
Reda	Patricia	VP, Chief Nurse Officer	Executive Administration
Reese	Catherine	Director, Women & Infants	Women & Infants Product Line
Ruffus	Shana	Director, Marketing and Communication	Missouri Baptist Medical Center, Missouri Baptist Sullivan Hospital & Parkland Health Center, Marketing and Communication
Vogler	Jana	Director, Cardiac and Vascular Services	Cardiology Product Line
Voss	Benjamin	Physician	BJCMG Primary Care

## Appendix G: SECONDARY DATA

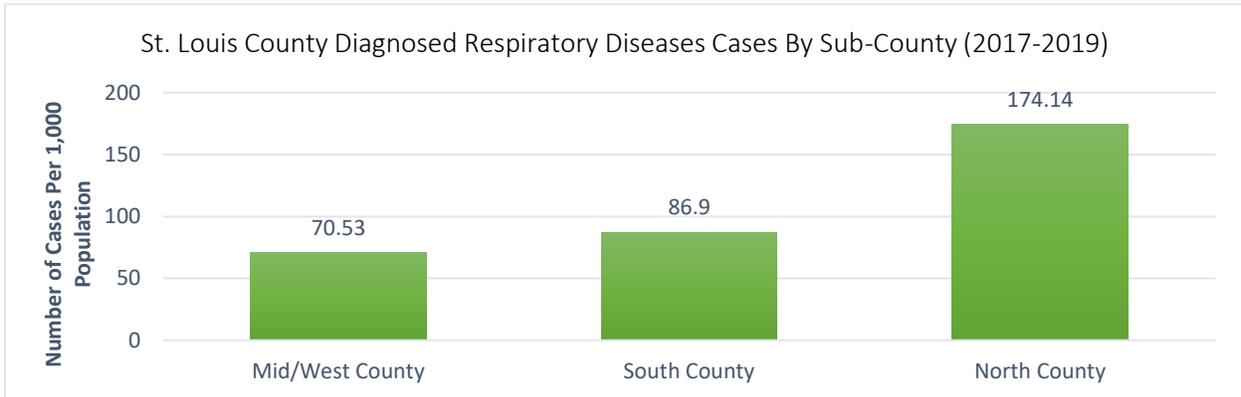
### ASTHMA



Source: Explore MO Health

ST. LOUIS COUNTY VS. MISSOURI THREE-YEAR MOVING ASTHMA AVERAGE RATE						
HEALTH INDICATORS	2015-2017		2016-2018		2017-2019	
	St. Louis County	Missouri	St. Louis County	Missouri	St. Louis County	Missouri
Asthma Death / 100,000 Population	1.17	1.1	1.31	1.15	1.16	1.06
	2011-2013		2012-2014		2013-2015	
Asthma Hospitalizations /10,000 Population	15.51	11.74	15.06	11.44	14.08	10.65
Asthma EMERGENCY ROOM Visits/ 1000 Population	7.6	5.39	7.78	5.47	7.56	5.34

Source: Missouri Department of Health & Senior Services



Source: Explore MO Health

2018 vs. 2019 TOP TEN CITIES IN ST. LOUIS COUNTY WITH CURRENT ASTHMA (PERCENT)

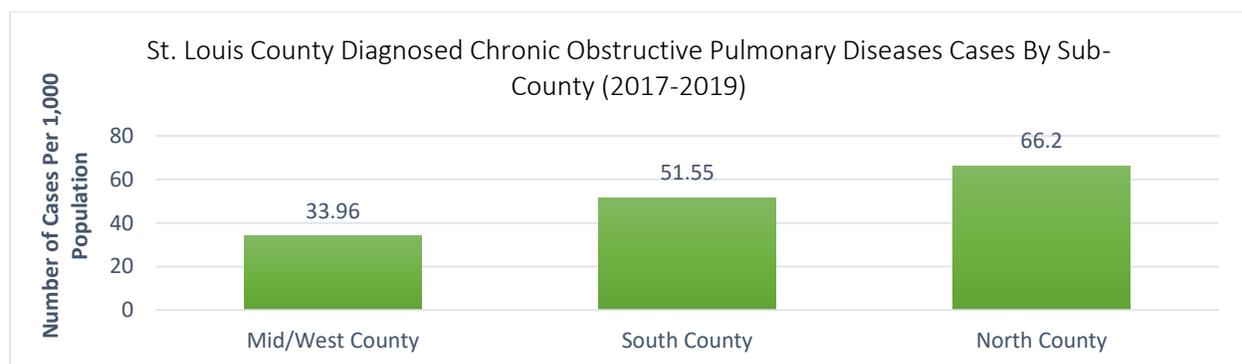
RANK	CITIES	YEAR 2018	CITIES	YEAR 2019
1	Wellston	14.2	Wellston	14.2
2	Flordell Hills	13.5	Country Club Hills	13.8
3	Hillsdale	13.3	Kinloch	13.7
4	Bel-Ridge	13.1	Flordell Hills	13.6
5	Hanley Hills	13.1	Bel-Ridge	13.4
6	Pagedale	13.1	Hanley Hills	13.4
7	Velda City	13.1	Hillsdale	13.3
8	Country Club Hills	13.0	Glasgow Village	13.2
9	Glasgow Village	13.0	Pine Lawn	13.2
10	Kinloch	13.0	Northwoods	13.1

Source: Conduent Healthy Communities Institute

ST. LOUIS COUNTY VS. MISSOURI ASTHMA RATE BY RACE / ETHNICITY

HEALTH INDICATORS	WHITE		AFRICAN AMERICAN	
	ST. LOUIS COUNTY	MISSOURI	ST. LOUIS COUNTY	MISSOURI
Death / 100,000 Population (2009-2019)	0.66	0.79	3.16	3.2
Hospitalizations / 10,000 Population (2011-2015)	6.76	7.13	37.17	35.59
Emergency Room Visits / 1,000 Population (2011-2015)	2.4	3.02	20.06	18.16

Source: Conduent Healthy Communities Institute

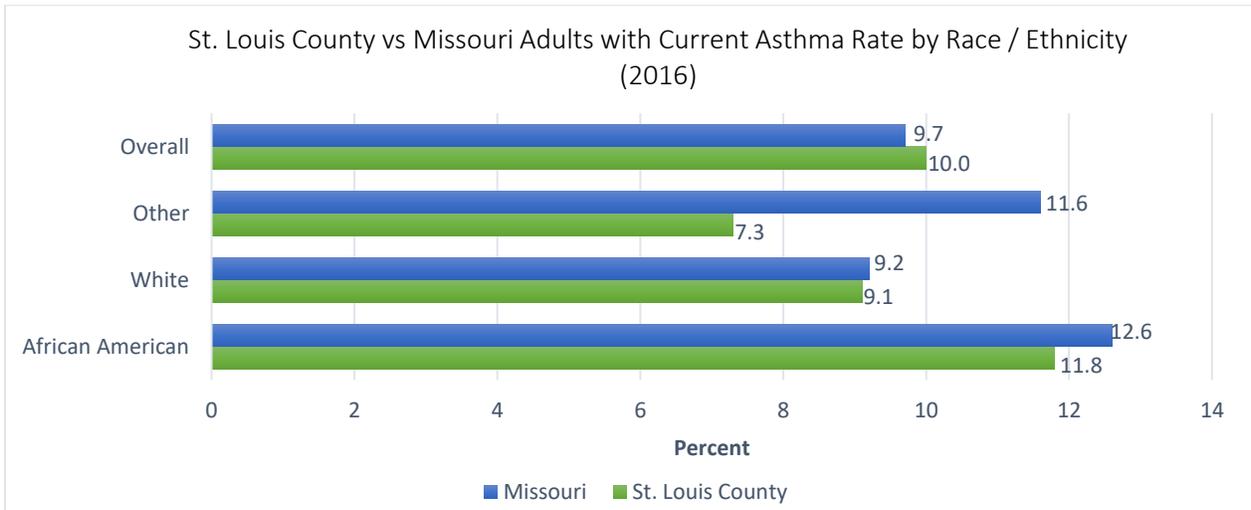


Source: Explore MO Health

## ST. LOUIS COUNTY VS. MISSOURI & U.S. RESPIRATORY DISEASES RATE

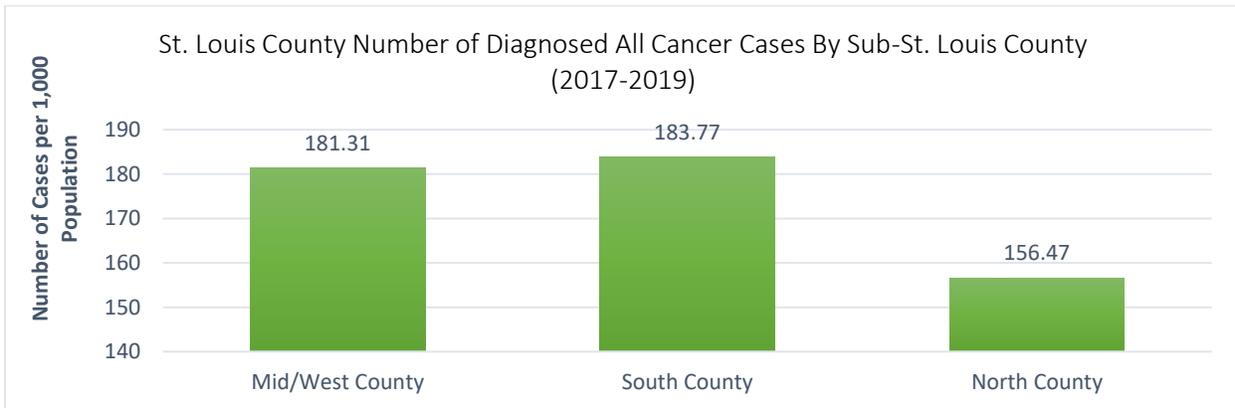
HEALTH INDICATORS	ST. LOUIS COUNTY	MISSOURI	U.S.
Adults with Current Asthma in Percent (2016)	10.0	9.7	9.3
Age-Adjusted Death Rate due to Chronic Lower Respiratory Disease /100,000 Population (2015-2019)	30.1	50.4	40.2
Asthma: Medicare Population in Percent (2018)	5.6	4.5	5.0

Source: Conduent Healthy Communities Institute

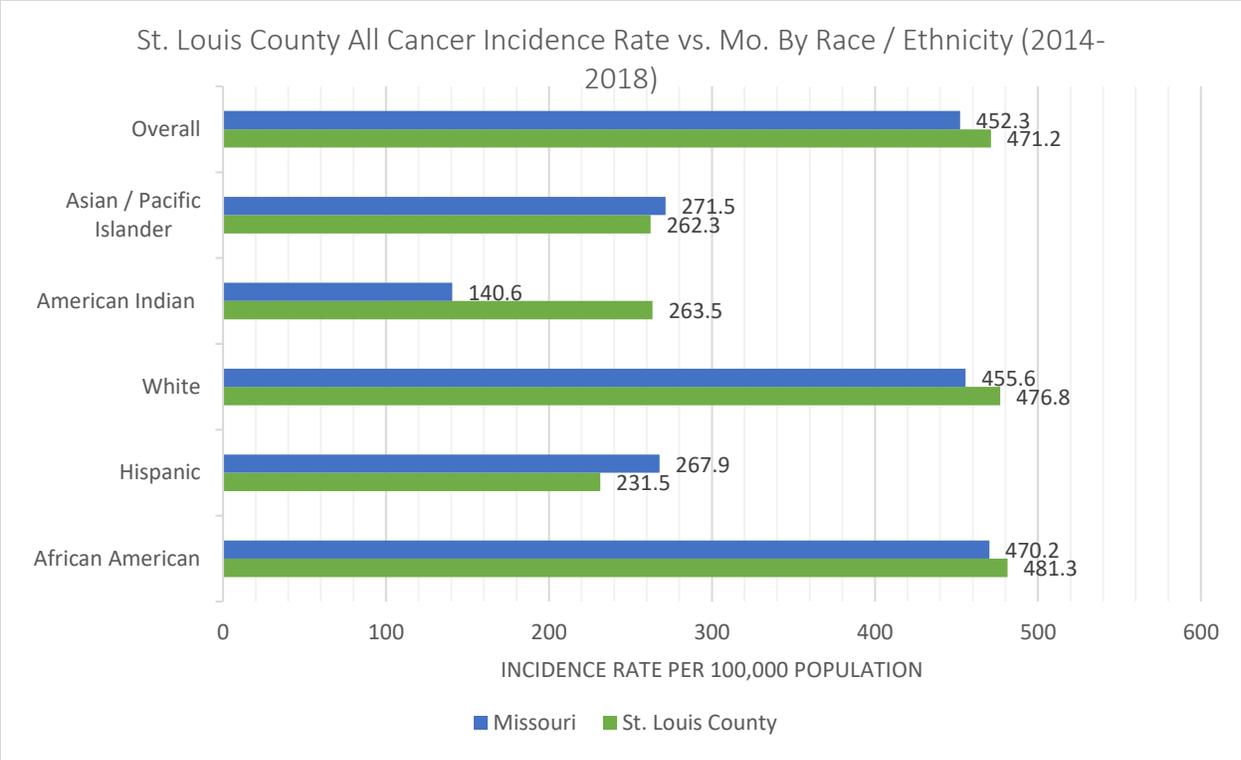


Source: Conduent Healthy Communities Institute

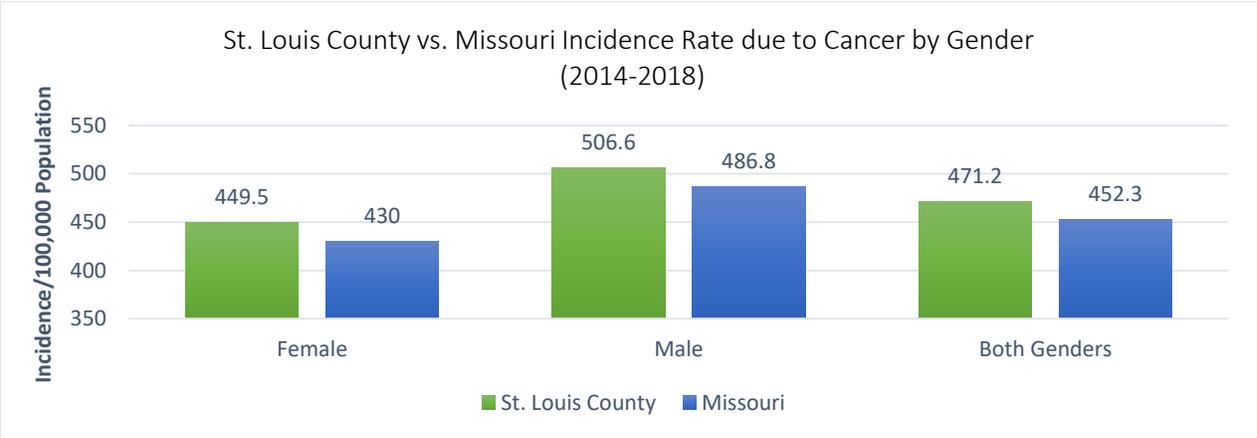
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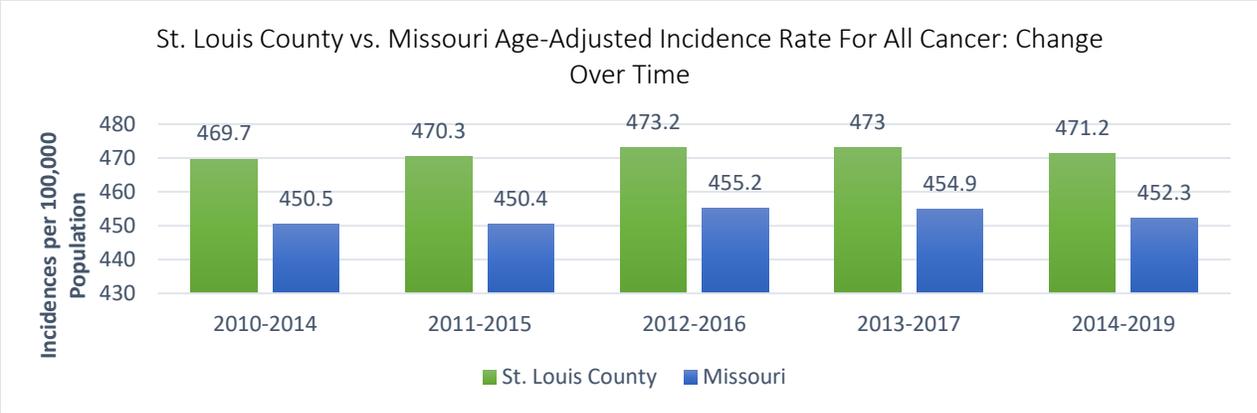
Source: Explore MO Health



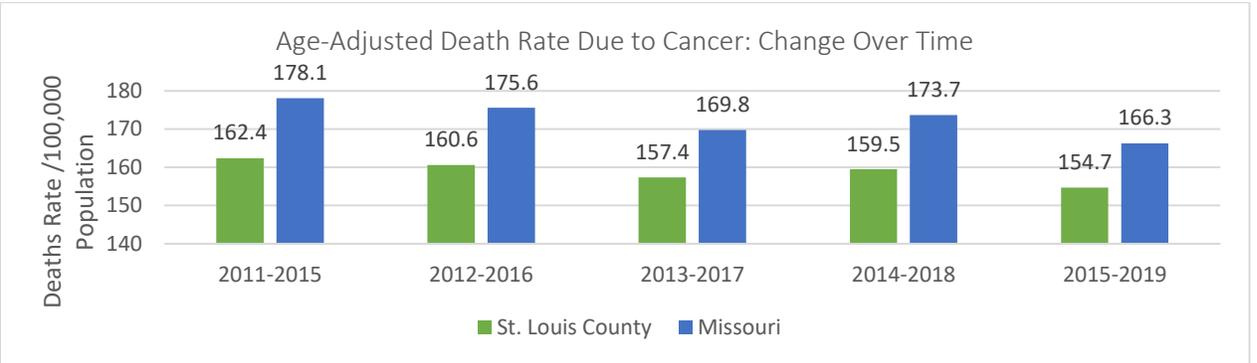
Source: Conduent Healthy Communities Institute



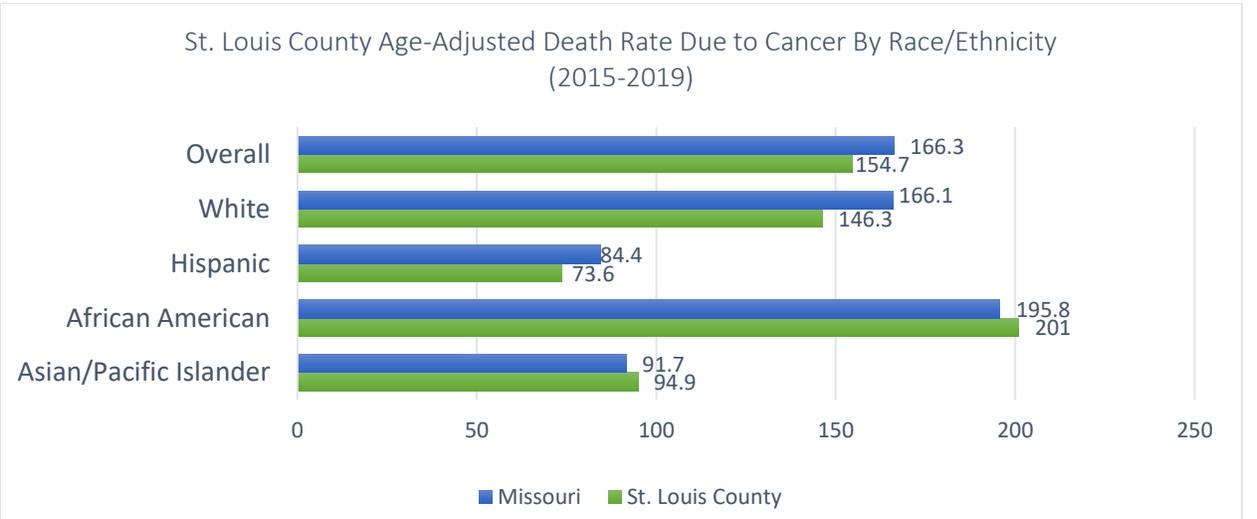
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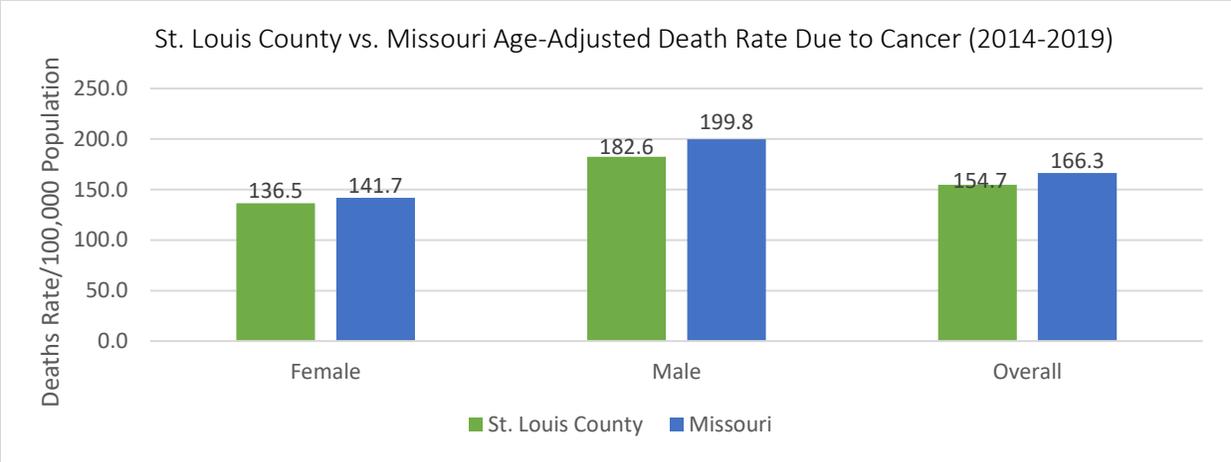
Source: Conduent Healthy Communities Institute



Source: Conduent Healthy Communities Institute

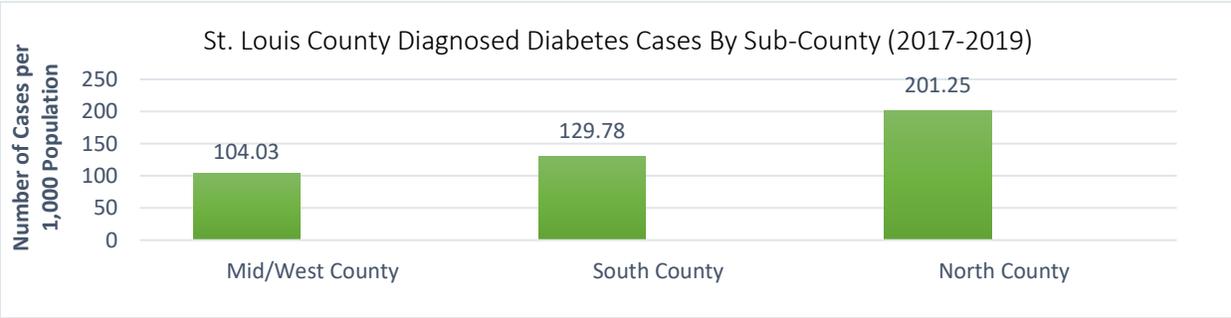


Source: Conduent Healthy Communities Institute

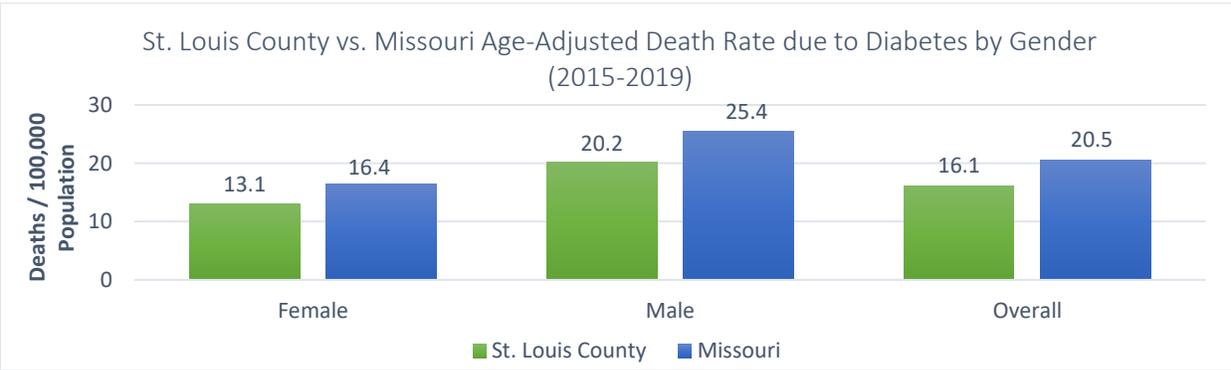


Source: Conduent Healthy Communities Institute

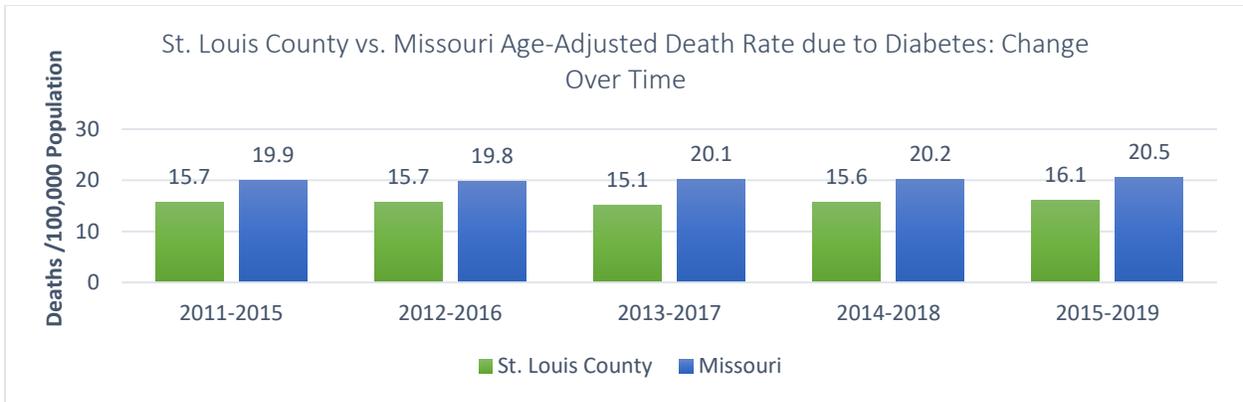
**DIABETES**



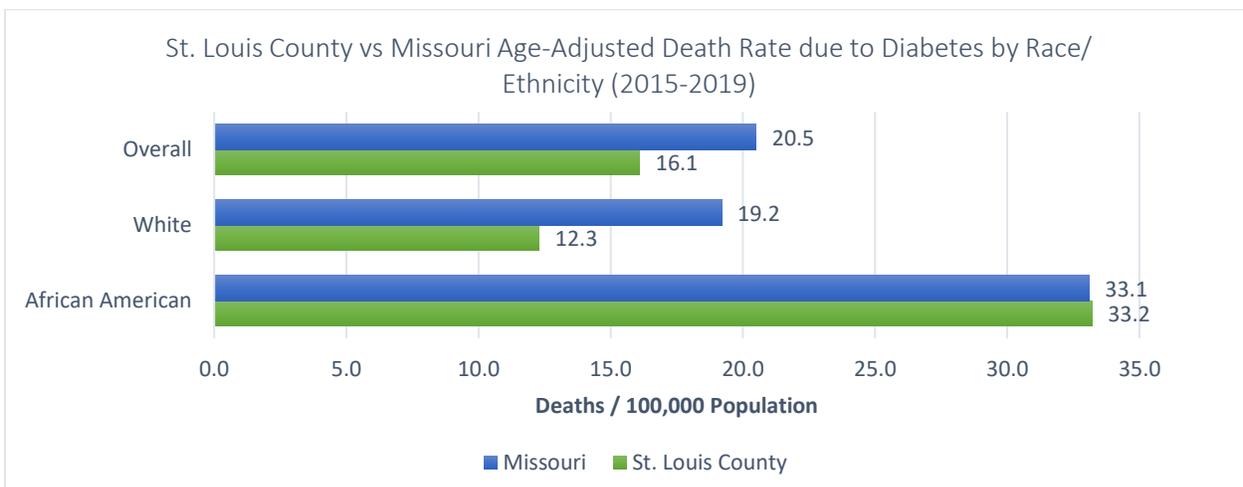
Source: Explore Mo Health



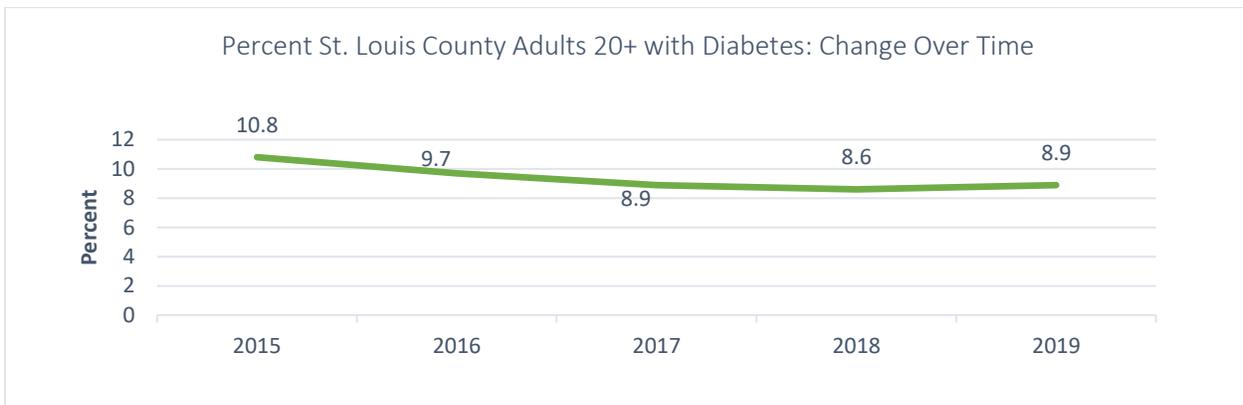
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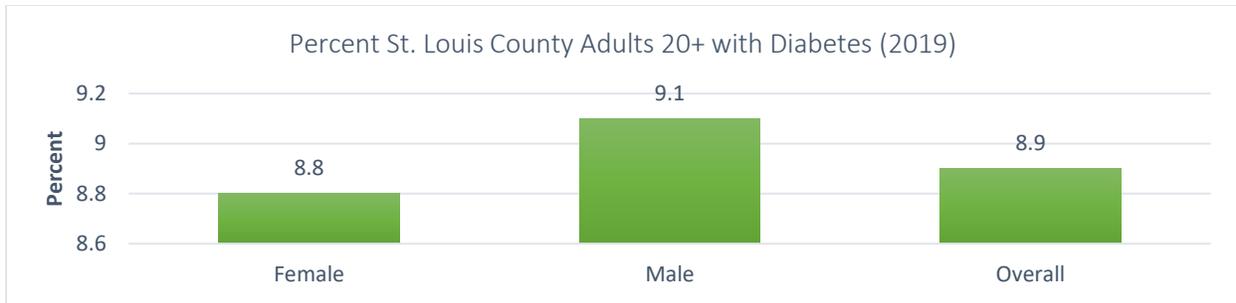
Source: Conduent Healthy Communities Institute



Source: Conduent Healthy Communities Institute



Source: Conduent Healthy Communities Institute

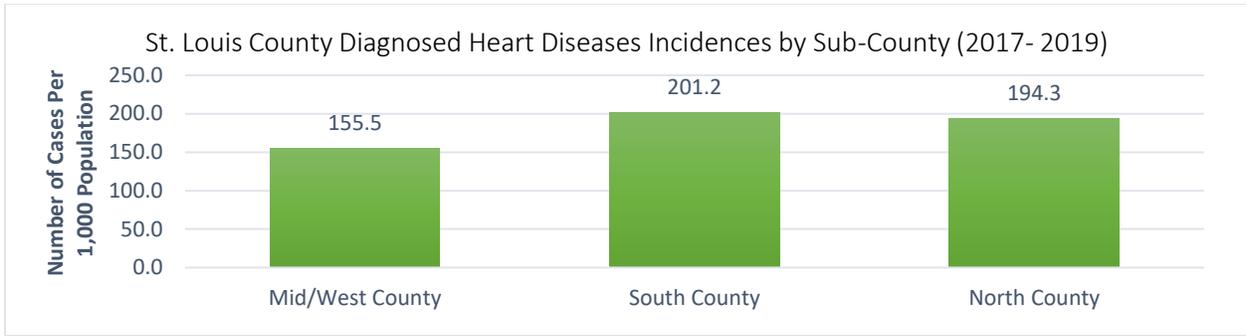


Source: Conduent Healthy Communities Institute

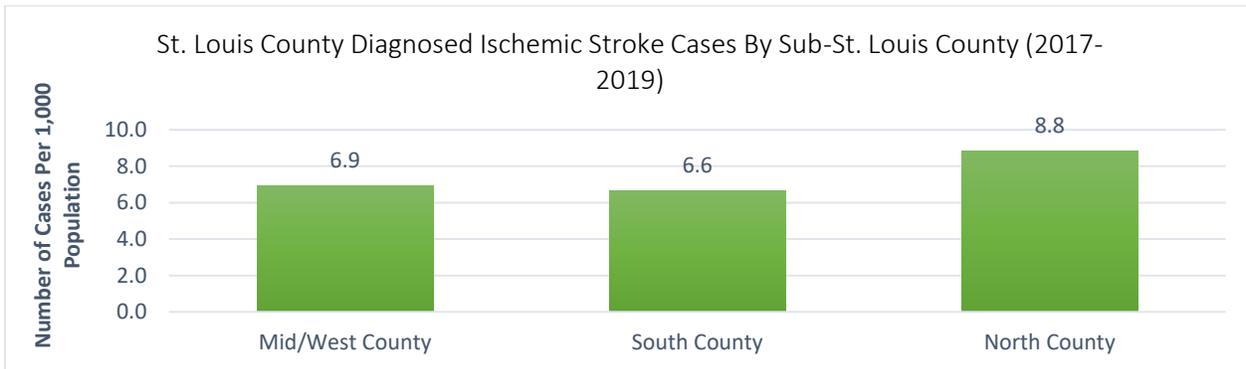
2018 vs. 2019 TOP TEN CITIES IN ST. LOUIS COUNTY WITH ADULTS WITH DIABETES (PERCENT)				
RANK	CITIES	YEAR 2018	CITIES	YEAR 2019
1	Velda Village Hills	22.3	Northwoods	23.7
2	Uplands Park	22.2	Velda Village Hills	23.1
3	Northwoods	21.7	Uplands Park	23
4	Velda City	19.6	Kinloch	21.5
5	Wellston	19.5	Velda City	20.2
6	Beverly Hills	19.2	Wellston	20.1
7	Pagedale	18.7	Beverly Hills	19.9
8	Kinloch	18.6	Pine Lawn	19.7
9	Pine Lawn	18.4	Pagedale	19.6
10	Moline Acres	18.3	Moline Acres	19.5

Source: Conduent Healthy Communities Institute

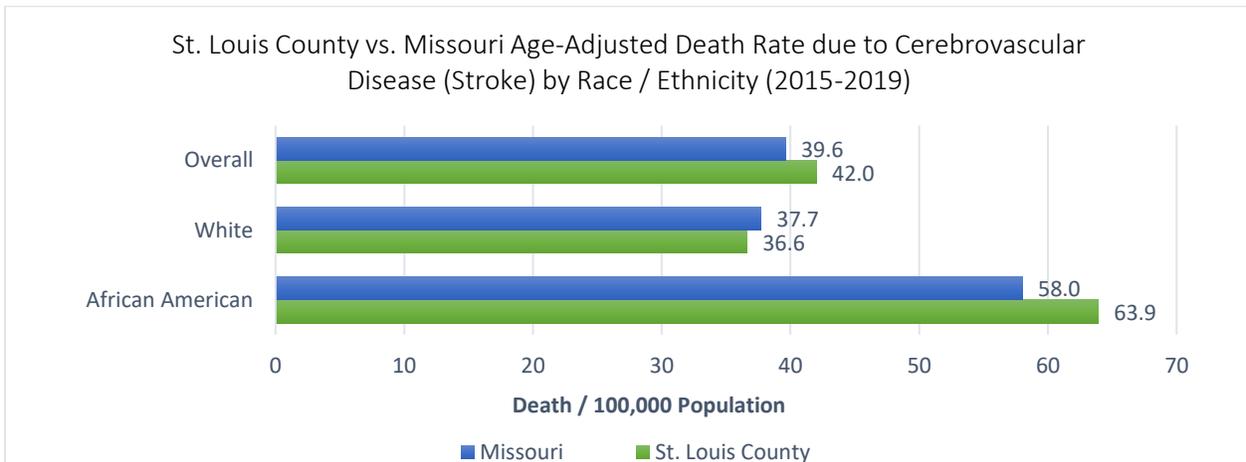
## HEART HEALTH & STROKE



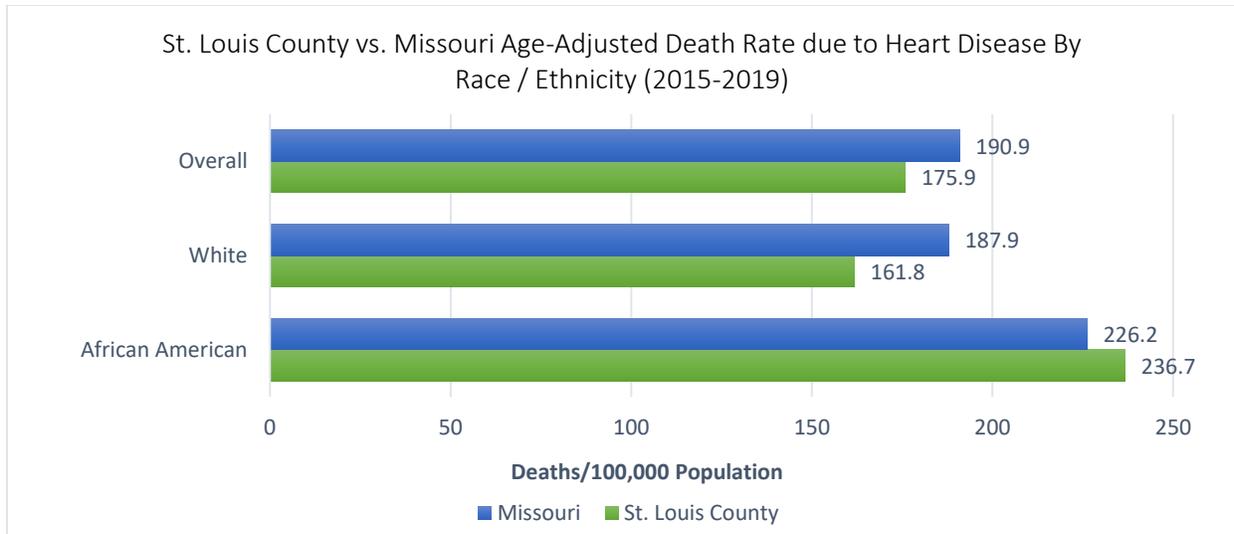
Source: Explore Mo Health



Source: Explore Mo Health



Source: Conduent Healthy Communities Institute



Source: Conduent Healthy Communities Institute

ST. LOUIS COUNTY VS. MISSOURI HEART DISEASE & STROKE AGE-ADJUSTED RATE		
HEALTH TOPICS	ST. LOUIS COUNTY	MISSOURI
<b>HEART DISEASE</b>		
Deaths / 100,000 Population (2009-2019)	178.69	193.95
Hospitalizations / 10,000 Population (2011-2015)	106.11	109.46
Emergency Room Visits / 1,000 Population (2011-2015)	12.67	15.12
<b>ISCHEMIC HEART DISEASE</b>		
Deaths / 100,000 Population (2009-2019)	120.16	115.62
Hospitalizations / 10,000 Population (2011-2015)	26.54	32.53
Emergency Room Visits / 1,000 Population (2011-2015)	0.12	0.57
<b>STROKE / OTHER CEREBROVASCULAR DISEASE</b>		
Deaths / 100,000 Population (2009-2019)	40.25	41.02
Hospitalizations / 10,000 Population (2011-2015)	30.15	27.85
Emergency Room Visits / 1,000 Population (2011-2015)	0.33	0.77

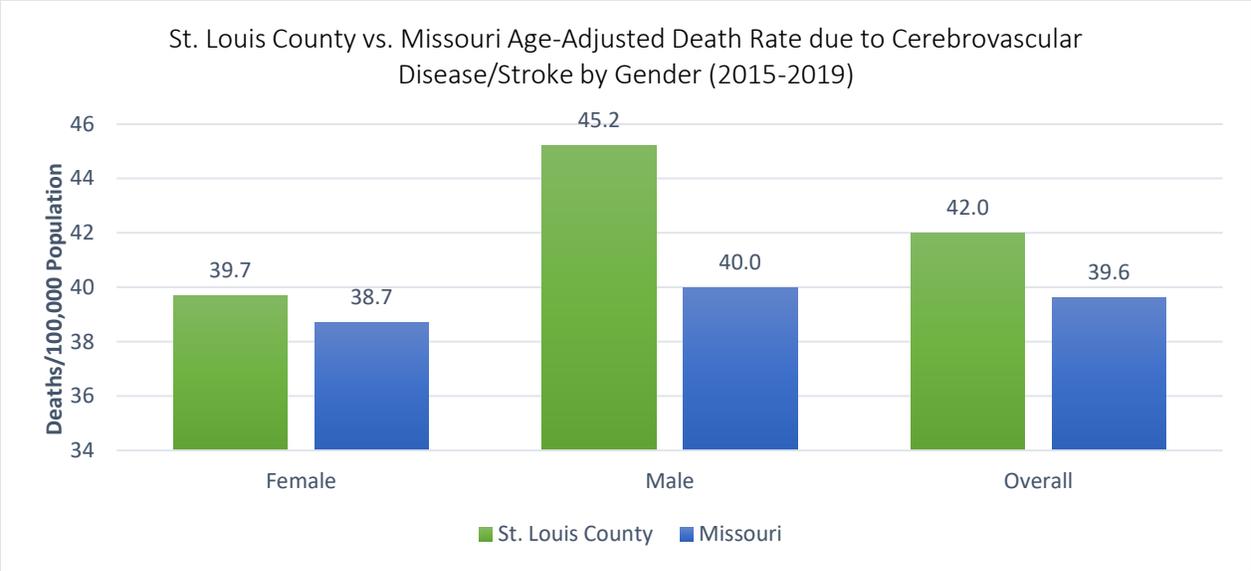
Source: Missouri Department of Health & Senior Services

ST. LOUIS COUNTY VS. MISSOURI HEART DISEASE & STROKE AGE-ADJUSTED RATE BY RACE / ETHNICITY				
	WHITE		AFRICAN AMERICAN	
HEALTH INDICATORS	ST. LOUIS COUNTY	MISSOURI	ST. LOUIS COUNTY	MISSOURI
<b>HEART DISEASE</b>				
Deaths / 100,000 Population(2009-2019)	165.8	190.86	238.48	228.99
Hospitalizations / 10,000 Population (2011-2015)	88.71	102.13	173.23	164.99
Emergency Room Visits / 1,000 Population (2011-2015)	8.47	13.48	25.67	25.7
<b>ISCHEMIC HEART DISEASE</b>				
Deaths / 100,000 Population (2009-2019)	112.5	114.56	160.42	131.74
Hospitalizations / 10,000 Population (2011-2015)	24.19	32.06	35.42	33.04
Emergency Room Visits / 1,000 Population (2011-2015)	0.09	0.59	0.21	0.35
<b>STROKE / OTHER CEREBROVASCULAR DISEASE</b>				
Deaths / 100,000 Population (2009-2019)	36.12	39.53	58.65	55.53
Hospitalizations / 10,000 Population (2011-2015)	24.75	25.66	51.53	44.57
Emergency Room Visits / 1,000 Population (2011-2015)	0.24	0.77	0.65	0.69

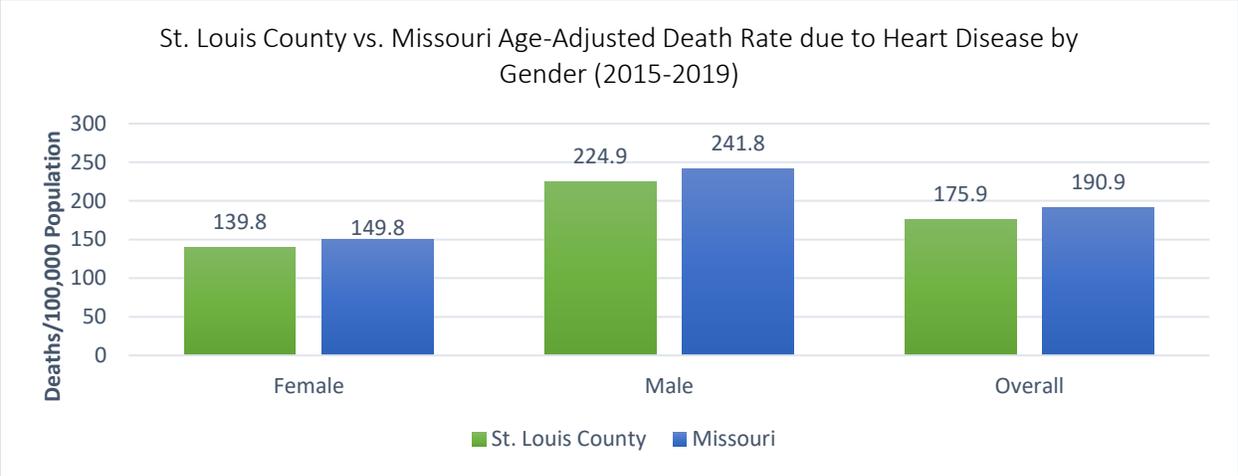
Source: Missouri Department of Health & Senior Services

ST. LOUIS COUNTY VS. MISSOURI HEART DISEASE & STROKE THREE-YEAR MOVING AVERAGE RATES						
	ST. LOUIS COUNTY	MISSOURI	ST. LOUIS COUNTY	MISSOURI	ST. LOUIS COUNTY	MISSOURI
DEATHS / 100,000 POPULATION	2015-2017		2016-2018		2017-2019	
Heart Disease	176.26	193.5	176.62	190.44	175.93	188.49
Ischemic Heart Disease	111.46	108.36	111.16	105.2	109.81	102.31
Stroke / Other Cerebrovascular Disease	41.5	40.65	42.15	39.94	43.1	39
HOSPITALIZATIONS / 10,000 POPULATION	2011-2013		2012-2014		2013-2015	
Heart Disease	113.24	115.58	104.86	108.12	98.17	102.68
Ischemic Heart Disease	28.21	34.89	25.94	31.91	24.53	30.04
Stroke / Other Cerebrovascular Disease	30.84	28.44	29.9	27.47	29.36	27.16
EMERGENCY ROOM VISITS / 1,000 POPULATION	2011-2013		2012-2014		2013-2015	
Heart Disease	12.89	15.25	12.75	15.1	12.52	14.97
Ischemic Heart Disease	0.12	0.6	0.11	0.57	0.11	0.54
Stroke / Other Cerebrovascular Disease	0.33	0.78	0.33	0.76	0.32	0.75

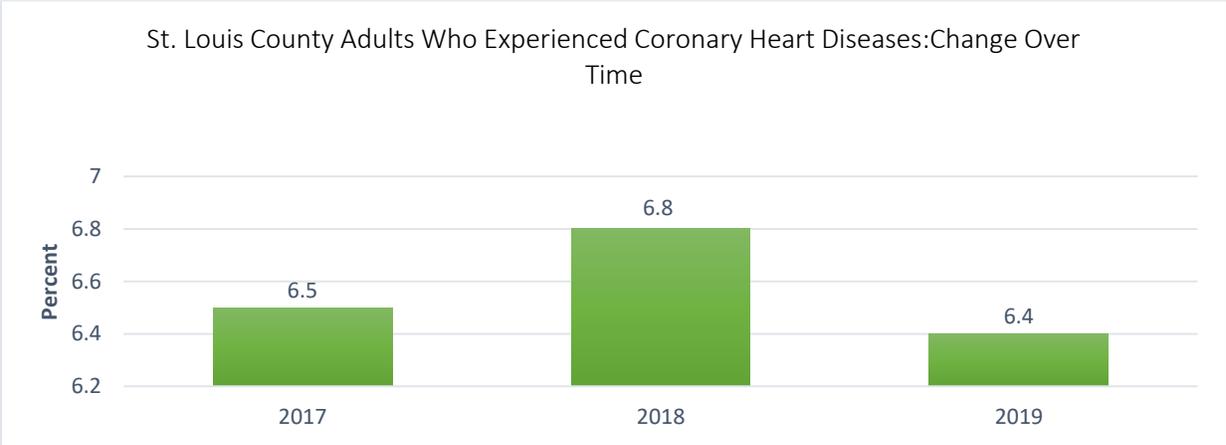
Source: Missouri Department of Health & Senior Services 2011



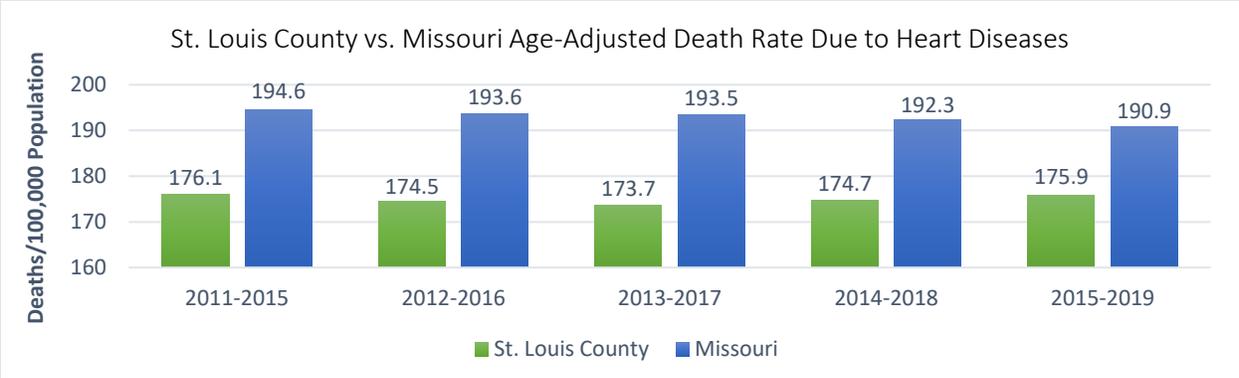
Source: Conduent Healthy Communities Institute



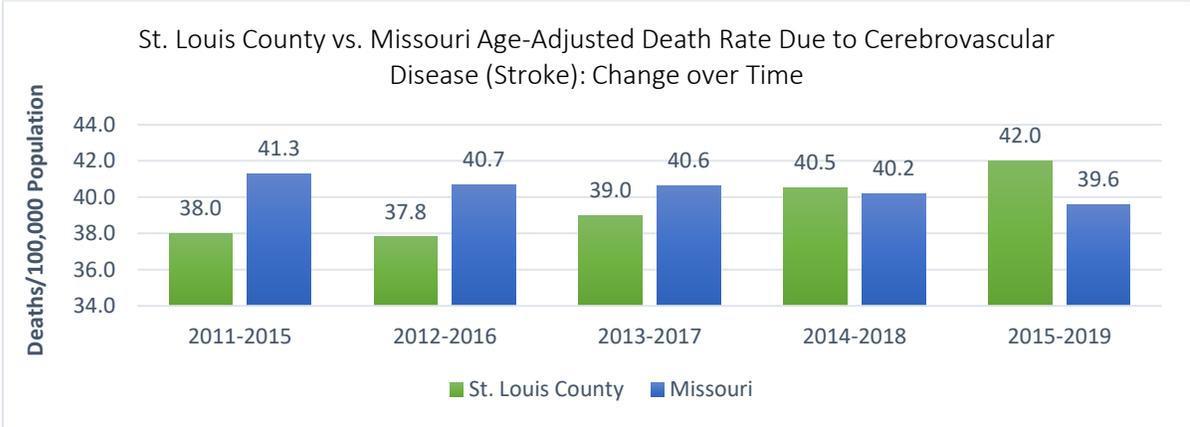
Source: Conduent Healthy Communities Institute



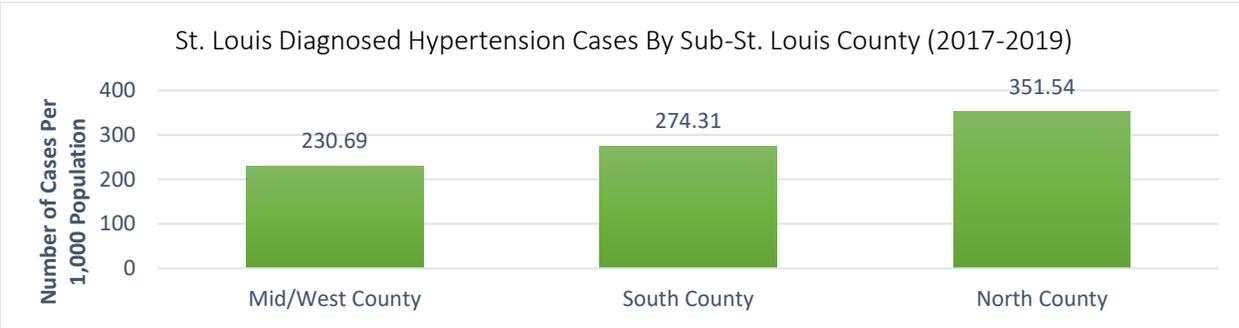
Source: Conduent Healthy Communities Institute



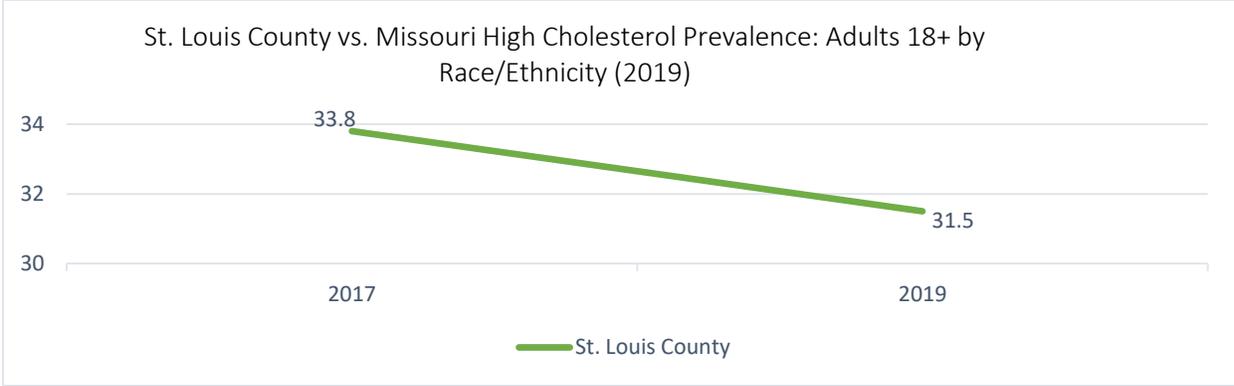
Source: Conduent Healthy Communities Institute



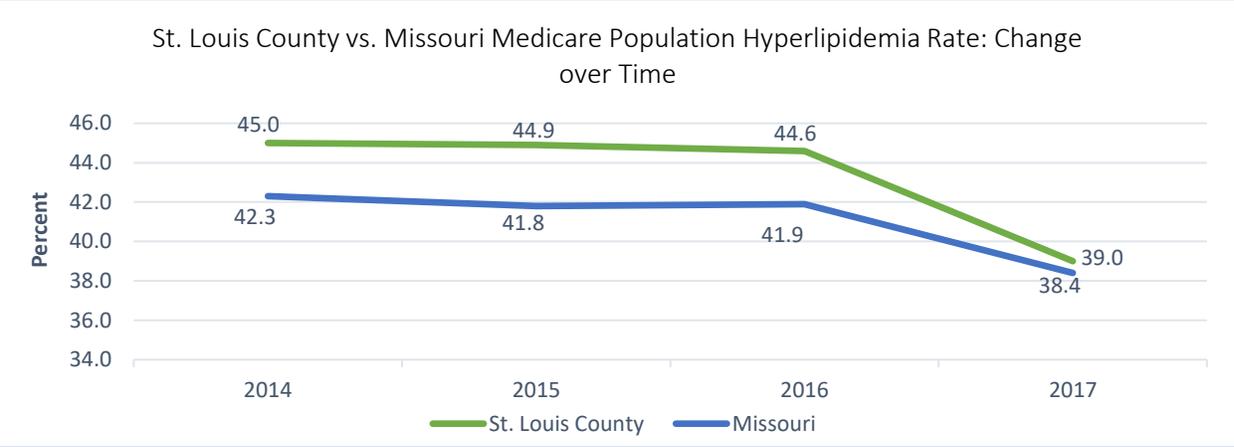
Source: Conduent Healthy Communities Institute



Source: Explore Mo Health

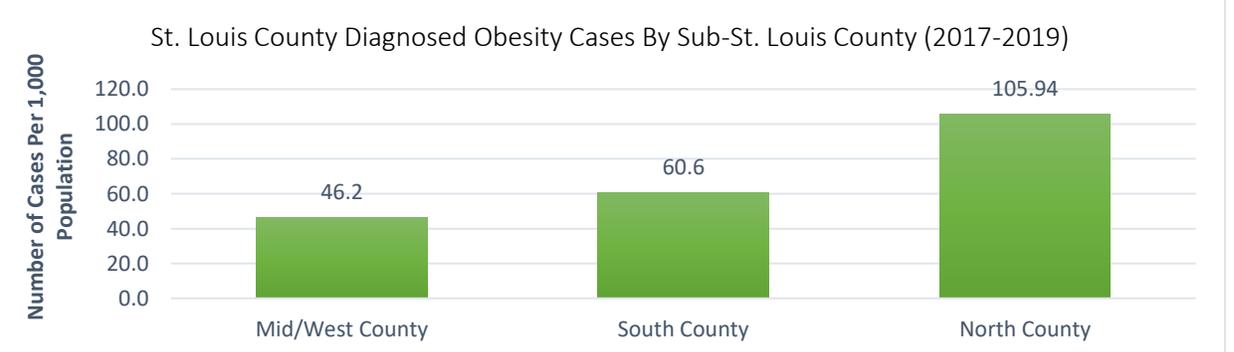


Source: Conduent Healthy Communities Institute

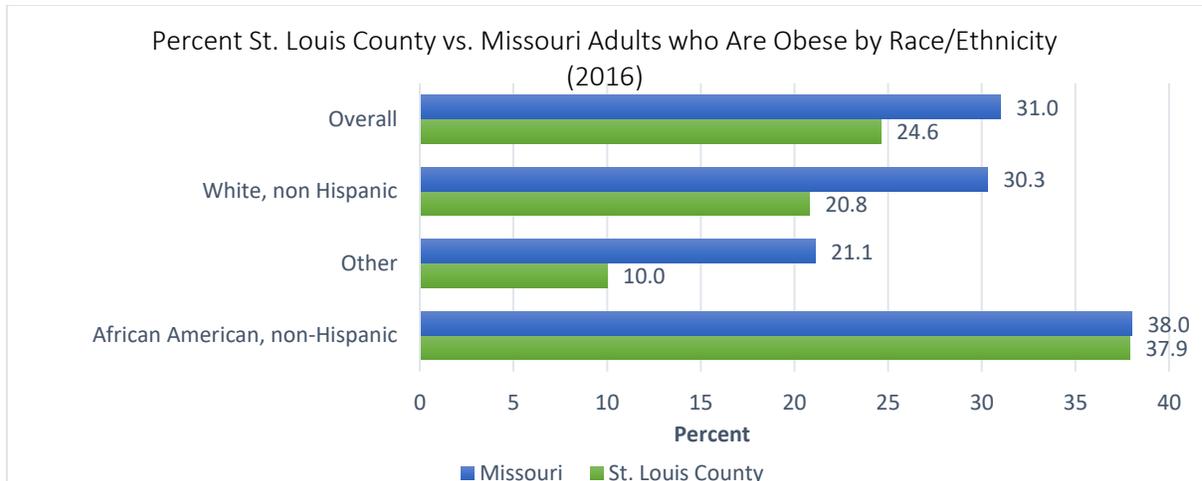


Source: Conduent Healthy Communities Institute

**OBESITY**



Source: Explore Mo Health

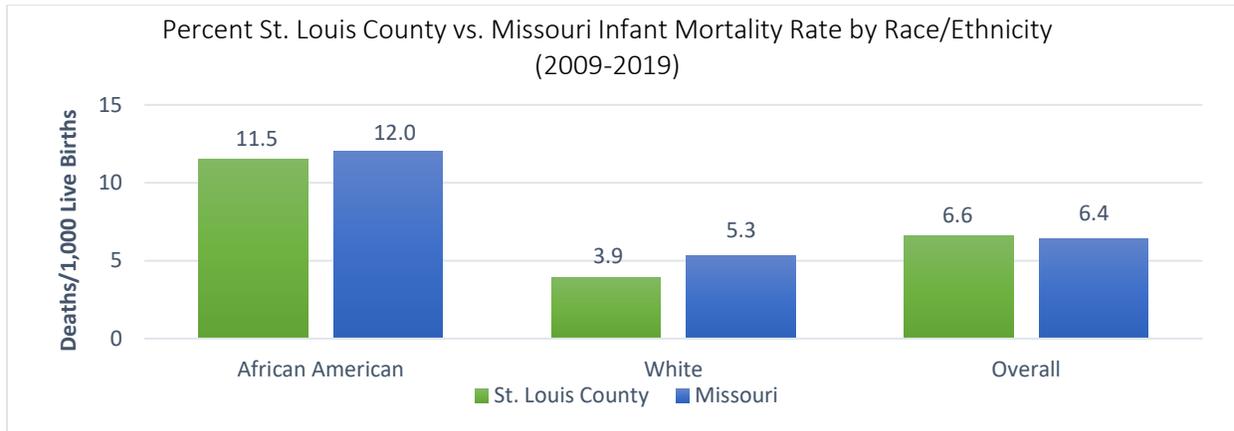


Source: Conduent Healthy Communities Institute

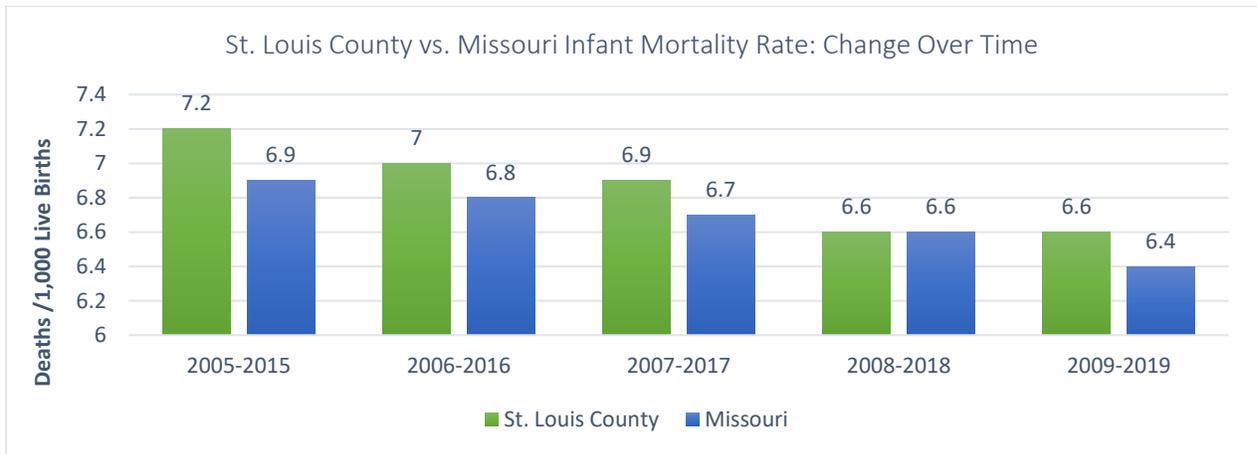
2018 vs. 2019 TOP TEN CITIES IN ST. LOUIS COUNTY WHO EXPERIENCED CORONARY HEART DISEASE (PERCENT)				
RANK	CITIES	YEAR 2018	CITIES	YEAR 2019
1	Wellston	48.9	Wellston	49.6
2	Kinloch	46.2	Kinloch	49.5
3	Velda Village Hills	45.9	Country Club Hills	47.3
4	Pagedale	45.4	Northwoods	47.3
5	Uplands Park	45.4	Hanley Hills	47.0
6	Hanley Hills	45.3	Pine Lawn	46.8
7	Northwoods	45.1	Velda Village Hills	46.8
8	Beverly Hills	45.0	Pagedale	46.5
9	Pine Lawn	45.0	Uplands Park	46.4
10	Velda City	45.0	Moline Acres	46.0

Source: Conduent Healthy Communities Institute

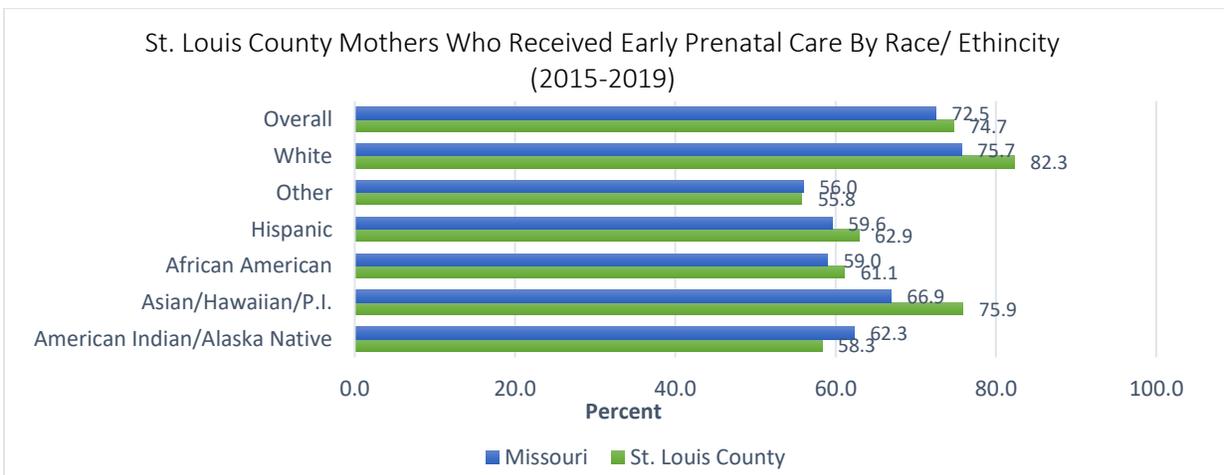
## MATERNAL AND INFANT HEALTH



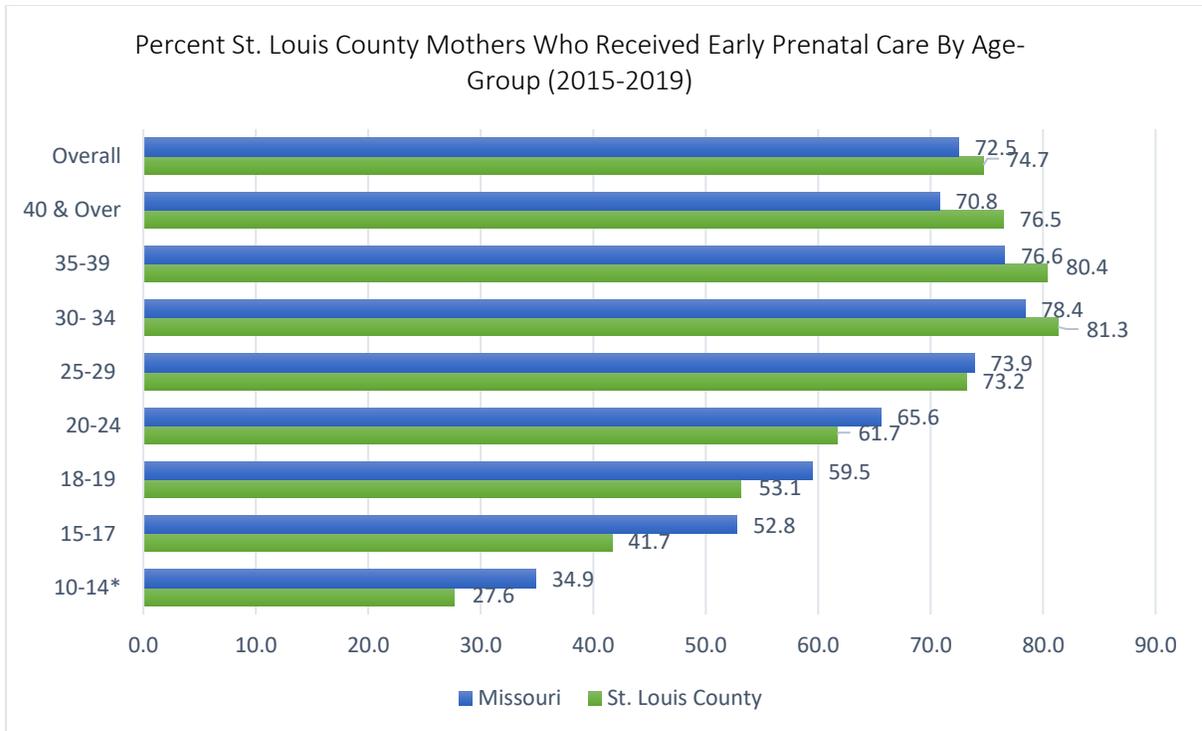
Source: Conduent Healthy Communities Institute



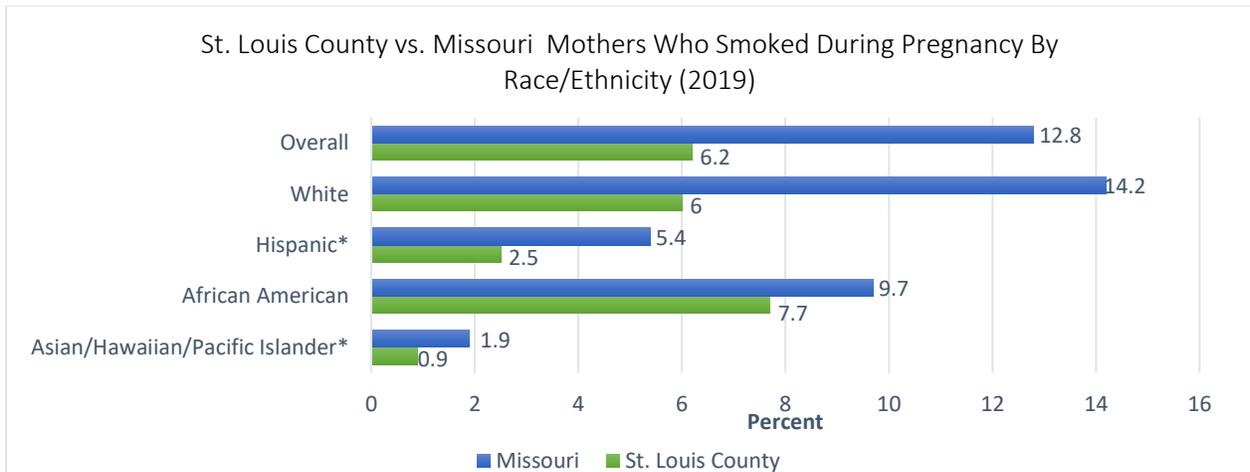
Source: Conduent Healthy Communities Institute



Source: Conduent Healthy Communities Institute

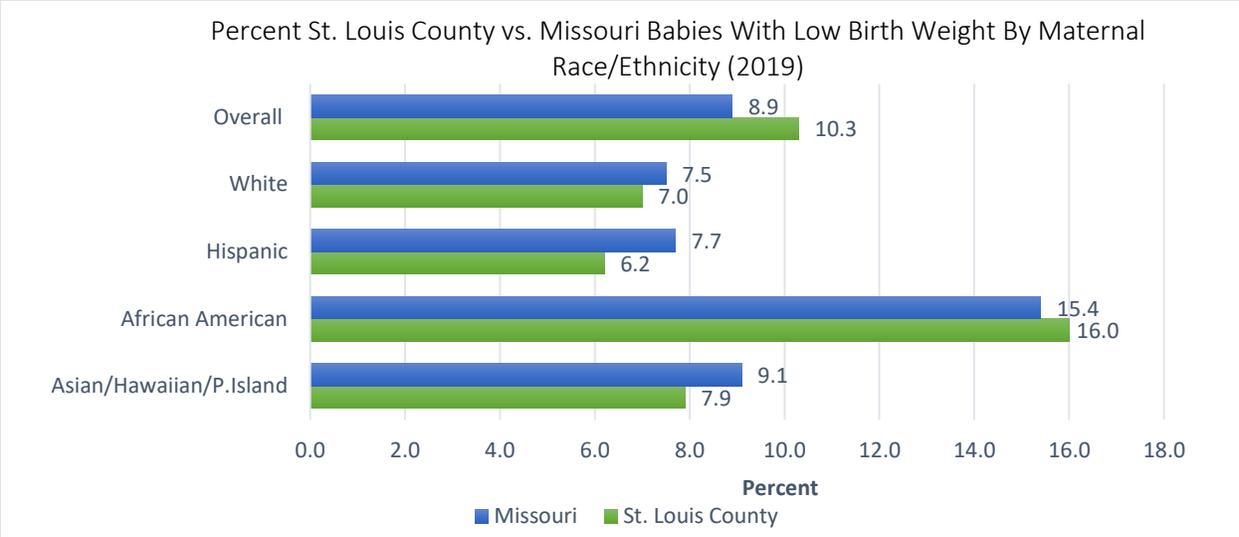


Source: Conduent Healthy Communities Institute

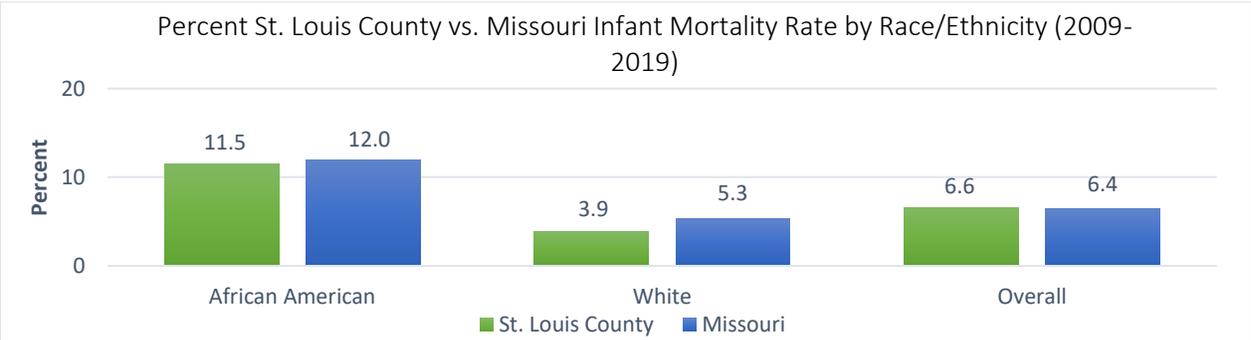


Source: Conduent Healthy Communities Institute

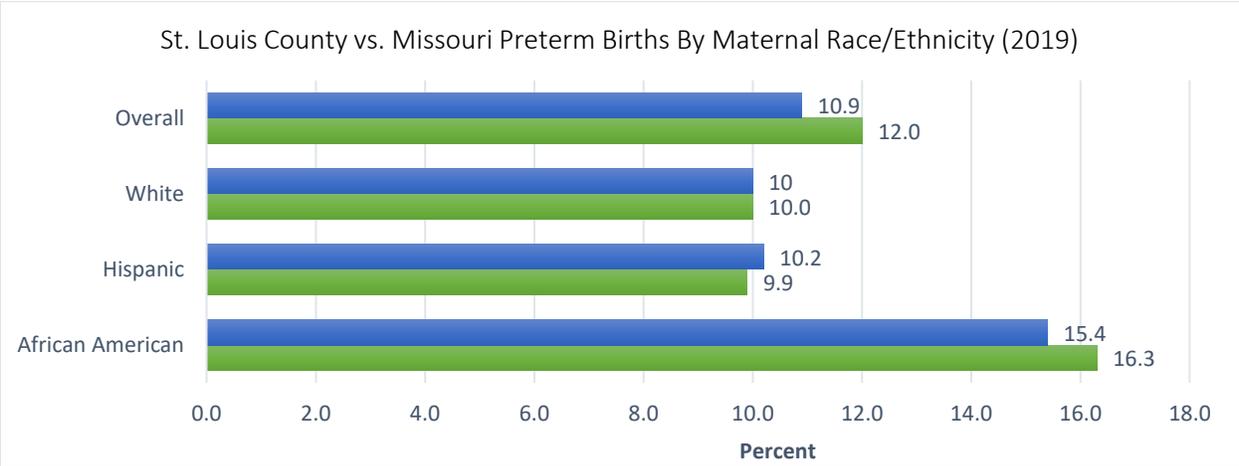
*(Based on the source of the data, value may be statistically unstable and should be interpreted with caution since the number of participants was less than 20)*



Source: Conduent Healthy Communities Institute

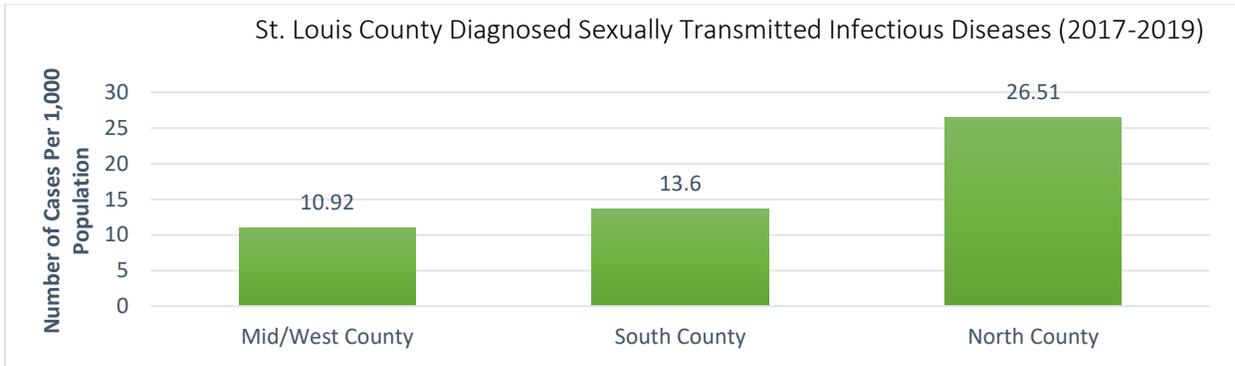


Source: Conduent Healthy Communities Institute

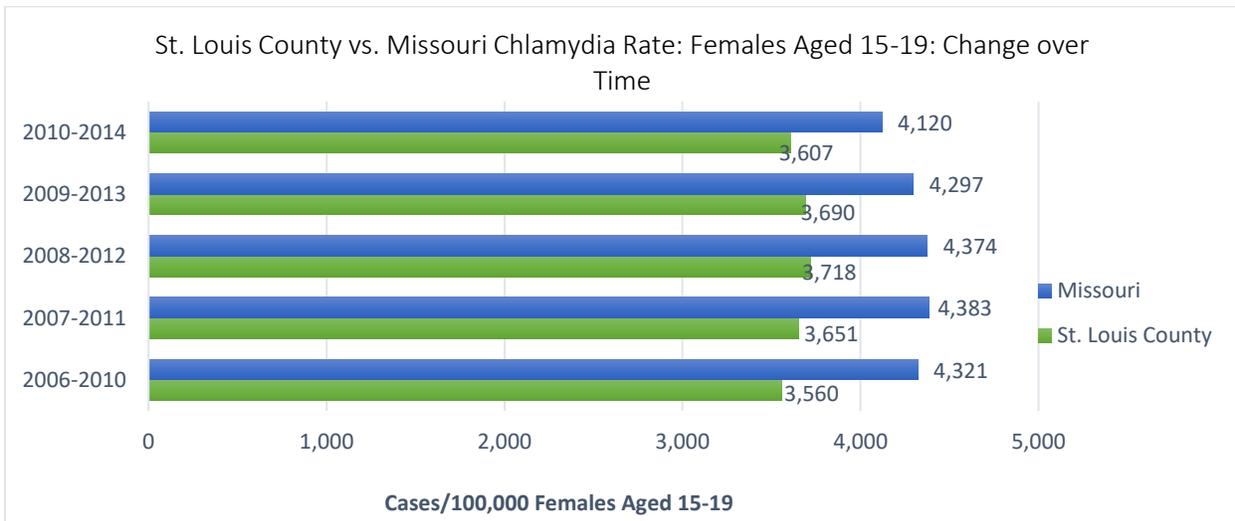


Source: Conduent Healthy Communities Institute

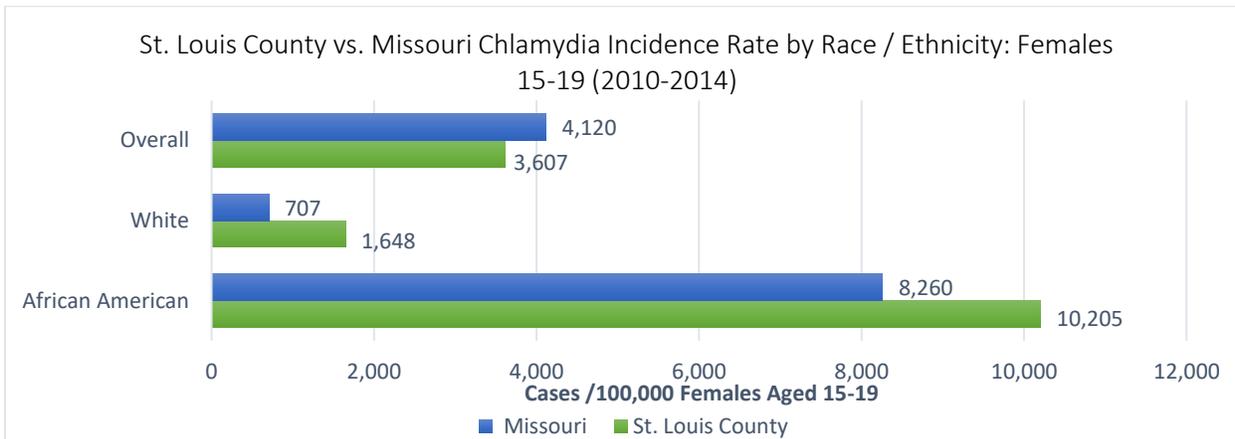
## SEXUALLY TRANSMITTED INFECTIONS



Source: Explore Mo Health

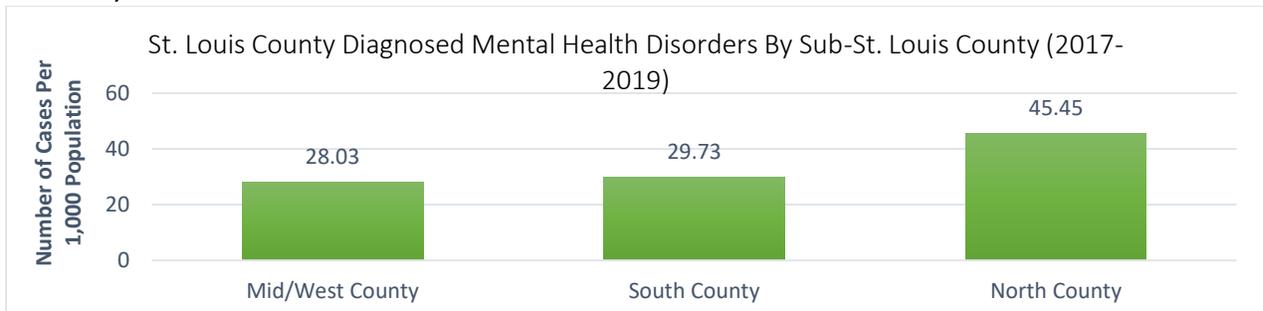


Source: Conduent Healthy Communities Institute



Source: Conduent Healthy Communities Institute

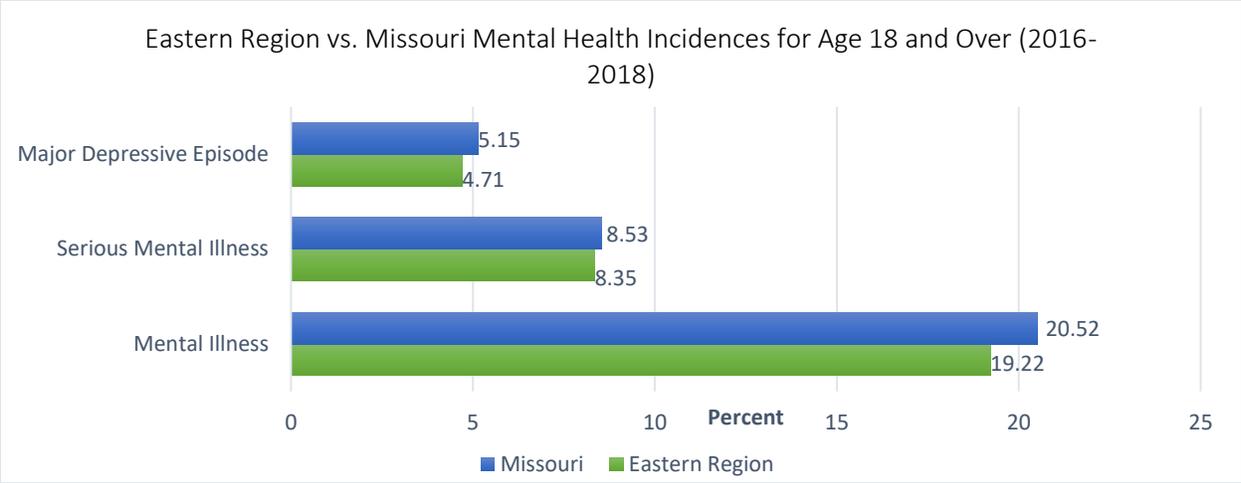
## MENTAL/BEHAVIORAL HEALTH: MENTAL HEALTH



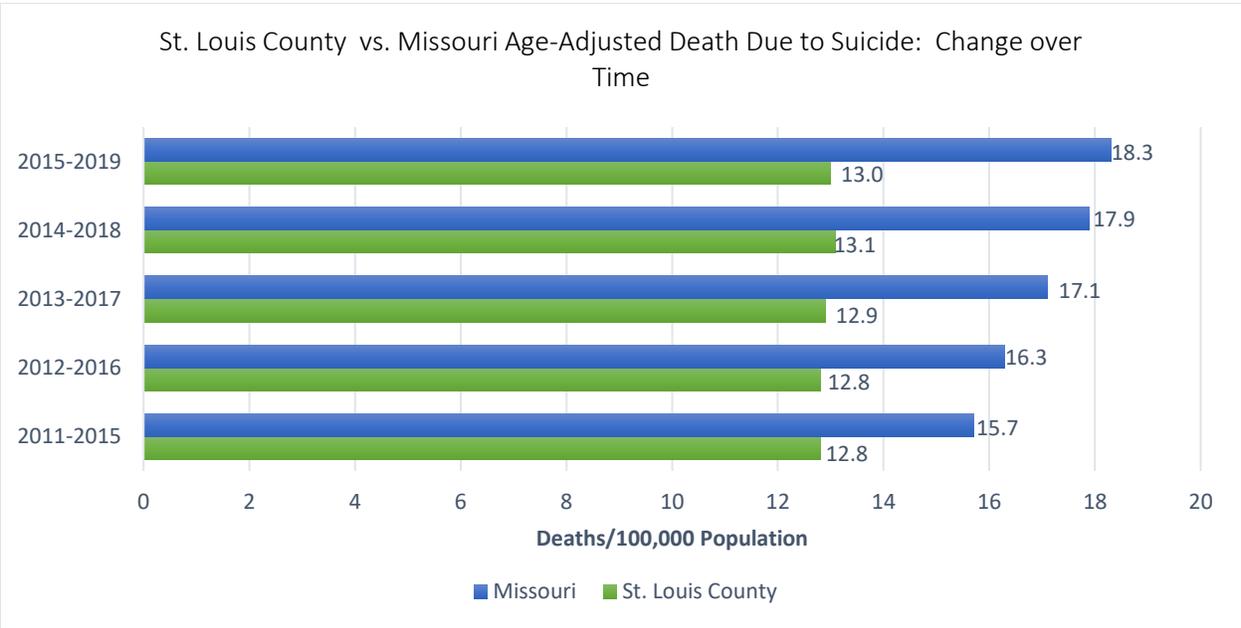
Source: Explore Mo Health

ST. LOUIS COUNTY TOTAL NUMBER OF COMPREHENSIVE PSYCHIATRIC SERVICES BY DIAGNOSISES: CHANGE OVER TIME			
DISORDERS	FY2019	FY2020	FY2021
Anxiety and Fear Disorders	640	1006	1619
Bipolar Mood Disorders	1583	1724	1836
Depression Mood Disorders	2636	3093	3682
Developmental & Age Related Disorders	957	1079	1305
Impulse Control & Conduct Disorders	330	432	481
Personality Disorders	590	665	753
Schizophrenia & Psychotic Disorders	1745	1993	2013
Sexual Disorders	12	11	12
Trauma & Stress Related Disorders	710	986	1380
Other Disorders	51	64	82
Diagnosis Unknown	249	40	34
<b>TOTAL PSYCHIATRIC SERVICE PER YEAR</b>	<b>9503</b>	<b>11093</b>	<b>13197</b>

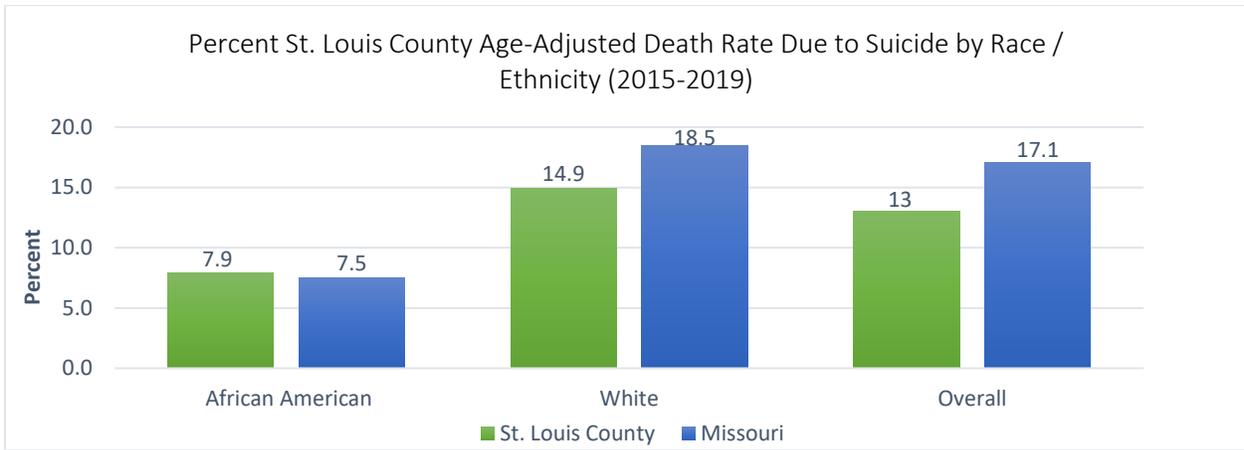
Source: Missouri Department of Mental Health



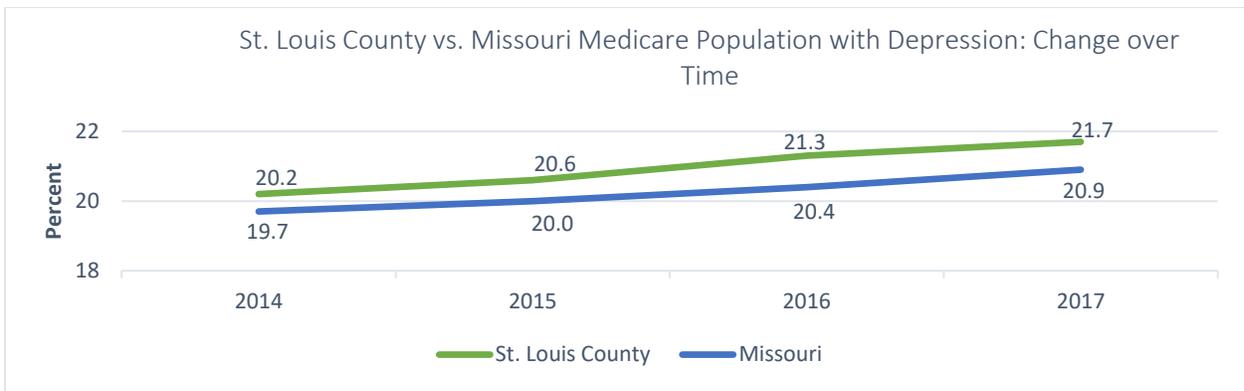
*Source: Missouri Department of Mental Health*



*Source: Conduent Healthy Community Institute*

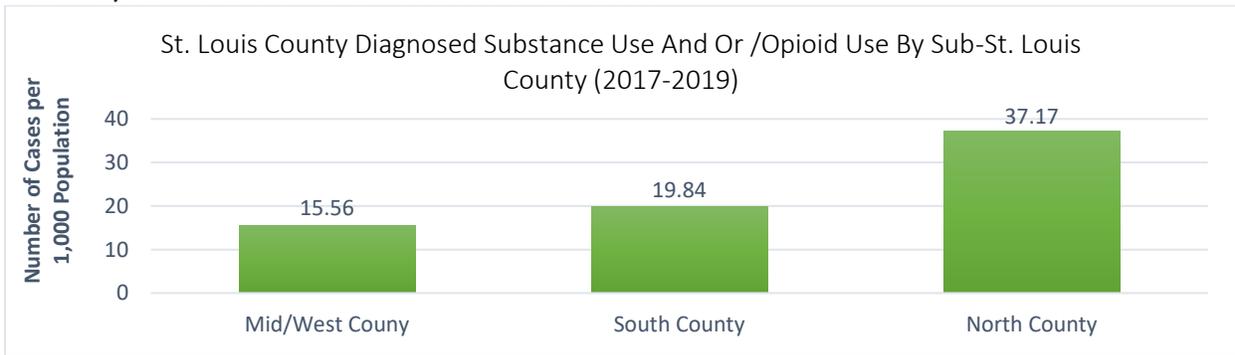


Source: Conduent Healthy Community Institute

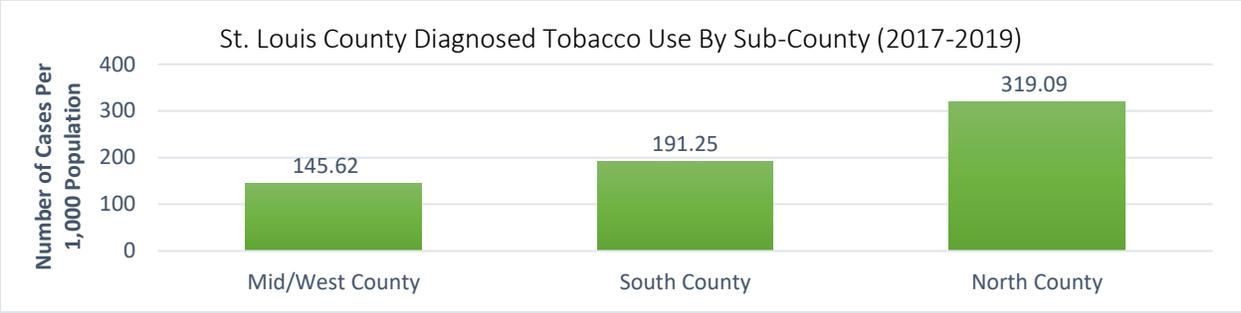


Source: Conduent Healthy Community Institute

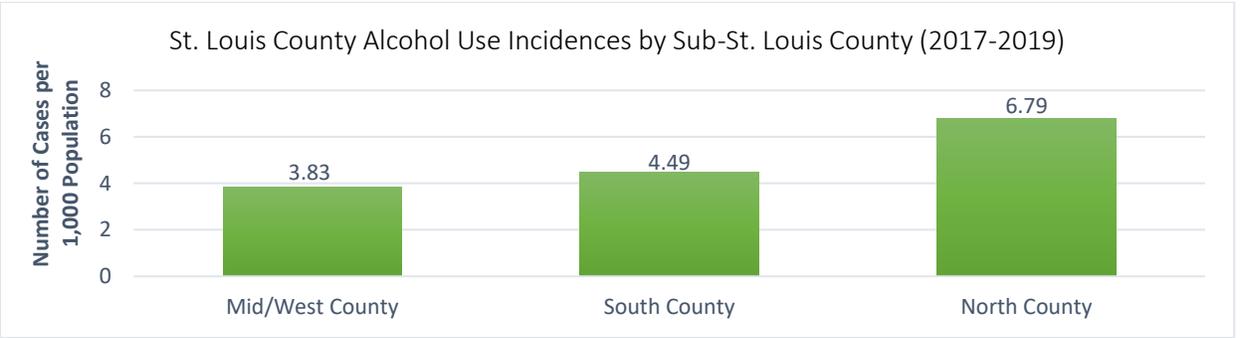
**MENTAL/BEHAVIORAL HEALTH: SUBSTANCE ABUSE**



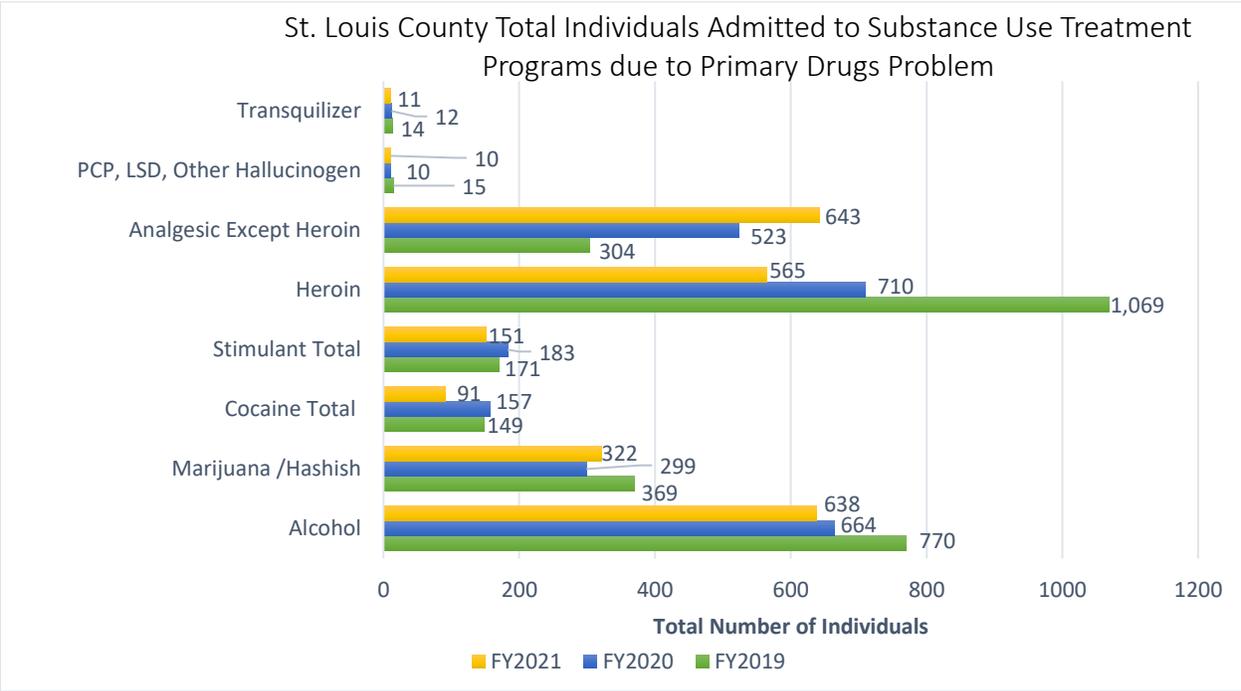
Source: Explore Mo Health



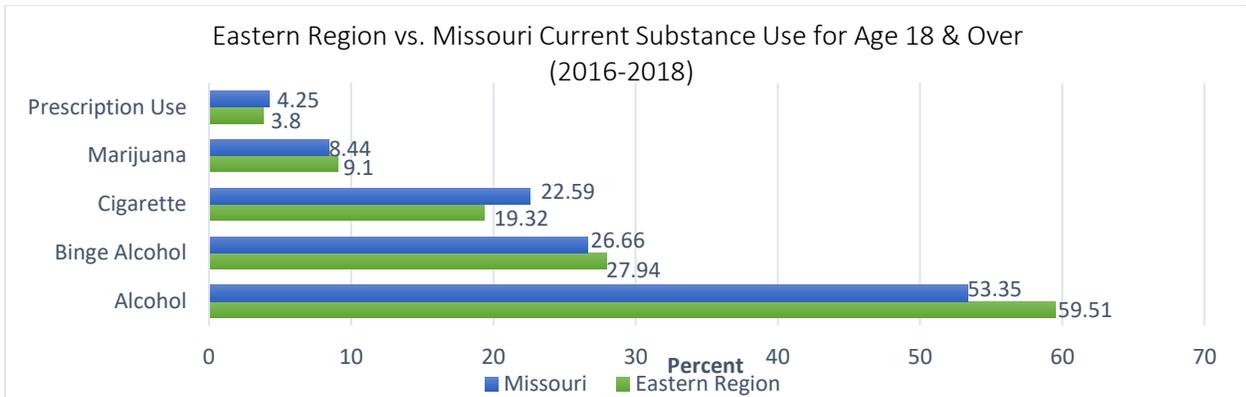
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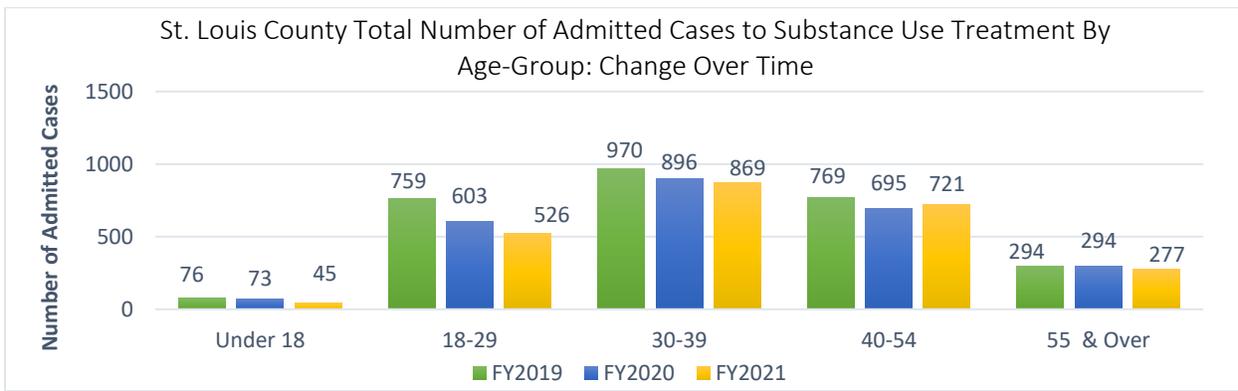
Source: Explore Mo Health



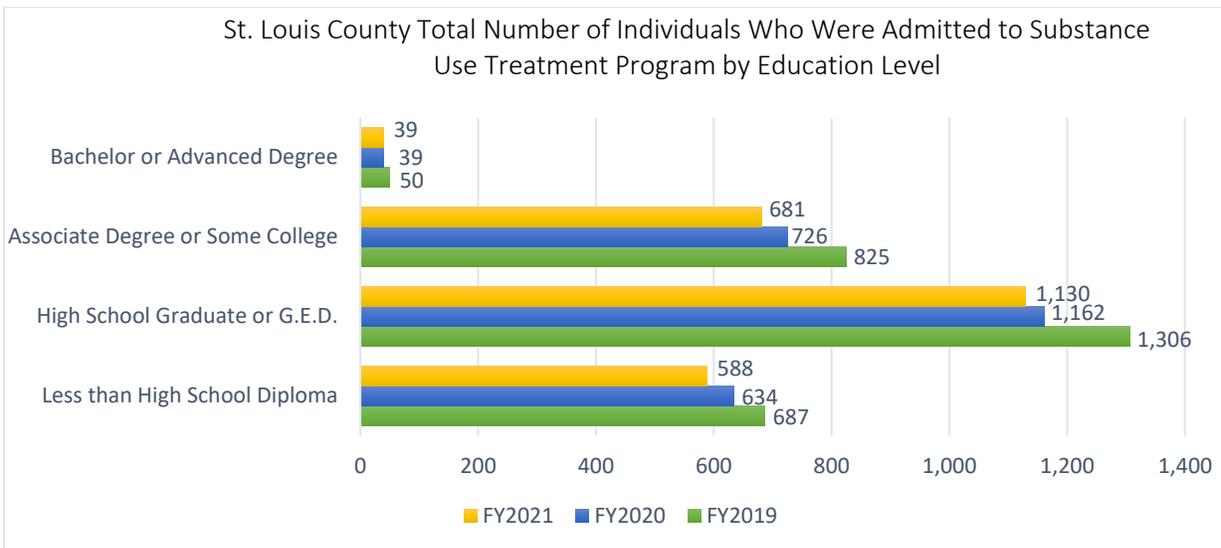
Source: Missouri Department of Mental Health



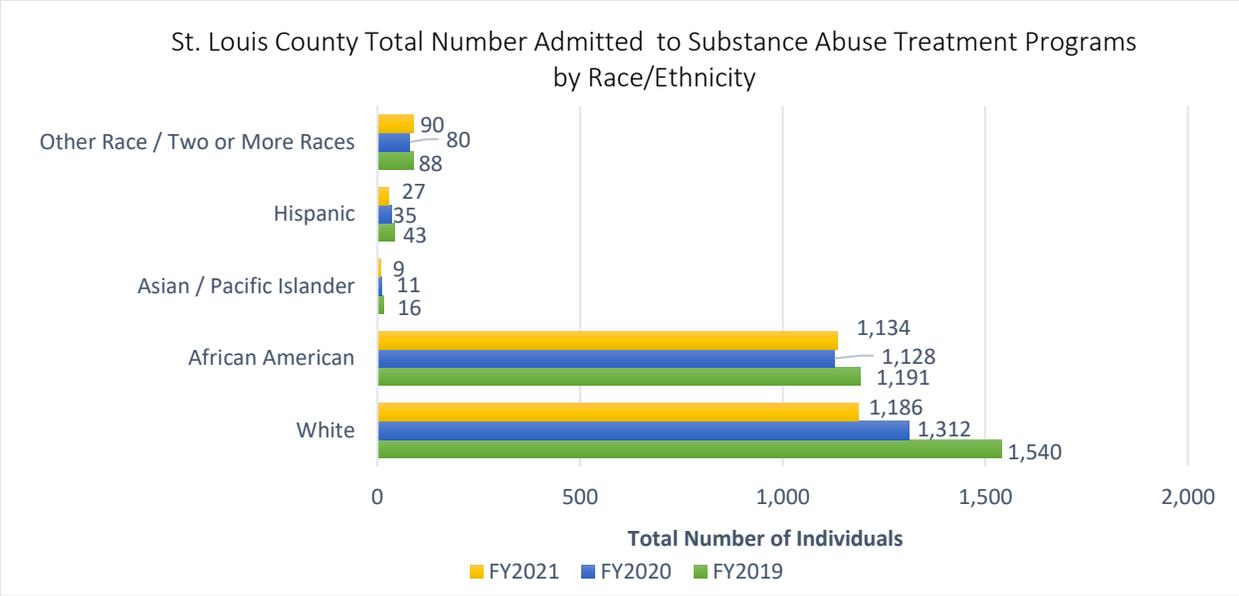
Source: Missouri Department of Mental Health



Source: Missouri Department of Mental Health



Source: Missouri Department of Mental Health



*Source: Missouri Department of Mental Health*

# Implementation Strategy



## Community Health Needs to be Addressed

### CANCER

#### STRATEGY RATIONALE

Cancer is the second leading cause of death in the United States. The cancer death rate has declined in recent decades, but over 600,000 people still die from cancer each year in the United States. Death rates are higher for some cancers and in some racial/ethnic minority groups. These disparities are often linked to social determinants of health, including education, economic status, and access to health care.

Interventions to promote evidence-based cancer screenings — such as screenings for lung, breast, cervical, and colorectal cancer — can help reduce cancer deaths. Therefore, Missouri Baptist Medical Center (MBMC) will focus on promoting evidence-based cancer screening and prevention strategies and on improving care and survivorship for people with cancer.

MBMC will focus their screening and prevention strategy in St. Louis County, where with the new risk assessment tools, patients can identify whether they are high risk and follow up with appropriate enhanced screenings.

**STRATEGY GOAL:** Identify and manage individuals with higher risk for breast, cervical, ovarian, and lung cancers.

**STRATEGY OBJECTIVE I:** Increase the proportion of St. Louis County residents who complete a consultation with a Risk Nurse to assess their Risk of breast cancer by 5% every year starting in 2024 and thereafter.

**STRATEGY OBJECTIVE II:** Increase the proportion of St. Louis County patients with risk cancer who continue with the appropriate referrals for continued screening of breast cancer by 5% annually starting from 2024 and thereafter.

#### BASELINE: 2023 SCREENING DATA

#### STRATEGY ACTION PLAN:

- I. As of October 2022, Missouri Baptist launched a new cancer risk screening program (does this make sense)?
- II. Patients scheduled for a screening mammogram or bone density scan in the MBMC Breast HealthCare Center as well as community members will be invited to enroll in the program
- III. The enrollees will be invited to participate in a digital Cancer IQ Survey to assess their cancer risk.
- IV. Patients who are determined to be at high risk for common cancers will be contacted by MBMC's Risk nurse for enrollment in the Risk program, which will result in appropriate referrals for continued screening of cancers.

**EXPECTED OUTCOME:**

- Increase cancer risk screening throughout St. Louis County
- Improved knowledge and awareness of risk for cancer

**OUTCOME MEASUREMENT:**

- a. Using CancerIQ software, data will be tracked and analyzed to determine if both objectives are met

## Community Health Needs that Will Not be Addressed

### **ACCIDENTS/ INJURIES**

Although not a single priority, MBMC continues to address through our Emergency Department to ensure patients get the care they need and by providing ongoing education through communication channels to help prevent injuries.

### **ALCOHOL ABUSE AND DRUG ABUSE**

MBMC does not have resources or deep expertise to address these issues. There are several organizations and counselors in the region who address alcohol and drug abuse. While not a single priority, MBMC provides inpatient care to patients with alcohol and drug withdrawal.

### **DENTAL CARE**

MBMC does not provide dental services. There are many dentists in the region who provide dental care to patients.

### **DIABETES**

Although not a single priority, MBMC continues to address through our outpatient and inpatient nutrition services, diabetes coordinator and various health education events and initiatives.

### **HEART HEALTH**

Heart health is an important issue to MBMC. From primary care, emergency services, cardiology, electrophysiology and cardiothoracic surgery, our team cares for heart patients every day. We are certified by the American Heart Association for our treatment of STEMIs (heart attacks), we are part of the BJC aortic dissection network, and our heart surgery program is regularly ranked among the top in the country. Through health screenings, events, and content shared through our communication and marketing channels, we help educate and empower our community on heart health.

### **HIGH BLOOD PRESSURE**

MBMC and our providers focus on treatment and causes of high blood pressure when assessing patients. MBMC conducts health screenings where blood pressure is tracked and if it is high, patients are educated and referred to a primary care provider to address their health issue.

### **IMMUNIZATIONS/ INFECTIOUS DISEASES**

Although not a single priority, MBMC educates our community on the importance of immunizations and disease prevention measures through various communication channels. Additionally, we provide immunization clinics for our employees.

### **OBESITY**

Although not a single priority, MBMC continues to address through community outreach, sharing healthy recipes and focusing on healthy lifestyle through our inpatient and outpatient nutrition counseling and physical therapy programs.

## **REPRODUCTIVE/ SEXUAL HEALTH**

The hospital's OB/GYN providers educate patients on reproductive and sexual health.

## **RESPIRATORY DISEASES**

MBMC offers comprehensive pulmonary services specializing in treating complications of the lungs and respiratory tract. Additionally, MBMC has one of the largest lung cancer screening programs in the region which helps to detect cancer at its earliest and most treatable stage.

## **STROKE**

MBMC is certified in treating strokes by the American Heart and Stroke Association. Our stroke team provides education and outreach to the community at events. We share content and education through communication and marketing channels. In addition to emergency and inpatient care, we've also piloted a program for stroke survivors and their caregivers to help them thrive post-stroke.

## **VAPING**

While vaping is not listed as one of the hospital's focus areas, MBMC addresses smoking, tobacco use, and vaping with each person (when applicable) participating in health screening events and through our primary care physicians.

## **BEHAVIORAL/MENTAL HEALTH: ALCOHOL/SUBSTANCE ABUSE**

MBMC does not have an inpatient mental health or rehabilitation unit and is not directly involved with community education focusing on this topic. Although the hospital does not have the resources to provide this service, referrals can be made to other centers that offer these services.

## **BEHAVIORAL/MENTAL HEALTH: MENTAL HEALTH**

MBMC does not have an inpatient mental health unit and is not directly involved with community education focusing on mental health and depression. Although the hospital does not have the resources to provide this service, referrals can be made to BJC Behavioral Health and other centers that offer these services.

## **MATERNAL AND INFANT HEALTH**

The hospital's Childbirth Center will continue to address the issue of maternal and infant health, and the racial disparities experienced by black mothers in our region by working with new moms who deliver at the hospital and through childbirth and parenting classes including classes on safe sleep as well as ongoing staff training.

## **TOBACCO USE**

While tobacco use is not listed as one of the hospital's focus areas, MBMC addresses smoking and tobacco use (including e-cigarettes) with each person (when applicable) participating in health screening events. Education regarding the effects of smoking and the benefits of quitting are reviewed along with the Missouri Quit Now number: 1-866-784-8669. MBMC also has a Lung Cancer Screening program for those who qualify.