Adventist Health
St. Helena

Adventist Health
Vallejo

2019

Adventist Health St. Helena
Adventist Health Vallejo
Community Health Needs Assessment

2019 Community Health Needs Assessment

Adventist Health St. Helena and
Adventist Health Vallejo

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Executive Summary

Empowering our Communities

Adventist Health St. Helena (AHSH) and Adventist Health Vallejo (AHV) would like to thank you for the opportunity to work with our communities to conduct a formal Community Health Needs Assessment to acquire knowledge of the pressing health needs, identify community assets, and hear from all members of the community. This CHNA will help us develop strategies to address the priority needs of the communities we serve. The goals of this assessment are to:

- Engage public health and community stakeholders, including low-income, minority and other under served populations.
- Assess and understand the community's health issues and needs.
- Understand the health behaviors, risk factors and social determinants that impact health.
- Identify community resources and collaborate with community partners to develop collective strategies.
- Use findings to develop and implement a Community Health Plan (implementation strategy) based on the hospital's prioritized issues.

Partnering with our Communities for Better Health

While conducting the CHNA, we solicited feedback and input from a broad range of stakeholders. Contributors to our CHNA process included:

- Abode Services
- Napa Valley Unified School District - St. Helena School District
- Rianda House
- Up Valley Family Centers

Data Sources

Primary and secondary data sources are included in this report. A significant portion of the data for this assessment was collected through reports generated through CARES Engagement Network CHNA (https://engagementnetwork.org/assessment/). Other sources include California Department of Public Health, County Health Rankings & Road maps, and California Environmental Protection Agency's Office of Environmental Health Hazard Assessment. When feasible, health metrics have been further compared to estimates for the state or national benchmarks, such as the Healthy People 2020 objectives.

Adventist Health St. Helena and Adventist Health Vallejo worked to identify relevant key informants and topical focus groups to gather more insightful data and aid in describing the community. Key informants and focus groups were purposefully chosen to represent medically under-served, low-income, or minority populations in our community, to better direct our investments and form partnerships. All limitations inherent in these sources remain present for this assessment. Results of the qualitative analysis, as well as a description of participants, can be found in Appendix D.

Top Priorities Identified in Partnership with our Communities

On September 24, 2019, HC2 Strategies, Inc. facilitated a strategy meeting with the Adventist Health St. Helena Mission Integration Sub Committee to review the results of the CHNA and determine the top 4 priority needs that the hospital will address over the next three years. To aid in determining the priority health needs, the Mission Integration Sub Committee, that includes community leaders, agreed on the criteria below to consider when making a decision. The criteria listed recognize the need for a combination of information types (e.g., health indicators and primary data) as well as consideration of issues such as practicality, feasibility, and mission alignment.

- Addresses disparities of subgroups
- Availability of evidence or practice-based approaches
- Community assets and internal resources for addressing needs
- Feasibility of intervention
- Identified community need
- Importance to community
- Magnitude
- Mission alignment and resources of hospitals
- Opportunity for partnership
- Opportunity to intervene at population level
- Severity
- Solution could impact multiple problems

Mental and Behavioral Health

- Anxiety
- Stress
- Depression
- Substance Abuse

Access to Healthcare

- Access to providers - including specialist, dentist, optometrist
- Affordable insurance

Chronic Diseases

- Obesity
- Diabetes
- Cancer

Housing and Homelessness

Acknowledgments

This report was made possible through the leadership of Adventist Health St. Helena (AHSH) located in St. Helena, California as part of Adventist Health (https://www.adventisthealth.org/). Under the leadership of Ms. Karla Newton, she collaborated with Ms. Laura Acosta of HC2 Strategies, Inc. to conduct key informant interviews, focus groups, and establish priority health needs for the 2019-2022 community health needs assessment cycle.

The analysis method and rankings were invaluable in providing “at a glance” information for informed decision making. A significant portion of the data for this assessment was collected through reports generated through CARES Engagement Network CHNA (https:// engagementnetwork.org/assessment/). Other sources include California Department of Public Health, County Health Rankings & Road maps, and California Environmental Protection Agency’s Office of Environmental Health Hazard Assessment. When feasible, health metrics have been further compared to estimates for the state or national benchmarks, such as the Healthy People 2020 objectives.

Finally, we would like to thank our community members, organizations and all those who gave input for this report through key informant interviews and focus groups. Their perspectives ensure that we are taking into consideration the most vulnerable in our communities to better create initiatives, more meaningful partnerships, and strategic investments into our communities.

Letter from President

Dear Friends and Colleagues,

As President of Adventist Health St. Helena, I am pleased to share our Community Health Needs Assessment with you. Working together, investing deeply and strategically in the work of whole-person health improvement, evaluation must be a top priority.

Studies tell us that health education, the conditions in which people live, learn, work and age will affect their health. Social determinants such as housing, literacy, early childhood experiences, income and social support among others can influence our residents' lifelong health and well-being for generations to come.

Improving community health requires expertise and engagement that goes beyond traditional medical care provided on a hospital campus. It requires the wisdom and collaboration of a multitude of disciplines joining forces, working together, to develop and execute impactful strategies in order to ensure that our community health interventions are sustainable.

The 2019 Community Health Needs Assessment was conducted in partnership with community organizations through rigorous assessment, community and stakeholder perspectives and data analysis, to provide insight to the health of our community. This process has helped us identify areas where we can work together with our partners to achieve better health outcomes in our region.

We invite you to join us in implementing solutions to improve our community health and continue to build a sustainable, healthy community improving the life of everyone in Napa County.

Steven Herber, MD
President

Introduction

The Community Health Needs Assessment (CHNA) represents our commitment to improving health outcomes in our community through rigorous assessment of health status in our market, incorporation of stakeholder's perspectives, and adoption of related implementation strategies to address priority health needs. The CHNA is conducted not only to partner for improved health outcomes but also to satisfy our annual community benefit obligations by meeting requirements that are outlined in section 501(r)(3) of the Federal IRS Code, as well as, under the Affordable Care Act of 2010. The goals of this assessment are to:

- Engage public health and community stakeholders including low-income, minority and other under served populations
- Assess and understand the community's health issues and needs
- Understand the health behaviors, risk factors and social determinants that impact health
- Identify community resources and collaborate with community partners
- Use Assessment findings to develop and implement a Community Health Plan (implementation strategy) based on the Hospital's prioritized issues.

Adventist Health Overview

Adventist Health St. Helena and Adventist Health Vallejo are affiliates of Adventist Health, a faith-based, nonprofit integrated health system serving more than 80 communities on the West Coast and Hawaii. Community has always been at the center of Adventist Health's mission. Founded on Seventh-day Adventist heritage and values, Adventist Health provides compassionate community care. Adventist Health entities include:

- 20 hospitals with more than 3,200 beds
- More than 280 clinics (hospital-based, rural health and physician clinics)
- 13 home care agencies and seven hospice agencies
- Four joint-venture retirement centers
- Compassionate and talented team of 35,000 associates, medical staff physicians, allied health professionals and volunteers

We owe much of our heritage and organizational success to the Seventh-day Adventist Church, which has long been a promoter of prevention and whole person care. Inspired by our belief in the loving and healing power of Jesus Christ, we aim to bring physical, mental and spiritual health and healing to our neighbors of all faiths. Every individual, regardless of his/her personal beliefs, is welcome in our facilities. We are also eager to collaborate with members of other faiths to enhance the health of the communities we serve.

Our commitment to quality health care stems from our heritage, which dates back to 1866 when the first Seventh-day Adventist health care facility opened in Battle Creek, Michigan. There, dedicated pioneers promoted the "radical" concepts of proper nutrition, exercise and sanitation. Early on, the facility was devoted to prevention as well as healing. They called it a sanitarium, a place where patients—and their families—could learn to be well.

More than a century later, the health care system sponsored by the Seventh-day Adventist Church circles the globe with more than 170 hospitals and more than 500 clinics, nursing homes and dispensaries worldwide. And the same vision to treat the whole person—mind, body and spirit—continues to provide the foundation for our progressive approach to health care.

Hospital Identifying Information

Mailing Address: 10 Woodland Road, St. Helena, CA 94574

Contact Information: Karla Newton, 707-967-7512

Website: adventisthealth.org/st-helena/

St. Helena is a 151-bed full-service, nonprofit, community hospital renowned for excellence in cardiac care and a holistic approach to healing. Offering expertly skilled doctors, the latest medical technology and highly-trained staff, Adventist Health St. Helena serves as a regional center for cancer care, cardiac services, orthopedics, general surgery, obstetrics, plastic and reconstructive surgery, sleep disorders, home care and women's services. A comprehensive range of acute care, behavioral health and wellness programs draw patients from the San Francisco Bay Area and beyond.

Healthcare facilities and services that can respond to the health needs of the community include:

- Adventist Heart & Vascular Institute – Hidden Valley Lake, St. Helena
- Behavioral Health (Adventist Health Vallejo)
- Coon Joint Replacement Institute – St. Helena
- Lifestyle Medicine Institute – Lifestyle Medicine – St. Helena
- St. Helena Medical Specialties Family Practice – St. Helena
- St. Helena Medical Specialties Family Practice and Psychology – Calistoga
- St. Helena Medical Specialties General Surgery – St. Helena
- St. Helena Medical Specialties Nephrology/Internal Medicine/Neurology – St. Helena
- St. Helena Women's Center – OB/GYN - St. Helena & Napa
- St. Helena Medical Specialties Orthopedics – St. Helena
- St. Helena Medical Specialties Plastic Surgery – St. Helena
- St. Helena Medical Specialties – Pulmonology and Gastroenterology – St. Helena

Adventist Health Vallejo

Mailing Address: 525 Oregon Street, Vallejo, CA 94590

Contact Information: 707-648-2200

Website: adventisthealth.org/vallejo/

The Adventist Health Vallejo Center for Behavioral Health offers a range of behavioral health services in Vallejo, California. Our campus is a freestanding 61-bed facility offering short-term psychiatric care for children, adolescents and adults. We also offer partial hospitalization programs for adults. In addition, we offer a 32-bed unit at Adventist Health St. Helena which provides in-patient adult and senior mental health services as well.

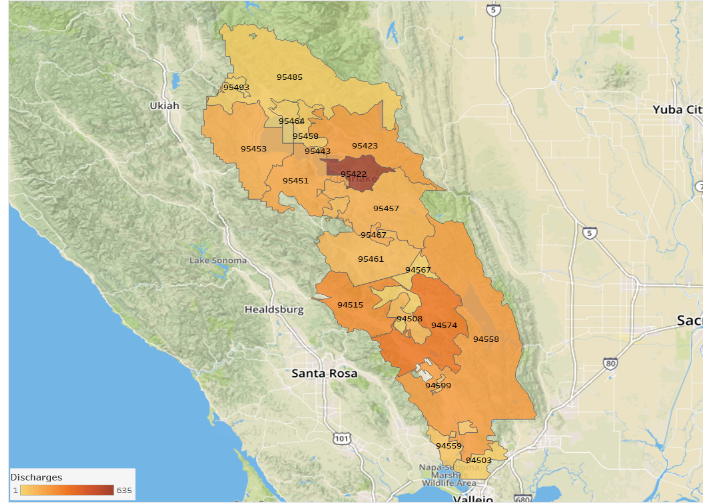
Treatments include::

- Adult In-Patient Services- Active therapeutic program includes psychotherapy groups, educational groups, and treatment. Group therapy focuses on developing social, communication and daily living skills. The program also includes physical activities and exercise.
- Child/Adolescent Mental Health Services – There are separate age-specific areas for 3 to 12-year-olds and 13 to 18- year-olds. The program features safe, nurturing environments with age appropriate staff supervision, comprehensive clinical care, a gym and play area, and education groups, which help to develop social and communication skills, family group meetings and therapy sessions.
- Intensive Outpatient Program – Utilizing a team approach which includes psychiatrists, nurses, therapists and social workers, the program includes individual and group psychotherapy, medication management, coping skills and individual skill building.
- Partial Hospitalization – The program is offered five days per week for six hours per day over the course of four to six weeks. It includes individual and group psychotherapy, family therapy, medication management and education groups. The objective is to increase level of function and help patients gain new skills for interaction, communication and other daily living activities.

- Senior Mental Health Services – The senior mental health program provides comprehensive, quality geriatric inpatient treatment for individuals 55 years of age or older. Services include 24-hour behavioral health monitoring and supervision, behavioral health diagnostic assessment and evaluation, medication stabilization and management, individual and group therapy, recreational therapy and individual and group patient and family education.

Community Profile

Adventist Health St. Helena (AHSH) resides in the City of St. Helena in Napa County. Napa County is located northern California. Napa County is north of San Francisco and encompasses approximately 748 square miles in the North Bay region of California. Napa County is known for hundreds of hillside vineyards in the Napa Valley wine region. St. Helena is known as Napa Valley's Main Street. It is centrally located in the heart of agricultural and tourism industry. Adventist Health St. Helena is located two miles north of St. Helena in the Napa Valley.



St. Helena serves Lake and Napa Counties. The primary service area (PSA) and secondary service area (PSA) are comprised as:

Primary Service Area (PSA)				
	Zip Code	**Discharges**	**City**	**County**
1	95422	635	Clearlake	Lake Couty
2	94574	315	St. Helena	Napa County
3	94515	244	Calistoga	Napa County
4	95423	191	Clearlake	Lake Couty
5	95451	155	Kelesyville	Lake Couty
6	95467	140	Hidden Valley	Lake Couty
7	95457	123	Hidden Valley	Lake Couty
8	94508	105	Angwin	Napa County
9	95461	92	Harbin Springs	Lake Couty
10	94599	87	Yountville	Napa County
11	94567	18	Pope Valley	Napa County

Primary Service Area (PSA)				
	Zip Code	**Discharges**	**City**	**County**
12	94576	8	Deer Park	Napa County
13	95443	5	Glenhaven	Lake Couty

Secondary Service Area (SSA)				
	Zip Code	**Discharges**	**City**	**County**
14	94558	191	Napa	Napa County
15	95453	129	Lakeport	Lake Couty
16	94559	57	Napa	Napa County
17	95458	47	Bartlett Springs	Lake Couty
18	95485	31	Bartlett Springs	Lake Couty
19	95464	29	Lucerne	Lake Couty
20	94503	20	American Canyon	Napa County
21	95493	1	Cooper	Lake Couty
	Total	**2623**		

Community Quick Facts – Lake County

Key Facts

67,857
Population

46.9
Median Age

2.4
Average Household Size

$46,480
Median Household Income

Households by Income

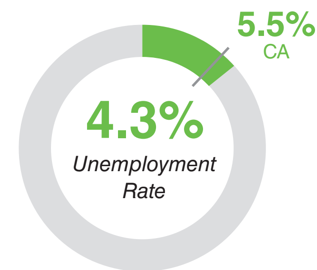
<$15,000	19.9%
$15,000 – $24,999	12.0%
$25,000 – $34,999	8.2%
$35,000 – $49,999	12.2%
$50,000 – $74,999	19.0%
$75,000 – $99,999	11.2%
$100,000 – $149,999	12.0%
$150,000 – $199,999	3.3%
$200,000+	2.2%

Income

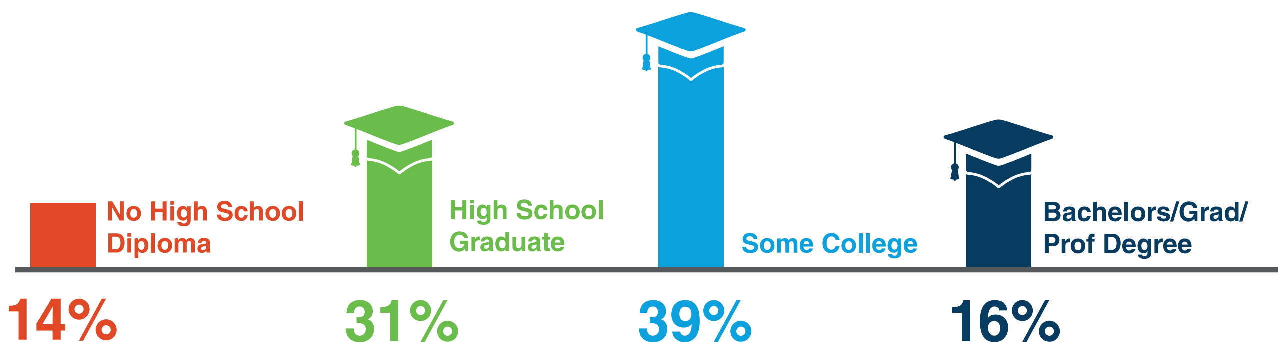
$46,480
Per Capita Income

$74,499
Median Net Worth

Unemployment

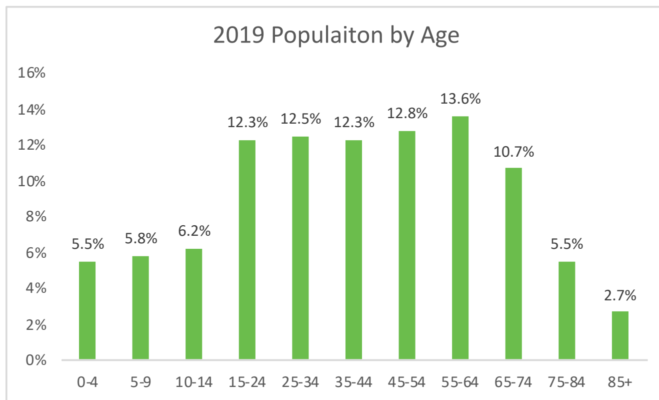


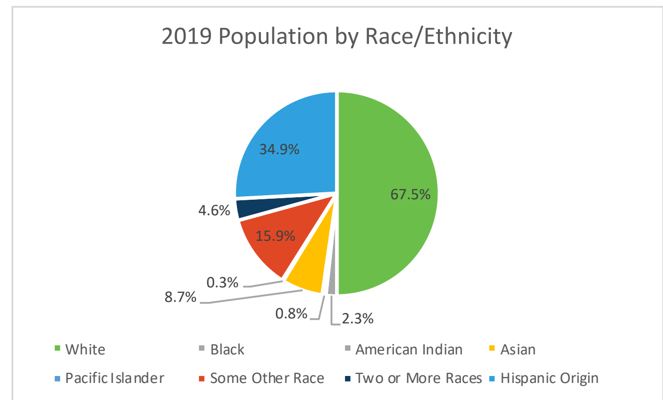
Education



Data Source: Esri Report, 2019. U..S. Census Bureau, Census 2010 Summary File 1. Esri forecasts for 2018 and 2023.

Community Quick Facts – Lake County



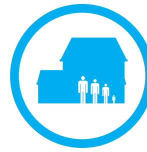


Community Quick Facts – Napa County

Key Facts

140,314
Population

41.1
Median Age



2.7
Average Household Size

$88,457
Median Household Income

Households by Income

<$15,000	5.8%
$15,000 – $24,999	3.8%
$25,000 – $34,999	5.9%
$35,000 – $49,999	11.4%
$50,000 – $74,999	15.2%
$75,000 – $99,999	13.1%
$100,000 – $149,999	19.3%
$150,000 – $199,999	12.3%
$200,000+	13.2%

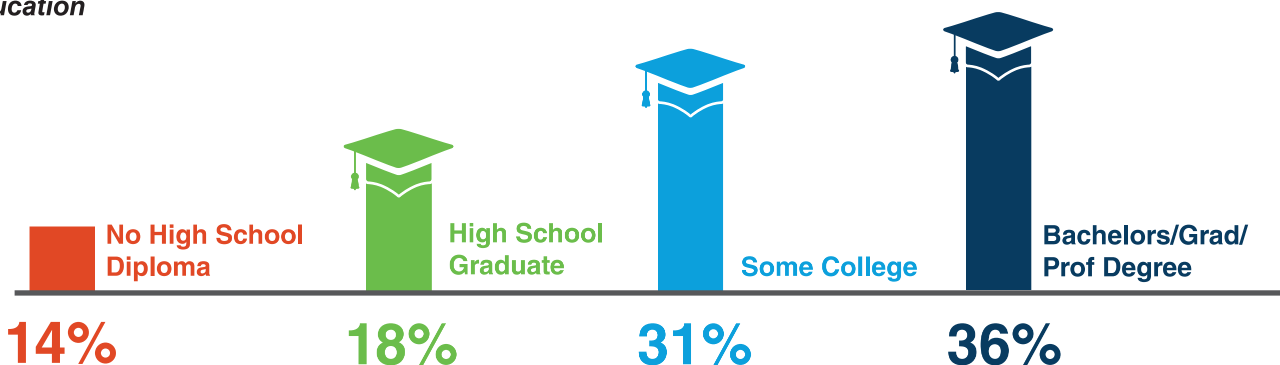
Income

$42,459
Per Capita Income

$88,457
Median Household Income

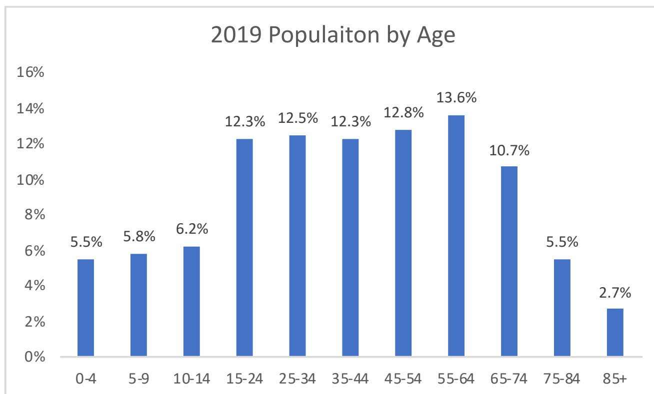
Unemployment

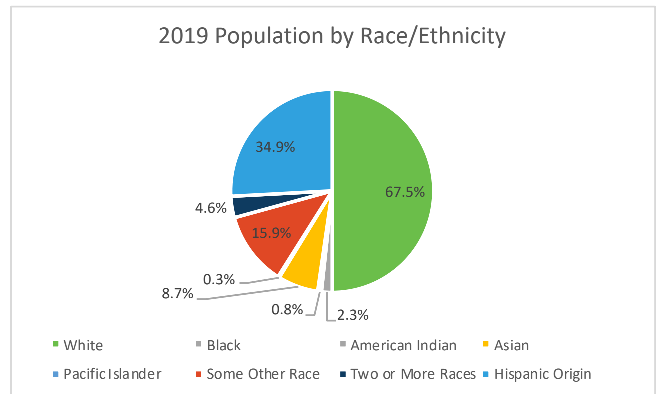
Education



Data Source: Esri Report, 2019. U..S. Census Bureau, Census 2010 Summary File 1. Esri forecasts for 2018 and 2023.

Community Quick Facts – Napa County





	2024 Projections	
	Lake County	Napa County
Total Population	68,665	142,765
Median Age	47.3	42.1
Median Household Income	$52,999	$102,692
Average Household Size	2.41	2.73

Data Source: U.S. Census Bureau, Census 2010 Summary File 1. Esri forecasts for 2019 and 2024 Esri converted Census 2000 data into 2010 geography.

CHNA Overview

Developing metrics for population health interventions are imperative for continued success in elevating the health status of our communities. Including metrics from multiple sectors ensures a holistic assessment that views the health of a community through multiple sectors, helping to identify everyone's role in making improvements. The community health needs assessment (CHNA) ensures we can target our community investments into interventions that best address the needs of our community. The domains used in this regional CHNA encompass national and state community health indicators. While we recognize that health status is a product of multiple factors, each domain influences the next and through systematic and collective action improved health can be achieved. The domains explored in the CHNA are :

- **Social and Economic Factors:** Indicators that provide information on social structures and economic systems. Examples include poverty, educational attainment, and workforce development.
- **Health Systems:** Indicators that provide information on health system structure, function, and access. Examples include health professional shortage areas, health coverage, and vital statistics.
- **Public Health and Prevention:** Indicators that provide information on health behaviors and outcomes, injury, and chronic disease. Examples include cigarette smoking, diabetes rates, substance abuse, physical activity, and motor vehicle crashes.

- **Physical Environment:** Indicators that provide information on natural resources, climate change, and the built environment.

Secondary Data Sources

A significant portion of the data for this assessment was collected through reports generated through CARES Engagement Network CHNA (https:// engagementnetwork.org/assessment/). Other sources include California Department of Public Health, County Health Rankings & Road maps, and California Environmental Protection Agency's Office of Environmental Health Hazard Assessment. When feasible, health metrics have been further compared to estimates for the state or national benchmarks, such as the Healthy People 2020 objectives.

Primary Data Sources

To validate data and ensure a broad representation of the community, Adventist Health St. Helena conducted key informant interviews and focus groups to gather more rich data and aid in describing the community. Results of the qualitative analysis can be found later in this document.

Data Limitations and Gaps

It should be noted that the survey results are not based on a stratified random sample of residents throughout Lake and Napa County. The perspectives captured in this data simply represent the community members who agreed to participate and have an interest. In addition, this assessment relies on several national and state entities with publicly available data. All limitations inherent in these sources remain present for this assessment.

Social & Economic Factors

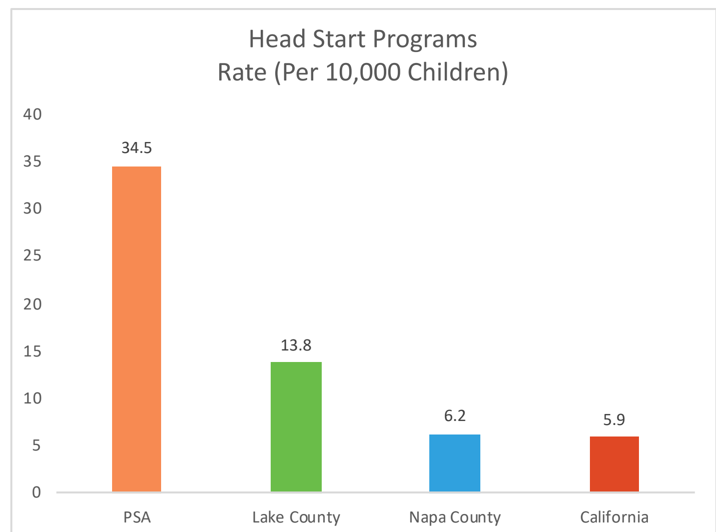
Health starts in our homes, schools, workplaces, neighborhoods, and communities. We know that taking care of ourselves by eating well, staying active, establishing a medical home, living a smoke-free life, getting recommended immunizations and screenings, seeing a medical provider regularly and when sick, all influence health. Our health is also determined in part by access to social and economic opportunities. Positive health outcomes are influenced by the resources and support available in our homes, neighborhoods and communities, as well as the quality of our schooling, safety of our workplaces, cleanliness of our water, environment and our social interactions and relationships. The conditions in which we live explain in part why some Americans are healthier than others and why some are not as healthy as they could be.

Social determinants of health are environmental conditions in which people are born, live, learn, work, play, worship, and age. These determinants affect a wide range of health, functioning, and quality-of-life outcomes and risks. Conditions (e.g., social, economic, and physical) in these various environments and settings (e.g., school, church, workplace, and neighborhood) are referred to as "place." In addition to the more material attributes of "place," the patterns of social engagement and sense of security and well-being are also affected by where people live. Quality of life resources can have a significant influence on population health outcomes. Examples of these resources include safe and affordable housing, access to education, public safety, availability of healthy foods, local emergency/health services, and an environment free of life-threatening toxins. This section details the indicators related to social and economic factors in our community which play a role in maintaining good health .

Education

Early education is an important factor in health status. Independent of its relationship to behavior, education influences a person's ability to access and understand health information. Education is also correlated with a host of preventable poor health outcomes, including increased rates of childhood illness, respiratory illness, renal and liver disease, and diabetes, to name a few. Higher educational levels are associated with lower morbidity and mortality.

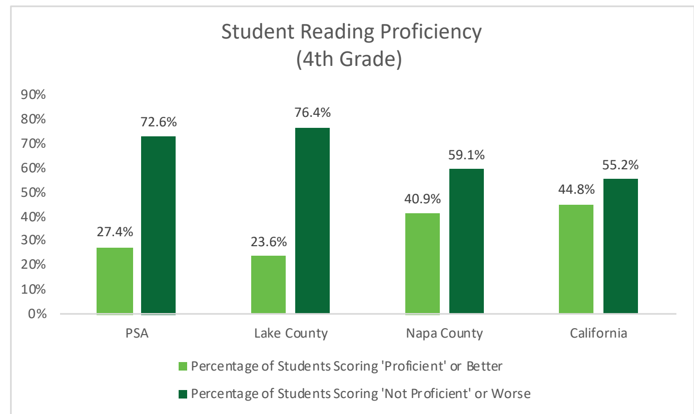
For every 10,000 children, AHSH PSA (34.5) has a higher rate of Head Start Facilities as compared to Lake County (13.8) and Napa County (6.2).



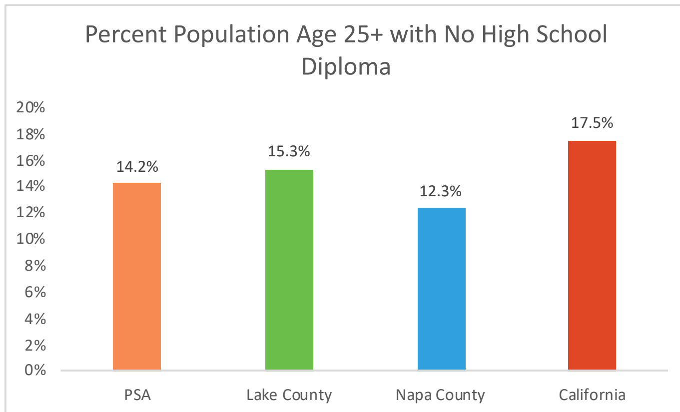
Note: Head Start facility data is acquired from the US Department of Health and Human Services (HHS) 2018 Head Start locator. Population data is from the 2010 US Decennial Census. Data Source: CARES Engagement Network (2019). US Department of Health & Human Services, Administration for Children and Families. 2018. Retrieved. Retrieved May. Retrieved May 2019 from https:// engagementnetwork. org/assessment/

Student Reading Proficiency

A report published by the Anne E. Casey Foundation found that children who do not read proficiently by the end of third grade are four times more likely to leave school without a diploma than a proficient reader. At the end of the 2017 school year, testing for fourth graders found that far more students scored 'Not proficient' or worse on standardized reading testing, than 'Proficient' or better in Lake County (76.4%), this average was higher than AHSH PSA (72.6%) and Napa County (59.1%). AHSH PSA (27.4%) showed a higher proportion of fourth graders who demonstrated "Proficient" or Better than Lake County (23.6%) but not Napa County (40.9%).

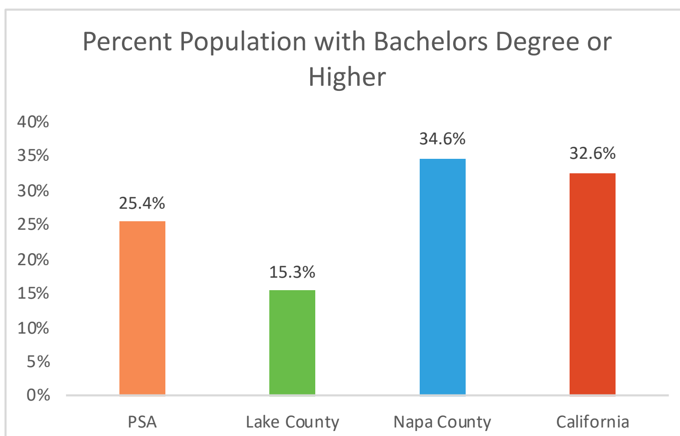


Data Source: CARES Engagement Network (2019). US Department of Education, EDFacts. Accessed via DATA.GOV. 2016-17. Retrieved May 2019 from https:// engagementnetwork.org/assessment/



Data Source: CARES Engagement Network (2019). US Census Bureau, American Community Survey. 2013-17. Retrieved May 2019 from https:// engagementnetwork.org/assessment/

Graduation from high school or a post-secondary education such as receiving a Bachelor's or Associates degree is linked to better health outcomes and increased earning potential. Estimates for those aged 25 and older without a high school diploma in AHSH PSA (14.2%) is lower than Lake County (15.3%) but higher than Napa County (12.3%).



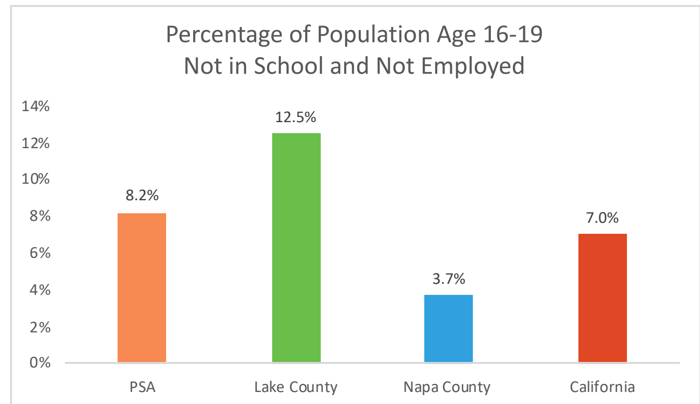
Data Source: CARES Engagement Network (2019). US Census Bureau, American Community Survey. 2013-17. Retrieved May 2019 from https:// engagementnetwork.org/assessment/

When examining attainment of a Bachelor's Degree or higher, one finds that the proportion is higher in AHSH PSA (25.4%) as compared to Lake County (15.3%) but lower than Napa County (34.6%).

Employment

Addressing unemployment levels is important to community development. Unemployment can lead to financial instability and serve as a barrier to health care access and utilization. Many people secure health insurance through an employer, however, even with Medicaid expansion, the lack of gainful employment may prevent some from affording medical office co-pays or medications.

When looking at unemployment figures, AHSH PSA (8.2%) has a lower percentage of population age 16- 19 not in school and not employed as compared to Lake County (12.5%) but higher than Napa County (3.7%).

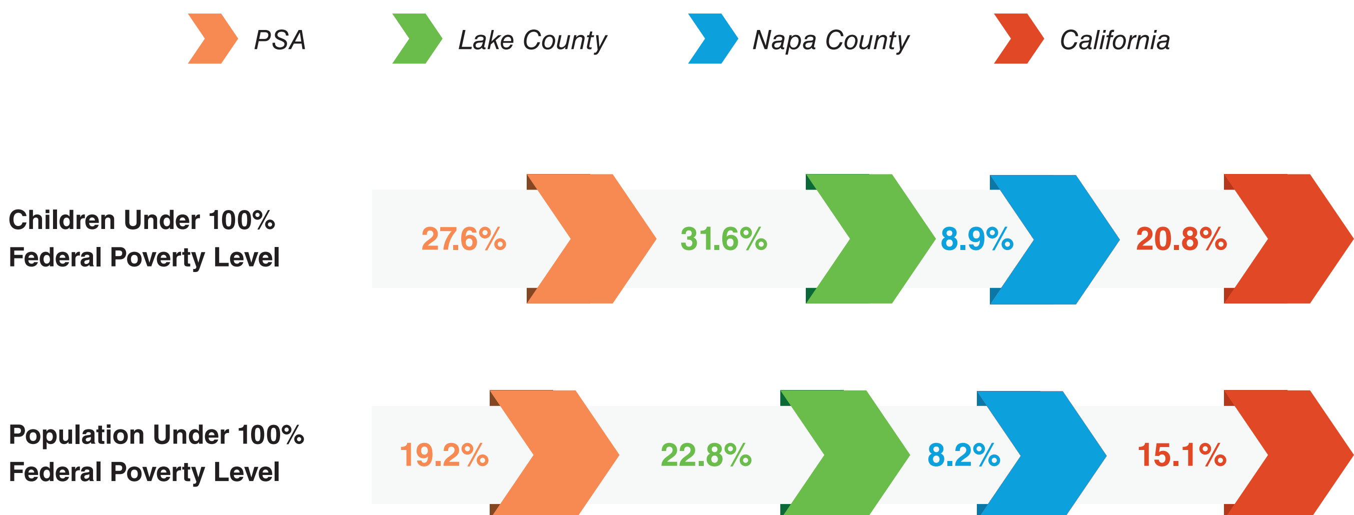


Data Source: CARES Engagement Network (2019). US Census Bureau, American Community Survey. 2013-17. Retrieved May 2019 from https:// engagementnetwork.org/assessment/

Measures of Poverty

Poverty is a particularly strong risk factor for disease and death, especially among children. Children who grow up in poverty are eight times more likely to die from homicide, five times more likely to have a physical or mental health problem, and twice as likely to be killed in an accident. Additionally, family poverty is consistently correlated with high rates of teenage pregnancy, failure to earn a high school diploma, and violent crimes.

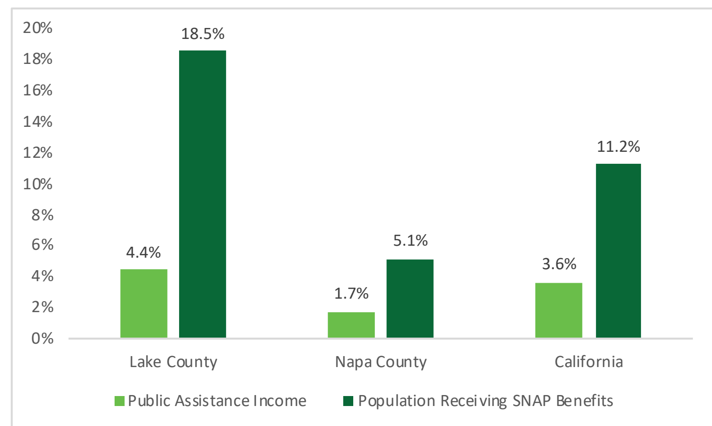
AHSH PSA has a lower percentage of total population and children under age 18 living under the 100% federal poverty level at 27.6% and 19.2%, respectively as compared to Lake County. However, these estimates are higher than Napa County.



Data Source: CARES Engagement Network (2019). US Census Bureau, American Community Survey. 2013-17. Retrieved May 2019 from https:// engagementnetwork.org/assessment/

The chart to the right displays two other measures of poverty; the percentage of population receiving supplemental nutritional assistance program (SNAP) benefits, and percentage of population receiving public assistance income.

Public assistance income includes general assistance and Temporary Assistance to Needy Families (TANF). Separate payments received for hospital or other medical care (vendor payments) are excluded. This does not include Supplemental Security Income (SSI) or non-cash benefits such as Food Stamps.



Data Source: CARES Engagement Network (2019). US Census Bureau, American Community Survey. 2013-17. US Census Bureau, Small Area Income & Poverty Estimates. 2015. Retrieved May 2019 from https://engagementnetwork.org/assessment/

These indicators are relevant because they assess vulnerable populations which are more likely to have multiple health access, health status, and social support needs. When combined with poverty data, providers can use this measure to identify gaps in eligibility and enrollment.

Across the two-county region, Napa County has a lower percentage of populations receiving Public Assistance Income at 1.7% and SNAP benefits at 5.1% as compared to Lake County and the state estimate of 3.6% and 11.2%, respectively.

Housing and Homelessness

A lack of affordable housing and the limited scale of housing assistance programs have contributed to the current housing crisis and to homelessness. The lack of affordable housing leads to high rent burdens (rents which absorb a high proportion of income), overcrowding, and substandard housing. These phenomena, in turn, have not only forced many people to become homeless; they have put a large and growing number of people at risk of becoming homeless.

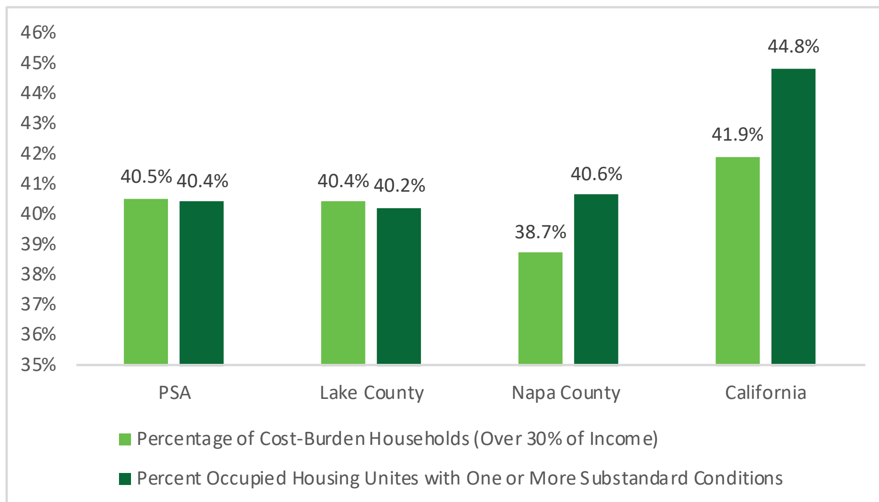
Housing Affordability

Quality of housing has a major impact on overall health. High housing costs may force trade-offs between affordable housing and other needs. According to the 2018 Napa County: Housing as a Health Issue report, states that Napa County is ranked at one of the nation’s least affordable area with the average rent for a one-bedroom apartment exceeds $2,300—more than double what is considered affordable. In addition, the wait time for Section 8 affordable housing in Napa is extremely long: Currently, city of Napa staff are helping people who have been on the list for more than six years.

Recognizing that basic needs consume a higher fraction of income for lower income households, the US Department of Housing and Urban Development uses a definition of affordability that applies specifically to households with incomes at or below 80 percent of the area median family income. It currently calls housing affordable if housing for that income group costs no more than 30 percent of the household's income. Families with such a cost burden may have difficulty affording necessities such as food, clothing, transportation, and medical care.

Substandard housing conditions include the number and percentage of owner-and renter-occupied housing units having at least one of the following conditions: 1) lacking complete plumbing facilities, 2) lacking complete kitchen facilities, 3) with 1.01 or more occupants per room, 4) selected monthly owner costs as a percentage of household income greater than 30%, and 5) gross rent as a percentage of household income greater than 30%. Selected conditions provide information in assessing the quality of the housing inventory and its occupants. This data is used to easily identify homes where the quality of living and housing can be considered substandard.

AHSH PSA (40.5% and 40.4%, respectively) has a higher housing cost burden (paying more than 30% of income for housing) and percentages of houses with one or more substandard conditions than Lake County, 40.4% and 40.2%, respectively.



Data Source: CARES Engagement Network (2019). US Census Bureau, American Community Survey. 2013-17. Retrieved May 2019 from https:// engagementnetwork.org/ assessment/

Homelessness and Health

When looking at the homeless population by various conditions and experiences, one finds that the largest portions suffer from chronic homelessness, mental illness, or substance abuse. A smaller, but still substantial portion have experienced domestic violence/intimate partner violence or have a physical disability. Homelessness results in high levels of stress, which put individuals and families at greater risk of violence and injury, food insecurity, unhealthy food options, infectious disease and frequent moves, which have been linked with negative childhood events such as abuse, neglect, household dysfunction and increased likelihood of smoking and suicide in children.

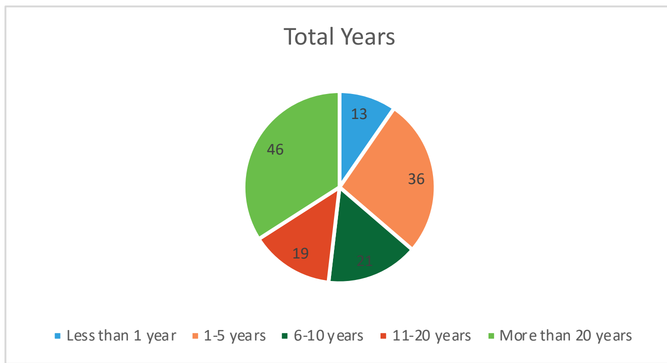
According to the 2019 Homeless report conducted by Napa Continuum of Care (CoC), on the night of January 22nd and the early morning of the 23rd, community leaders such as City and County staff, law enforcement, volunteers, and other in Napa conducted the annual PIT count and measured the prevalence of homelessness across the geographic area of the CoC. Community members collected information on individuals and families residing in emergency shelters and transitional housing, as well as people sleeping on the streets or sidewalks, in cars, abandoned buildings, parks, or other areas not meant for human habitation. New to the 2019 count was the implementation of an observation tool and an earlier surveying time in the morning. The overall findings were:

2019 Napa PIT Count Night of January 22-morning of 23, 2019		
	2018	2017
Total persons experiencing homeless	323	322
Sheltered count	172	168
Unsheltered count	151	154
Chronic Homelessness	149	158
Youth - Number of unsheltered unaccompanied youth increased	15	5
Youth - Sheltered persons in youth-headed households	8	11
Unsheltered veterans (including their families)	7	13
Sheltered veterans	8	10

Data Source: 2018 Update of the Napa Plan to end Homelessness Napa Continuum of Care. Retrieved May 2019 from https://www.countyofnapa.org/DocumentCenter/View/10896/Napa-Homeless-Plan-Update---Final-Draft-PDF

Respondents were also asked if they had been in Napa less than six months. If so, they were asked to identify their prior residence. The report finds that of the 145 responses to questions about their length of time in Napa 132 or 91% - had been in Napa for more than one year, 45% had been in Napa for more than ten years, approximately one-third – have been in Napa for more than 20 years.

Lastly, the table and graph below highlights the age of those counted, compared to the 2018 count, 2019 showed an increase in children under 18, ages 18-24 and adults between 45-65 and a decrease for respondents who were 25-44 and older adults who were 65+.



AgeAges	2019	2018
0-17	34	29
18-24	25	16
25-44	104	128
45-64	131	129
65+	12	19

Violence and Injury Prevention

According to the Centers for Disease Prevention and Control, injury is the leading cause of death for children and adults between the ages of 1 and 45. Injury not only includes violence, but also unintentional injuries, such as harm caused by motor vehicle crashes.

When looking at violent crimes across the two-county region, Napa County had the highest counts of reports from 2014 to 2017. Comparatively, Lake County had the lowest reports during that same time period. When examining rates of substantiated child abuse cases, between 2012 and 2015, Lake County had the highest number of cases in 2013 at 8.4 per 1,000 and the lowest rate at 6 per 1,000 in 2012. Conversely, Napa had the highest number of cases in 2014 and 2015 at 8.1 and the lowest rate at 6.1 per 1,000. During the same time period, both counties were lower than the state rates.

For unintentional injuries, Lake County had a higher rate of drug-induced deaths (age-adjusted) per 100,000 at 40.4 than the state estimate of 12.7.

Violent Crimes	2014	2015	2016	2017
Lake County	307	346	379	396
Napa County	534	587	598	597

Note: Rates in red are the worst outcomes as compared to the state estimates. Data Source: State of California Department of Justice (2019). Open Justice Online Database. Retrieved May 2019 from Source: https://openjustice.doj.ca.gov/data

Rate of Substantiated Child Abuse per 1,000	2012	2013	2014	2015
Lake County	6	**8.4**	6.6	6.6
Napa County	6.1	6.7	**8.1**	**8.1**
California	9.3	9.2	9	8.4

Note: Rates in red are the worst outcomes as compared to the state. Data Source: Annie E. Casey Foundation (2019). Kids Count Data Center. Retrieved May 2019 from https:// datacenter. kidscount.org/

	Lake County	Napa County	California	HP 2020
Drug-Induced Deaths, Age-Adjusted Death Rate per 100,000	40.4	10.4*	12.7	11.3
Motor Vehicle Traffic Crashes, Age- Adjusted Death Rate per 100,000	26.2*	7.6*	9.5	12.4

Note: *Rates are deemed unreliable when based on fewer than 20 data elements. Data Source: California Department of Public Health, County Health Status Profiles 2019, Individual County Data Sheets. 2015-2017 Death Files. Retrieved from https://www.cdph.ca.gov/Programs/CHSI/Pages/Individual-County-Data-Sheets.aspx

How is the Region Doing?

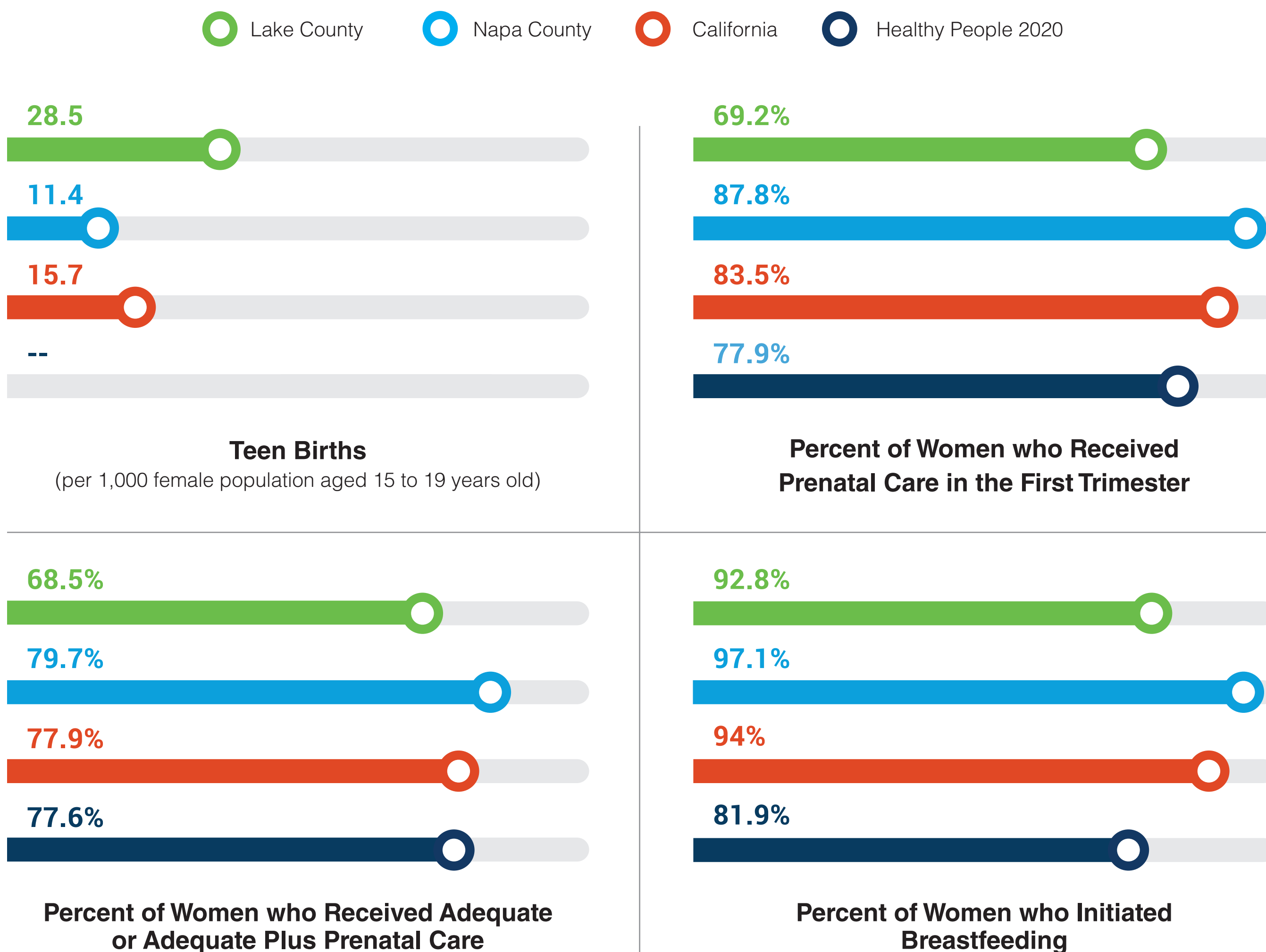
- AHSH PSA (34.5) has a higher rate of Head Start Facilities as compared to Lake County (13.8) and Napa County (6.2).
- At the end of the 2017 school year, testing for fourth graders found that far more students scored 'Not proficient' or worse on standardized reading testing, than 'Proficient' or better in Lake County (76.4%), this average was higher than AHSH PSA (72.6%) and Napa County (59.1%).
- When looking at unemployment figures, Napa County has a lower percent of unemployed adults at 2.3% compared to the state estimate of 4.7%. Napa County (3.7%) has a lower percentage of Young People Not in School and Not Working, youth ages 16-19 years old than Lake County (12.5%) and also compared to 7.0% for the state.
- Across the two-county region, Lake County has the highest percentage of total population and children under age 18 living under the 100% federal poverty level at 31.6% and 22.8%, compared the state estimate of 20.8% and 15.1%, respectively.
- Across the two-county region, Napa County has a lower percentage of populations receiving Public Assistance Income at 1.7% and SNAP benefits at 5.1% as compared to Lake County and the state estimate of 3.6% and 11.2%, respectively.

Health System

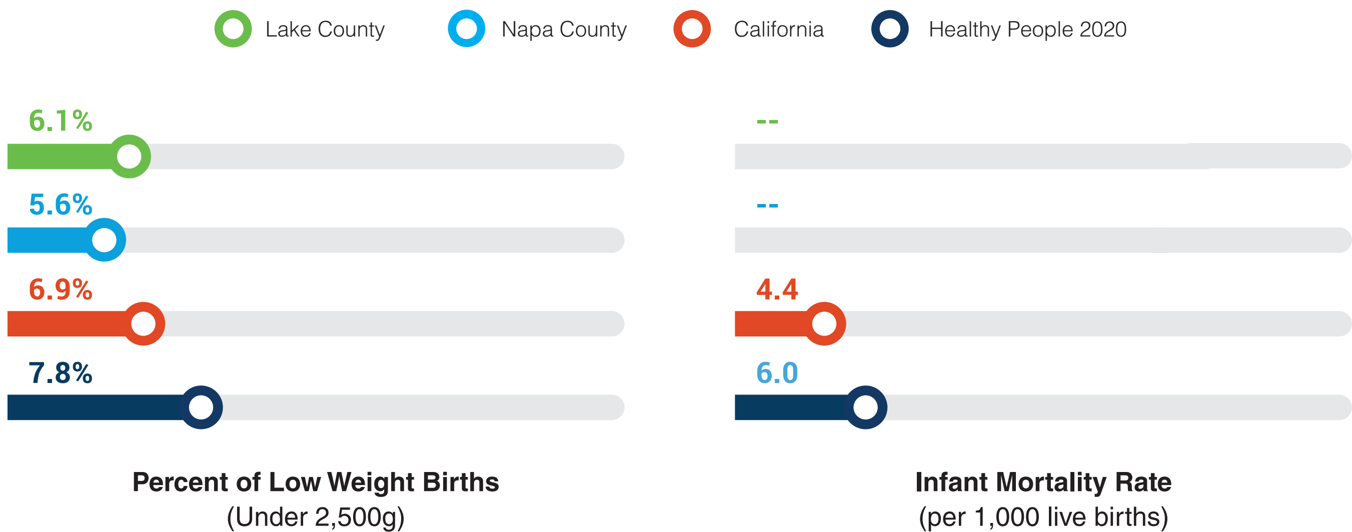
A strong health system is one in which patients receive efficient coordinated care for a variety of illnesses and appropriate follow-up care to prevent unnecessary hospitalizations. In order to strengthen linkages to care, we must first understand the current state of our health system. This begins by understanding the outcomes associated with receiving or not receiving good maternal health care, as well as how one accesses the health care system.

Live births are an indication of population growth and demand on a community's existing resources, infrastructure, schools, and the health care system/services. An adequate health care system is capable of providing preventive, diagnostic, and treatment care according to the requirements of the people being served. It is critical to understand current birth trends to ensure adequate availability of needed resources, particularly among low-income families. This is calculated by dividing the total number of births in a given year by the total population. Napa County has lower teen birth estimates (11.4) in comparison to Lake County (28.5) and the state (15.7) estimate.

Prenatal Care and Birth Indicators



Prenatal Care and Outcomes After Birth *(Continue)*



Note:. (*) Rates are deemed unreliable when based on fewer than 20 data elements. Data Source: California Department of Public Health, County Health Status Profiles 2019, Individual County Data Sheets. 2014-2016 Birth Records. 2015-2017 Death Files. 2014-2016 Birth Cohort-Perinatal Outcome Files. Retrieved from https://www.cdph.ca.gov/Programs/CHSI/Pages/Individual-County-Data-Sheets.aspx

"Early prenatal care," is care started in the 1st trimester (1-3 months). Adequacy of prenatal care calculations are based on the Adequacy of Prenatal Care Utilization Index (APNCU), which measures the utilization of prenatal care based on the timing of initiation of such care using the month prenatal care began as reported on the birth certificate and the ratio of the actual number of visits reported on the birth certificate to the expected number of visits. Adequate-Plus care is defined as prenatal care begun by the 4th month of pregnancy and 110% or more of recommended visits received. Adequate-Plus is defined as prenatal care begun by the 4th month of pregnancy and 80-109% of recommended visits received. These indicators are relevant because engaging in prenatal care decreases the likelihood of maternal and infant health risks. These indicators can also highlight a lack of access to preventive care, a lack of health knowledge, insufficient provider outreach, and/or social barriers preventing utilization of health care services. For indicators of prenatal care denoted in the graphs (early first trimester prenatal care and adequate care), in the two-county region, Napa County demonstrated a higher proportion of woman receiving prenatal care and adequate care at 87.8% and 79.7%, respectively. In contrast, Lake County held lower proportions of women receiving prenatal care and adequate care at 69.2% and 68.5%, respectively. Notably, Napa County estimates meet the Healthy People 2020 performance target of 77.9% and 77.6%, respectively.

Breastfeeding has many health benefits for both the mother and infant. Breastfeeding protects against diarrhea and common childhood illnesses such as pneumonia, and may also have longer-term health benefits, such as reducing the risk of overweight and obesity in childhood and adolescence. Across the two-county region, Napa County demonstrated a higher proportion of women across the region initiating breastfeeding at 97.1%, exceeding the Healthy People 2020 performance target for 81.9% of infants to have "ever been breastfed." It's also important to note that Lake County also exceeded the Healthy People 2020 performance target.

Low birth weight is indicative of the general health of newborns and often a key determinant of survival, health, and development. Infants born at low birth weights are at a heightened risk of complications, including infections, neurological disorders, Sudden Infant Death Syndrome, and even chronic diseases. Napa County (5.6%) had a lower proportion of low birth weights than the state estimate of 6.9% and the Healthy People 2020 goal of 7.8%.

Finally, the infant mortality rate (IMR) is critical as it is indicative of the existence of broader issues pertaining to access to care and maternal child health. These rates can further provide metrics of community health outcomes and areas of needed services and interventions. In the two-county region, Lake and Napa County did not have any data reference because its rates are deemed unreliable when based on fewer than 20 data elements.

Access to Health Care

Access to health care is arguably the most critical component of measuring community health. Access can be measured at both the individual level (i.e., health insurance coverage, Medicaid coverage) and at the system level (i.e., primary care provider rate, health professional shortage areas). When an individual has the means to secure treatment and quality comprehensive treatment is readily available, then access to health care is highest. Understanding provider rates per 100,000 population can be useful for determining areas in most need of providers and potential stresses on existing providers.

Across each provider indicator (dental, mental health, and primary care per 100,000 population), Napa County recorded higher proportions of providers to population for dental (89.4), mental health providers (497.9) and primary care providers (94.3). Lake County has the lowest proportion of providers for dental and primary care providers per 100,000 population.

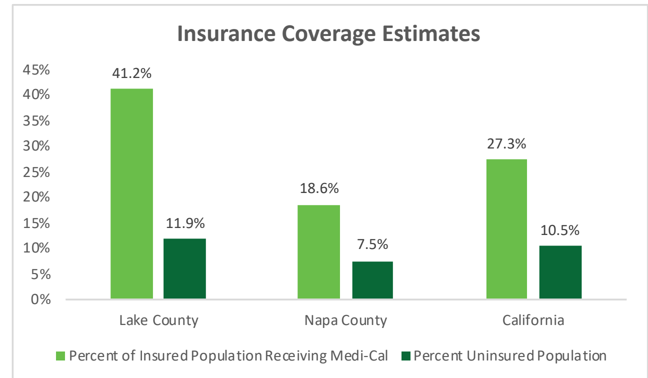
Access to Health Care			
	Lake County	**Napa County**	**California**
Dentists Rate per 100,000 Population	**45.1**	**89.4**	83.4
Mental Health Care Provider Rate per 100,000 Population	342.4	**497.9**	327.8
Primary Care Provider Rate per 100,000 Population	**46.8**	**94.3**	78.5

Note: Rates in red are the poorest outcomes as compared to the state. Rates in green are the best outcomes as compared to the state.
Data Source: Robert Wood Johnson Foundation (2019). County Health Rankings and Road maps. Retrieved May 2019 from http://www.countyhealthrankings.org

Health Insurance

Insurance coverage is also an important indicator to consider when determining the health of a community or health system. Lack of insurance is a key barrier to health care access, regular primary care, specialty care, and other health services contributing to poor health status. Additionally, knowing the proportion of the population receiving Medi-Cal is important. This information allows for an assessment of vulnerable populations most likely to have multiple health access, health status, and social support needs. When combined with poverty data, providers can use this measure to identify gaps in eligibility and enrollment.

Across the two-county region, Napa County has the lowest percentage of persons covered through Medi-Cal and percentage of uninsured persons at 18.6% and 7.5%, respectively. The estimates are lower than the state at 27.3% and 10.5%, respectively.



Data Source: CARES Engagement Network (2019). US Census Bureau, American Community Survey. 2013-17. Retrieved May 2019 from https:// engagementnetwork.org/assessment/

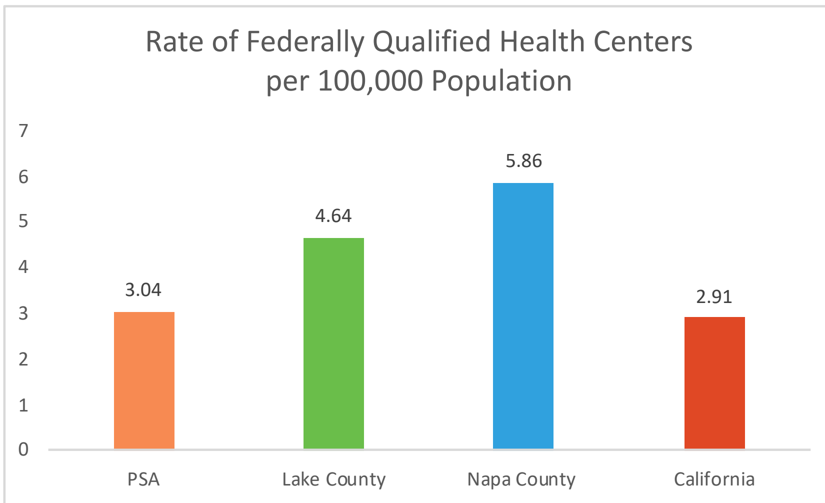
Community Health Centers

Community Health Centers (CHCs) are community assets that provide health care to vulnerable populations in areas designated as medically under-served. Per the California Primary Care Association, the term Community Health Center (CHC) includes Federally Qualified Health Centers (FQHCs), FQHC Look-Alikes, Migrant Health Centers, Rural and Frontier Health Centers, and Free Clinics. CHCs are an essential segment of the safety-net. In many California counties, these clinics provide a significant proportion of comprehensive primary care services to those who receive partial subsidies or are uninsured.

AHSH PSA (3.04) has lower rates of FQHCs for every 100,000 people than Lake (4.64) and Napa (5.86) County. Looking at the raw counts, Napa County had the largest number of CHCs (10) in comparison to Lake County at (1).

Health Center Site Population Type-Description		
	Lake County	Napa County
Rural	1	1
Urban	--	3
Unknown	--	6
Total Number of Community Health Centers	1	10

Note: Unknown means that the type of population served is unknown. Data Source: Health Resources and Services Administration (2019). Health Center Service Delivery and Look–Alike Sites Data Download. Retrieved May 2019 from https://data.hrsa.gov/data/download



Data Source: CARES Engagement Network (2019). US Department of Health & Human Services, Center for Medicare & Medicaid Services, Provider of Services File. December 2018. Retrieved May 2019 from https://engagementnetwork.org/assessment/

Preventable Hospital Events

Ambulatory or primary care sensitive conditions (ACS) are those conditions for which hospital admission could be prevented by interventions in primary care. This indicator reports the discharge rate (per 1,000 Medicare enrollees) for conditions that are ACS. ACS conditions include pneumonia, dehydration, asthma, diabetes, and other conditions which could have been prevented if adequate primary care resources were available and accessed by those patients. This indicator is relevant because analysis of ACS discharges demonstrates a possible "return on investment" from interventions that reduce admissions through better access to primary care resources. AHSH PSA (37.7) has lower discharge rates than Lake County (41.7) but higher than Napa County (29.5) per 1,000 Medicare enrollees.

Ambulatory Care Sensitive Condition Discharge Rate Per 1,000 Medicare Enrollees			
PSA	**Lake County**	**Napa County**	**California**
37.7	41.7	29.5	36.2

Note: Rates in red are the poorest outcome in comparison to the state. Data Source: CARES Engagement Network (2019). Dartmouth College Institute for Health Policy & Clinical Practice, Dartmouth Atlas of Health Care. 2015. Retrieved May 2019 from https://engagementnetwork.org/assessment/

Asthma

Air quality is of great concern to many of the residents in the region and can have detrimental effects on respiratory health. Having asthma can affect a person in many ways. For some people, asthma is a minor nuisance. For others, it can be a major problem that interferes with daily activities and may lead to a life-threatening asthma attack. Examination of trends reveals that Lake County has the highest rates for emergency department visits per 100,000 related to asthma and the highest percentage of persons diagnosed with lifetime asthma (21.4%), suggesting under-diagnosis. Lake County also has the highest percentage of people diagnosed with active and asthma hospitalizations per 100,000.

	Lake County	Napa County	California
Asthma ED Visits, Rate per 100,000	**80.1**	**40.2**	46.9
Asthma Hospitalizations, Rate per 100,000	**9.1**	**3.1**	4.7

Note: Rates in red are the poorest outcome in comparison to the state. Rates in green are the best outcome in comparison to the state. Data Sources: California Department of Public Health, California Breathing. County Asthma Data Tool, 2017. Retrieved from https://www.cdph.ca.gov/Programs/CCDPHP/DEODC/EHIB/CPE/Pages/ CaliforniaBreathingData.aspx. Lucile. (Ed and hospit)

Asthma Estimates	Lake County	Napa County	California
Active Asthma Prevalence	**17.3%**	*	8.7%
Lifetime Asthma Prevalence	**21.4%**	20.1%	14.8%

Note: (*) No data available on site. Percentages in red are the poorest outcome in comparison to the state. Percentages in green are the best outcomes in comparison to the state. Data Source: California Department of Public Health, California Breathing. County Asthma Data Tool, 2015-2016. Retrieved May 2019 from https://www.cdph.ca.gov/Programs/CCDPHP/DEODC/EHIB/CPE/Pages/ CaliforniaBreathingData.aspx

Mortality

Health status and health care utilization measures are central indicators of the performance of the health care system. Health status measures the level of wellness and illness, while health care utilization is the use of services by people for the purpose of preventing and curing health problems. The leading causes of death in the United States are overwhelmingly the result of chronic and preventable disease. Nearly 75% of all deaths in the United States are attributed to ten causes, with the top three of these accounting for over 50% of all deaths. According to the Centers for Disease Control and Prevention, the top three causes of death in the U.S. in 2016 were from heart disease, cancer, and unintentional injuries.

Leading Causes of Death (Age-Adjusted Rates per 100,000 Population)			
Mortality	**Lake County**	**Napa County**	**California**
1	Coronary Heart Disease – 105.7	Coronary Heart Disease – 86.2	Coronary Heart Disease - 87.4
2	Accidents (Unintentional Injuries) – 89.6	Accidents (Unintentional Injuries) – 35.7	Cerebrovascular Disease (Stroke) – 36.3
3	Chronic Lower Respiratory Disease – 58.6	Cerebrovascular Disease (Stroke) 35.0	Alzheimer's Disease – 35.7
4	Lung Cancer – 46.7	Alzheimer's Disease – 31.2	Accidents (Unintentional Injuries) – 32.2
5	Cerebrovascular Disease (Stroke) 45.7	Lung Cancer – 30.6	Chronic Lower Respiratory Disease – 32.0
6	Drug Induced Deaths – 40.4	Chronic Lower Respiratory Disease – 26.9	Lung Cancer – 27.5
7	Suicide – 29.3	Prostate Cancer – 26.6	Diabetes – 21.2
8	Female Breast Cancer – 29.2*	Diabetes – 19.0	Prostate Cancer – 19.4
9	Chronic Liver Disease and Cirrhosis – 28.2	Female Breast Cancer – 18.0*	Female Breast Cancer – 18.9
10	Alzheimer's Disease – 26.5	Colorectal Cancer – 11.6	Influenza/Pneumonia – 14.2

Note: * is defined as Rates are deemed unreliable when based on fewer than 20 data elements. Data Source: California Department of Public Health, County Health Status Profiles 2019, Individual County Data Sheets. 2014-2017 Death Files. Retrieved May 2019 from https://www.cdph.ca.gov/Programs/CHSI/Pages/Individual-County-Data-Sheets.aspx

The first two leading causes of death for Lake and Napa County are coronary heart disease and unintentional injuries. The third, fourth, fifth and sixth causes of death in the counties varied in terms of order, however, for each county these rankings were comprised of mortality rates for chronic lower respiratory disease, stroke, lung cancer, Alzheimer's Disease and drug induced deaths.

The seventh, eighth and ninth causes of deaths are attributable to suicide, prostate cancer, female breast cancer, diabetes and chronic liver disease and cirrhosis.

Lastly, the tenth leading causes of death for Lake County is Alzheimer's Disease and colorectal cancer. Although for Napa County, Alzheimer's Disease ranked at number four.

How is the Region Doing?

- Napa County has lower teen birth estimates (11.4) in comparison to Lake County (28.5) and the state (15.7) estimate.

- Across the two-counties, Napa County demonstrated a higher proportion of women across the region initiating breastfeeding at 97.1%, exceeding the Healthy People 2020 performance target for 81.9% of infants to have "ever been breastfed."

- Napa County demonstrated a higher proportion of woman receiving prenatal care and adequate care at 79.7% in comparison to Lake County at 68.5%. Notably, Napa County estimates meet the Healthy People 2020 performance target of 77.9% and 77.6%, respectively.

- Across each provider indicator (dental, mental health, and primary care per 100,000 population), Napa County recorded higher proportions of providers to population for dentist (89.4), mental health providers (497.9) and primary care providers (94.3) than Lake County and the state estimate at 83.4 per 100,000 population.

- Lake County has the highest rates for emergency department visits per 100,000 related to asthma and the highest percentage of persons diagnosed with lifetime asthma (21.4%), suggesting under-diagnosis. Lake County also has the highest percentage of people diagnosed with active asthma 17.3% as compared to the state at 8.7%.

- The first two leading causes of death for Lake and Napa County are coronary heart disease and unintentional injuries.

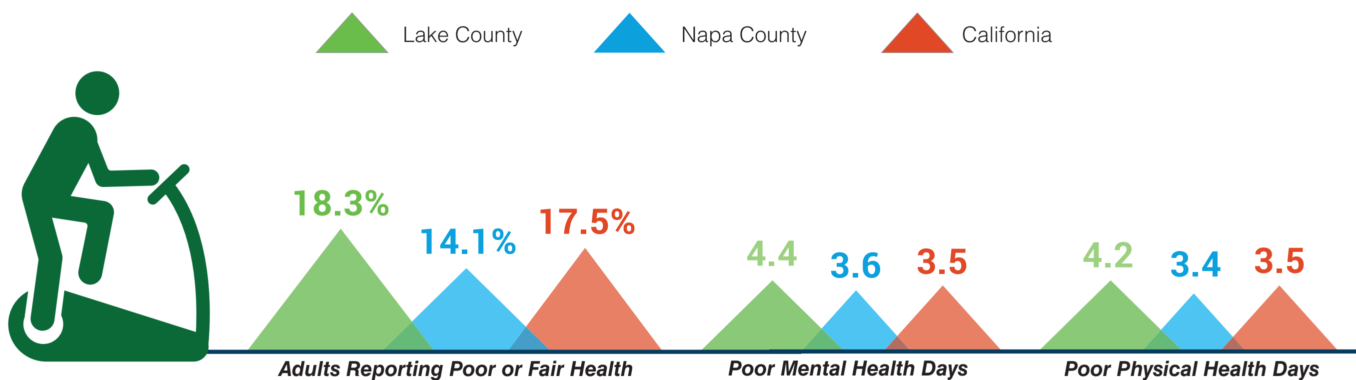
Public Health and Prevention

Public health is the science of protecting and improving the health of people and their communities. This work is achieved by promoting healthy lifestyles, researching disease and injury prevention, and detecting, preventing and responding to infectious diseases. When these factors are addressed, a community will enjoy an overall higher level of physical and emotional well-being.

Health Status

Health status is determined by more than the presence or absence of any disease. It is comprised of a number of factors, including measures of healthy life expectancy, years of potential life lost, self-assessed health status, chronic disease prevalence, measures of functioning, physical illness, and mental well-being. These measures go hand-in-hand with measures related to health behaviors such as physical activity, nutrition, and alcohol consumption. Measuring health behaviors provides a deeper understanding of health status.

When looking at overall health status, across the two-region counties, Napa County had a lower proportion (14.1%) of adults who rate their health as “fair” or “poor,” than the state estimate of 17.5%, while Lake County had a proportion of 18.3%. Lake County (4.4) had a higher number of poor mental health days reported in a 30-day period than the state estimate of 3.5. The rate of poor physical health days within a reported 30-day period was slightly lower in Napa County (3.4 in a 30-day period) than Lake County (4.2 in a 30-day period) and the state estimate of 3.5.



Data Source: Robert Wood Johnson Foundation (2019). County Health Rankings and Roadmaps. Retrieved May 2019 from http://www.countyhealthrankings.org

Physical Activity

Increased physical activity is associated with lower risks of type 2 diabetes, cancer, stroke, hypertension,cardiovascular disease, and premature mortality, independent of obesity. Individuals who live closer to sidewalks, parks, and gyms are more likely to exercise. In California, 17.2% of adults answered “yes” to the question: “During the past month, other than your regular job, did you participate in any physical activities or exercises such as running, calisthenics, golf, gardening, or walking for exercise?” In Napa County, the percentages of people who responded they participated in leisure-time physical activity was 16.2%, this percentage is better than the state estimate. Conversely, Lake County has a higher percentage at 18.3%.

When considering populations who have adequate access to locations for physical activity, figures vary between the county and state. Access to exercise opportunities is defined as the percentage of individuals in a county who live reasonably close to a location for physical activity. Locations for physical activity are defined as parks or recreational facilities. Napa County had a slightly lower percentage of individuals with adequate access to exercise opportunities at 92.4%, while Lake County had an even lower percentage (68.4%) as compared to the state at 93%.

Chronic Disease

Successfully managing risk factors for chronic diseases is important for preventing unnecessary hospitalizations. According to the Centers for Disease Control and Prevention (CDC), six in ten Americans live with at least one chronic disease, like heart disease, cancer, stroke, or diabetes. These and other chronic diseases are the leading causes of death and disability in America, and they are also a leading driver of health care costs.

AHSH PSA Medicare population has the lowest rates of depression (16.4%) and heart disease (24.4%) as compared to Lake County (16.6% and 25.8%, respectively). AHSH PSA had higher rates of diabetes as compared to Lake and Napa County (21.6% and 22.2%, respectively).

Chronic Disease Indicators	PSA	Lake County	Napa County	California
Adults with a Body Mass Index Greater than 30	*	23.2%	21.1%	22.5%
Medicare Population with Depression	**16.4%**	16.6%	15.9%	15.8%
Medicare Population with Diabetes	**21.7%**	21.6%	22.2%	27.2%
Medicare Population with Heart Disease	**25.4%**	25.8%	24.4%	24.7%

Data Source: Note: Percentages in red are the poorest outcome in comparison to the state. Percentages in green are the best outcomes in comparison to the state. CARES Engagement Network (2019). National Center for Chronic Disease Prevention and Health Promotion.2015. US Department of Health & Human Services, Center for Medicare & Medicaid Services, 2017. Retrieved May 2019 from https://engagementnetwork.org/assessment/

Sexually Transmitted Infections

Sexually transmitted infections (STIs) are passed from one person to another through intimate physical contact and from sexual activity. STIs are very common. The causes of STIs are bacteria, parasites, yeast, and viruses. In fact, CDC averages 20 million new infections occur every year in the United States. Understanding the rate of STIs are important because they are measures of poor health status, indicate a lack of sexual health education, and indicate the prevalence of unsafe sex practices.

AHSH PSA had lower rates per 100,000 population for chlamydia (308.9) and gonorrhea (58.3) incidence as compared to Lake County (442.8 and 314.3, respectively) but higher rates than Napa County (308.9 and 58.3, respectively). HiV estimates for AHSH PSA were lower than Lake and Napa County.

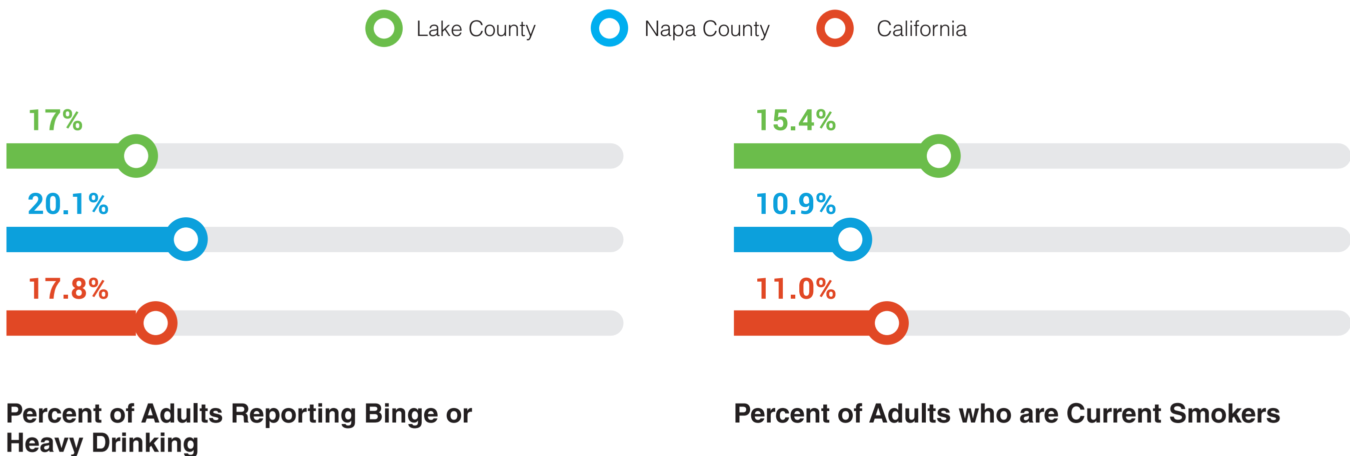
Rate per 100,000 Population	PSA	Lake County	Napa County	California
Chlamydia Incidence	394.7	442.8	308.9	506.2
Gonorrhea Incidence	221.7	**314.3**	**58.3**	164.9
HIV Prevalence	.24	**236.9**	238.5	376.4

Data Source: CARES Engagement Network (2019). US Department of Health & Human Services, Health Indicators Warehouse. Centers for Disease Control and Prevention, National Center for HIV/AIDS, Viral Hepatitis, STD, and TB Prevention. 2016. Retrieved May 2019 from https:// engagementnetwork.org/assessment/

Alcohol and Tobacco Use

Alcohol and/or tobacco use has major adverse impacts on individuals, families and communities. The effects of abuse are cumulative, contributing to costly social, physical, mental, and public health problems.

According to recent averages, Napa County has the highest percentage (17%) of adults who engaged in binge or heavy drinking within the last 30 days than Lake County and the state estimate. Percentages of adults who are current smokers in Lake County is higher 15.4% than Napa County, 10.9%, and the statewide average of 11%.



Percent of Adults Reporting Binge or Heavy Drinking

Percent of Adults who are Current Smokers

Data Source: Robert Wood Johnson Foundation (2019). County Health Rankings and Roadmaps. Retrieved May 2019 from http://www.countyhealthrankings.org

How is the Region Doing?

- Napa County had a lower proportion, 14.1%, of adults who rate their health as “fair” or “poor,” than the state estimate of 17.5%, Lake County had a proportion of 18.3%. Lake County (4.4) had a higher number of poor mental health days reported in a 30-day period than the state estimate of 3.5. The rate of poor physical health days within a reported 30-day period was slightly lower in Napa County (3.4) than Lake County (4.2) and the state estimate of 3.5.

- Napa County had a slightly lower percentage of individuals with adequate access to exercise opportunities at 92.4%, while Lake County had an even lower percentage (68.4%) as compared to the state at 93%.

- AHSH PSA Medicare population has the lowest rates of depression (16.4%) and heart disease (24.4%) as compared to Lake County (16.6% and 25.8%, respectively). AHSH PSA had higher rates of diabetes as compared to Lake and Napa County (21.6% and 22.2%, respectively).

- AHSH PSA had lower rates per 100,000 population for chlamydia (308.9) and gonorrhea (58.3) incidence as compared to Lake County (442.8 and 314.3, respectively) but higher rates than Napa County (308.9 and 58.3, respectively).

- Napa County has the highest percentage (19.1%) of adults who engaged in binge or heavy drinking within the last 30 days than Lake County and the state estimate. Percentages of adults who are current smokers in Lake County is higher 15.4% than Napa County (10.9%) and the statewide average of 11%.

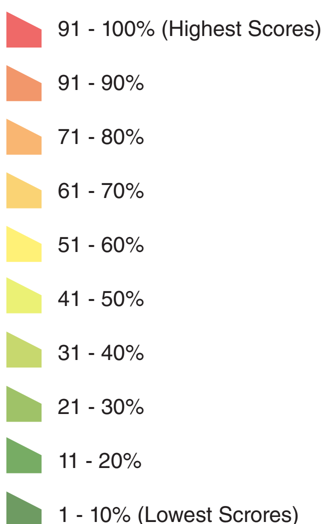
Physical Environment

We interact with the environment constantly, therefore our physical environment can affect our health behaviors, quality of life, years of healthy life lived, and health disparities. The World Health Organization (WHO) defines environment, as "all the physical, chemical, and biological factors external to a person, and all the related behaviors." This can include air quality and exposure to toxic substances as well as the built environment (human-made surroundings) and housing.

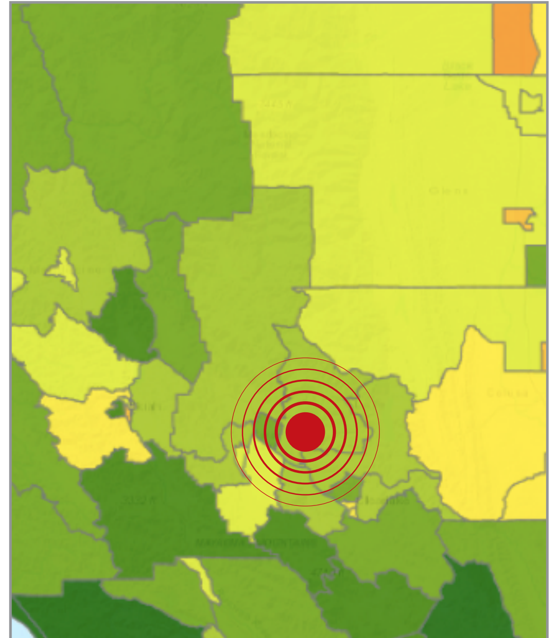
CalEnviroScreen is a science-based mapping tool that was developed by the California Environmental Protection Agency's Office of Environmental Health Hazard Assessment. This tool helps identify California communities that are affected by many sources of pollution and that are particularly vulnerable to pollution's effects. CalEnviroScreen uses environmental, health, and socioeconomic information to produce a numerical score for each census tract in the state. A census tract with a high score (colored dark orange to dark red) is one that experiences higher pollution burden and vulnerability than census tracts with lo w scores (colored shades of green). Indicators that are considered include but are not limited to, ozone, PM 2.5, drinking water quality, pesticides, and hazardous waste.

Lake County ranked 35-40% and Napa County ranked 35-40% percentile on the CalEnviroScreen 3.0 index for pollution. This means that these areas have a moderate pollution burden, populations especially sensitive to these factors, and socioeconomic factors that increase vulnerability to pollution.

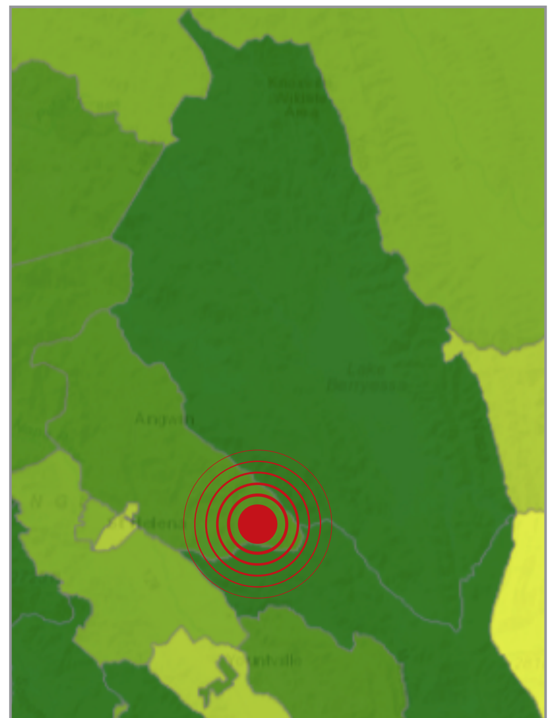
CalEnviroScreen 3.0 Results (June2018 Update)



Lake County



Napa County

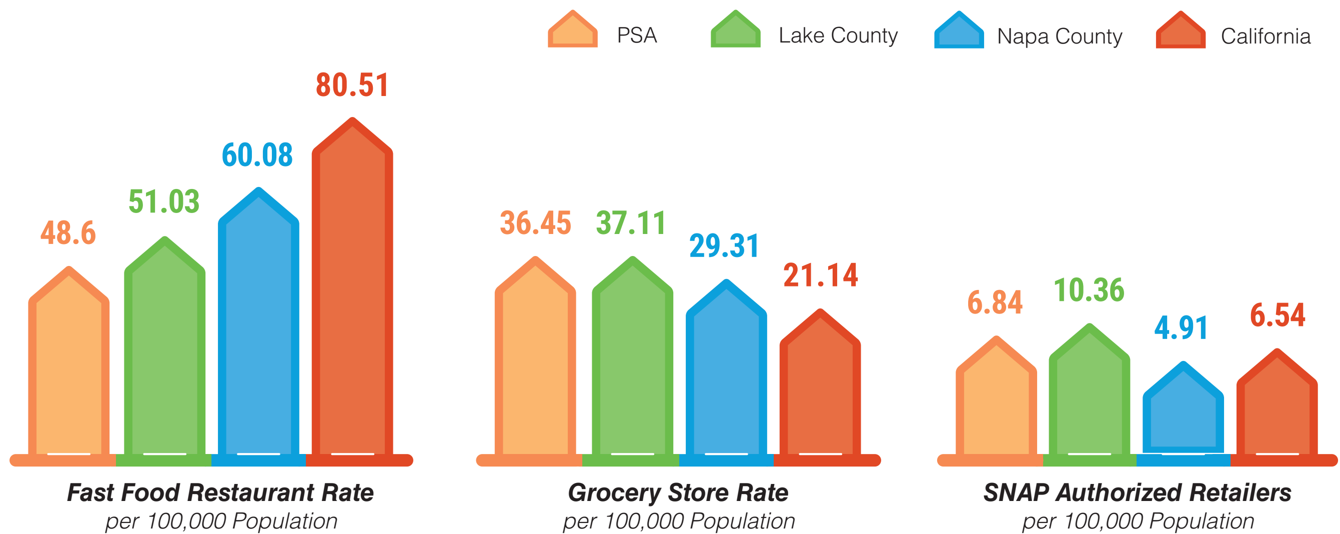


Data Source: Office of Environmental Health Hazard Assessment. CalEnviroScreen 3.0 Overall Results and Individual Indicator Maps, June 2018. Retrieved May 2019 from https://oehha.ca.gov/calenviroscreen/maps-data

Retail Food Environment

Understanding the retail food environment is important to determining access to healthy foods for populations and overall environmental influences on dietary behaviors.

Three indicators are important to consider: the fast food restaurant rate, the grocery store rate, and the number of retailers authorized to accept Supplemental Nutrition Assistance Program benefits (all calculated as establishments per 100,000 population). Areas with a high fast food rate, low grocery store rate, and low SNAP authorized retailers will inevitably have populations with higher rates of food insecurity, due to lack of access to healthy and affordable foods. AHSH PSA had the lowest fast food restaurant rate, grocery store rate, and SNAP authorized retailers as compared to Lake and Napa County per 100,000 population.

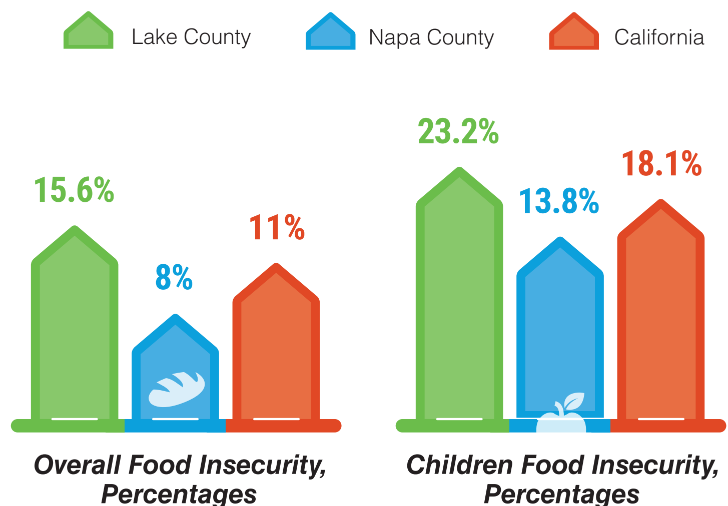


Data Source: CARES Engagement Network (2019). US Census Bureau, County Business Patterns. Additional data analysis by CARES. 2016. US Department of Agriculture, Food and Nutrition Service, USDA - SNAP Retailer Locator. Additional data analysis by CARES. 2019. Retrieved May 2019 from https:// engagementnetwork.org/assessment/

Food Insecurity

The US Department of Agriculture defines food insecurity as a lack of access, at times, to enough food for an active, healthy life for all household members and limited or uncertain availability of nutritionally adequate foods. Food insecurity may reflect a household's need to choose between important basic needs, such as housing or medical bills, and purchasing nutritionally adequate foods.

Food insecurity averages in Lake County for the overall population (15.6%) and children (23.2%) are higher than reported averages for the state (11% and 18.1%, respectively). These averages are higher than Napa County.

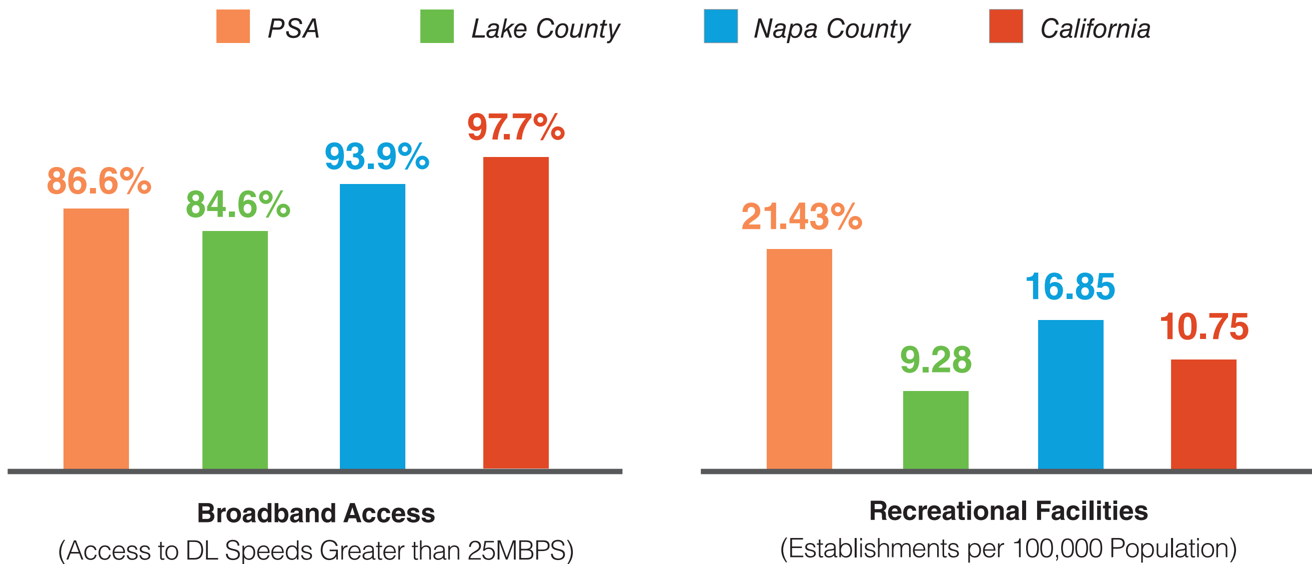


Data Source: Feeding America (2016). Map the Meal Gap, Online Tool. Retrieved May 2019 from http://map.feedingamerica.org/.

Built Environment

The term “built environment” refers to the human-made surroundings that provide the setting for human activity, ranging in scale from buildings to parks. It has been defined as “the human-made space in which people live, work, and recreate on a day-to-day basis.” Factors to consider include access to recreational facilities and fitness centers and access to broadband internet access. Access to high-speed internet is important because access to technology opens up opportunities for employment and education. Access to recreational facilities encourages physical activity and other healthy behaviors.

AHSH PSA (86.6%) had higher access to high-speed Internet as compared to Lake County (93.9%). AHSH PSA had higher recreational facilities (21.43) as compared to Lake and Napa County (9.28 and 16.85, respectively).



Data Source: CARES Engagement Network (2019). National Broadband Map. Dec. 2017. US Census Bureau, County Business Patterns. Additional data analysis by CARES. 2016. Retrieved May 2019 from https:// engagementnetwork.org/assessment/

How is the region doing?

- Lake County ranked 35-40% and Napa County ranked 35-40% percentile on the CalEnviroScreen 3.0 index for pollution. This means that these areas have a moderate pollution burden, populations especially sensitive to these factors, and socioeconomic factors that increase vulnerability to pollution.
- AHSH PSA had the lowest fast food restaurant rate, grocery store rate, and SNAP authorized retailers as compared to Lake and Napa County per 100,000 population.
- Food insecurity averages in Lake County for the overall population (15.6%) and children (23.2%) are higher than reported averages for the state (11% and 18.1%, respectively). These averages are higher than Napa County.
- AHSH PSA (86.6%) had higher access to high-speed Internet as compared to Lake County (93.9%). AHSH PSA had higher recreational facilities (21.43) as compared to Lake and Napa County (9.28 and 16.85, respectively).

Voices from the Community

A CHNA would not be complete without hearing from the local community. Those chosen to provide input, represent the diversity of our community and those who are medically underserved, low-income and minority populations.

Overview

From December 6, 2018 to April 8, 2019, focus groups and key informant interviews were administered. Approximately 46 people were surveyed to obtain input from the community in the form of 4 focus groups (with a total of 36 focus group participants) and 15 key informant interviews. A full description of key informants and focus group participants can be found in the Appendix D of this document.

Focus Group

Focus group participants were end-users of programs and services provided by AHSH. Populations represented by focus group members included Promotoras, seniors, low-income, homeless/at-risk and representatives from the education sector. The majority of focus group participants live in Napa County, specifically in Santa Rosa, Yountville, St. Helena, and Calistoga.

Key Informant Interview

Key informant interviews consisted of key leaders in our community from an array of agencies, including those that serve children, homeless populations, seniors and community at large populations. Additionally, key informant interviews were conducted with representatives from the non-profit, educational, homeless, law enforcement, and faith-based sectors. The majority of the people interviewed serve residents in Napa County, specifically in in Santa Rosa, Yountville, St. Helena, and Calistoga. Additional localities identified for the service areas were Rutherford, Ronald Park, Deer Park and Hope Valley. Most key informants hold titles such as Executive Directors or Presidents, Superintendent, Mayor, and Head Pastor.

Methodology

To determine focus groups and key informants, AHSH team members were provided with a list of sample sectors for consideration that included: community-based organizations, local businesses, foundation/funders, school board/districts, city council, public health department, law enforcement, legal, faith-based organizations, and hospital leaders. Additionally, they were asked to consider the following criteria:

- Does this person represent a vulnerable populations?
- Does this person represent the uninsured/ underinsured population?
- Does this person's role transcend more than one county?
- Do we have representation from all sectors?
- Does it meet the requirement of community health needs assessments?
- Does this person's role cross sectors?

Additionally, they were asked to consider the following populations for inclusion in focus groups: those dealing with mental health issues or substance abuse, minorities, low-income, uninsured/underinsured, and youth populations. While members considered potential groups and venues, they were asked to keep the following criteria in mind:

- Does this focus group represent a medically underserved, low income, or minority population(s)?
- Can this focus group speak to pressing health care issues in our community (i.e. children's health, mental health, or access to care)?
- Does this focus groups represent diverse populations or health issues?
- Can this focus group speak to the social determinants of health in our community?

Objectives

Through engaging the community our objective was to discover strategies in which our hospital could collaborate to better serve communities and elevate the health status of our region. To better understand the needs, the focus groups and key informant interviews concentrated on these themes:

- Visions of a Healthy Community
- Health and Social Needs
- Existing Resources
- Barriers to Accessing Resources
- Hospital Perception and Opportunities

Additionally, key informants were asked about the greatest health and social needs of children, services that could improve health in the community, barriers for clients from an organizational perspective, and for any additional feedback.

Findings — Significant Health and Social Needs

The focus groups, key informants, and surveys contained questions about the most significant health needs in the community. Based on those responses, prioritization was given to issues most frequently mentioned. The top five mentioned below are a combination of all three data sources based on frequency of response.

The priority needs were identified by first creating codebooks based on the focus group, key informant interviews, and open text responses from the online survey. The codebooks assisted in combining the separate themes for comparison and analysis. The three sources were coordinated to supply richer interpretation when applicable. Using secondary sources, county information was gathered and compared with the themes found in the focus groups, key informant interviews, and surveys. Table 1 displays the separate ranking of most frequently mentioned health issues by focus group and key informant interviews. The overarching themes based on the amount of times the issue was mentioned across all three data sources are:

Table 1. Order of Most Frequently Mentioned Issues by Data Source Type

	Focus Groups	Key Informant Interviews
1	Mental Health	Mental Health
2	Access to Healthcare	Access to Healthcare
3	Chronic Diseases	Housing
4	Dental	Chronic Disease
5	Vision	Nutrition

Supporting Quotes

"…one of the biggest drivers of lost productivity meaning, people's missing work due to disability is depression. Well, that obviously links to emotional health. So, people's ability to have healthy relationships whether it's with their family, whether it's at school, whether it's on the job, whether it's in the community, is they have to have the ability to deal with mental health issues that arise most commonly it's depression anxiety. Both of which are can are often byproducts of trauma or stress. And we live in a very stressful world."

"For me, I think it's access. Not to health care but it's access to doctors. I spent over 13 months trying to find a neurologist. The doctors were kind of pushed out of the hospital and then eventually pushed off into the community and they added office space and then eventually they got pushed out of there. And now I'm down on the Santa Rosa for some, I'm in Napa for some. So, the specialty areas were pushed out."

"There's a lot of, like other communities, there's a lot of obesity across the board not just childhood but adults and older adults. It's just that the problem that we are battling across the board, across the world. But it's definitely here as well."

"Housing is a theme that just comes up repeatedly no matter what meeting you're in. I think there is a lack of affordable housing in Napa County, especially for workforce and young families and housing costs are very very high. And that cost burden really interferes with people's ability to meet their other basic needs like food, health care and medications for older adults to be able to stay in their communities so that that influences the social connectedness."

"…food -insecurity food access and food insecurity. So, people not being able to access affordable, healthy nutritious food."

Findings by Themes

Visions of a Healthy Community

The main themes surrounding the vision of a healthy community is collaborative, inclusive, all-encompassing at addressing social, emotional, health, and environmental needs of the residents within the community according to key informant and focus group participants. This theme was characterized by affordable and quality housing, affordable and access to healthy foods, safe neighborhoods, walkability, clean air and water environment that is free from pesticides, and inclusivity regardless of race and sexual orientation. Additionally, a community that has accessible healthcare that includes not only physical structures such as clinics and hospitals, but also access to diverse medical specialties, to information and activities that contribute to good health and education complete the vision of a healthy community.

Supporting Quotes

> *"A community where such factors as environment, education, water, food, transportation, chemical use etc. are all factored in to provide the highest possible quality of life and long-term health for our community."*

> *"I would say my vision of a healthy community is one where you have broad measures of health and you look at health from a larger perspective. Meaning, physical, mental emotional, that people have basic needs food, clothing, shelter that it's accessible and affordable and that they have opportunities for recreation. So, I think all the different components are socially connected. They have meaningful relationships. There're opportunities for education and employment. There are good environmental standards."*

Social Factors

Homeless and working poor were two of the main themes that emerged as social factors that were frequently mentioned by focus group participants and key informants. Income and education were intertwined with ability to afford housing, seeking health and social services, and food insecurity. Additionally, working poor, according to respondents includes the inability to afford housing and other basic necessities while employed, not having enough time to spend with children due to working multiple jobs, inconsistent employment schedules (seasonality), and not being able to afford co-pays and/or insurance.

Supporting Quotes

> *"I have friends who are living in their car with kids. It's not illegal to be homeless with your child. it's not a danger to your child."*

> *"…I think there's a tremendous amount of stress right now in the immigrant community. Which makes up a large segment of the population in Napa Valley. They are just under a lot of stress and strain and there's a lot of political stuff impacting their community that's been extremely difficult."*

> *"We're in a high cost of living area and our compensation levels are not what they are in other parts of the Napa Valley."*

Health Needs of Children

Among key informants and focus groups, responses included social, emotional, and mental health aspects of children's health and well-being. The biggest health issues among children was physical activity, obesity, and lack of activities. Additionally, housing, nutrition education, social/emotional resources, quality education, stress/ anxiety, emergency pediatric care, quality and affordable infant and preschool were mentioned.

Supporting Quotes

> *"Don't just look at the academics, look at the whole child - social, physical, emotional and the mental health part of it – everything."*
>
> *"I think the housing situation is important. You know, we know, that when children have to repeatedly move housing to different communities or schools, that can have impacts on education and behavior problems and also the possibility that children are living in substandard housing."*
>
> *"I think for our school aged youth, one of the things that we've heard quite a bit is that there's just not enough kind of recreational things for them to do that are free and accessible after school or during the summers. So that's a concern and it can lead to kind of more problematic behaviors like using substances or obesity."*

Existing Community Assets and Resources

The most commonly mentioned community assets and resources was the spectrum of organizations that are working to make the community better. They were proud that they have a mixture of social and educational services to meet senior needs as well as those of working adults. Some of the main resources and assets mentioned by focus groups were after school sports, WIC services, food banks, city park and recreation offerings, and the Boys and Girls Club.

Supporting Quotes

> *"We really have a pretty amazing spectrum of organizations and agencies that are all individually trying to meet facets of what are perceived needs."*

Barriers to Access

The greatest responses to barriers to access include financial resources, immigration status, and availability of clinical, specialty, and social support resources. Additionally, lack of transportation, language barriers, limited knowledge of available resources, the increased distance people must travel for care, perceived social and economic limitations and disparities, and insurance coverage were also mentioned as barriers across key informant and focus group respondents.

Supporting Quotes

> *"I think the community works a lot to pay for services. The stress we feel to pay for rent, to pay for health services. I'd rather wait until I absolutely have to. If I go to the doctors, the services are there but the insurance and co-pays are very expensive. Not just here in Calistoga, I think it's the stress of the high cost of all the services."*

“Public transportation is tough around here. So, getting to and from the hospital or to and from appointments, and again, you know a lot of our patients come from hours and hours away. So, a lot of times they might be here, but their family is not able to be involved in their treatment because they can’t get here.”

“Income disparities, access opportunities are more available to those with greater means. Access to transportation maybe a parent who has the freedom to transport their kids to various activities, there are very affluent families and then those living in special neighborhoods with low income housing and, you know, that may be exacerbated by only one car and dad has that at work or both parents are working and there’s nobody to get help the kids get access to these things.”

Hospital Perception and Opportunities

Positive perceptions of the hospital were indicated by both focus group and key informant respondents. There were several comments related to recent improvement by the hospital regarding community outreach efforts within the community and at schools through health fairs and other health education forums. Opportunities identified include communication and partnerships that involved collaborating with others. As one key informant mentioned, operating in silos does not help with population health. Additionally, some focus group respondents still want to see more involvement from the hospital at different levels within the community.

Supporting Quotes

“I think it’s a tremendous asset personally to have St. Helena Hospital as well funded for this size of the community, it’s probably unheard of.”

“I think they could be present; I think they could be more involved on other levels of the community.”

“I think it’s a recognition that you can’t operate in a silo. You can’t do that out of from a silo you have to be partnering, leveraging resources. You have to be collaborating because population health is really driven by social determinants of health. And part of that is within the purview of a hospital and part of that involves other entities and players. So, if we all buy into the concept of population health broadly physical, mental, emotional and all different levels then I think it requires us to join forces and work together and I think.”

Prioritization of Health Needs

Priority health issue and baseline data

On September 24, 2019 the Mission Integration Sub Committee met to collectively review the findings of this assessment and prioritize the top priority needs Adventist Health St. Helena and partners involved will address over the next three years.

Identified community health needs

Priority Health Issue	Rationale/Contributing Factors
Mental and Behavioral Health • Anxiety • Stress • Depression • Substance Abuse	Mental and behavioral health was the number one mentioned health needs among the focus groups and key informant interviews. Anxiety, stress, and depression were consistently mentioned across both groups of respondents. Napa county is slightly higher than the state average and Lake County is 1.25% higher than the state average in poor mental health days. Lake County (29.3) has a significantly higher mortality rate per 100,000 people than Napa County (10.1) and the state (10.4) mortality rates. Among the Medicare population, depression for Lake County (16.6%) is slightly higher than Napa County (15.9%) or the state (15.8%) estimate. Age-adjusted drug induced deaths in Lake County (40.4) are approximately 3.5-4% higher than Napa County (10.4) or state (12.7) estimates.
Access to Health Care • Providers (including specialist - dentists/ optometrists) • Affordable insurance	As a critical component of measuring community health, access to health care was the second highest mentioned across the focus groups and key informant interviews. This theme encompassed higher visits to the emergency room as a result of limited specialist resources in the community. Care providers, specifically geriatric, pediatric, and mental health, were most frequently mentioned in the focus groups and key informant interviews. Asthma related ED visits are an indicator of managed asthmatic problems and access to primary care providers. Lake County (80.1) is almost double Napa county (40.2) or the state (46.9) visit rate per 100,000 people. The mental health provider rate in Lake County (342.4) is slightly higher than the state (327.8) but significantly less that Napa County (497.9) per 100,000 people. Dental providers for Lake County (45.1) are nearly half the state (83.4) estimate and Napa County (89.4) per 100,000 population.

Priority Health Issue	Rationale/Contributing Factors
Chronic Disease • Obesity • Diabetes • Cancer	Obesity and Diabetes were the most frequently mentioned chronic diseases across age groups and focus group and key informant respondents. Napa County Medicare population has the lowest rates of obesity (21.1%) and heart disease (24.4%) as compared to the state. The amount of exercise is an indicator of obesity. Access to exercise opportunities is significantly lower in Lake County (64.8%) than in Napa (92.4%), which is closest to the state (93%) estimate. Diabetes is in the top 10 leading causes of death for Napa County. Multiple forms of cancer appear for Lake and Napa counties in the top 10 leading causes of death. Lung Cancer is ranked higher than any other forms of cancer between the two counties.
Housing and Homelessness	High cost of living and homelessness were frequently mentioned across focus group and key informant participants as a major health need. Inadequate housing or moving frequently is a stressor that affects the total well-being of an individual. Housing intersects with mental health, chronic disease, nutrition, and ability to access consistent care. Residents in both Lake County (40.4%) and Napa County (38.7%) counties experience cost-burdened households that are slightly lower than the state (41.9%) estimate.
Access to Healthy Foods	Fast food restaurants and grocery stores rates per 100,000 are indicators for obesity. Lake and Napa counties are lower in fast food restaurant rates (51.03, 60.08) and higher in grocery store rates (37.11, 29.31) than the state (80.51, 21.14). Food insecurity directly correlates with nutrition. Lake County (15.6%) has a higher percentage of overall food insecurity than Napa County (8.0%), which is lower than the state. Children's food insecurity is significantly higher for Lake County (23.2%) than Napa County (13.8%) or the state (18.1%). SNAP authorized retailers in Lake County is higher than Napa County and higher than the state estimate.

Prioritization process and criteria

On September 24, the Adventist Health St. Helena Mission Integration Sub Committee met to collectively review the findings of this assessment and determined the top priority needs that Adventist Health St. Helena and partners involved will address over the next three years. Stakeholders agreed on the criteria below to consider when making a decision. The criteria listed recognize the need for a combination of information types (e.g, health indicators and primary data) as well as consideration of issues such as practicality, feasibility, and mission alignment.

- Addresses disparities of subgroups
- Availability of evidence or practice-based approaches
- Existing resources and programs to address problems
- Feasibility of intervention
- Identified community need
- Importance to community
- Magnitude
- Mission alignment and resources of hospitals
- Opportunity for partnership
- Opportunity to intervene at population level
- Severity
- Solution could impact multiple problems

After tallying the results, there was a discussion to validate the needs. The top priority needs for 2019-2022 are:

Access to healthcare

- Access to providers - including specialist, dentist, optometrist
- Affordable insurance

Chronic disease

- Obesity
- Diabetes
- Cancer

Mental and behavioral health

- Anxiety
- Stress
- Depression
- Substance Abuse

Housing and Homelessness

The voting members in attendance were:

- Karla Newton
- Dr. Steve Herber
- Dr. Timothy Lyons
- Jodi Brownfield
- Alfonso Trejo, Jr.
- Nelu Nedelea
- Pacific Union College – Angwin
- Fabio Maia
- Adventist Health Corporate
- Shelly Trumbo (by phone)
- Community Leaders
- Jenny Ocon – Up Valley Family Center
- Julie Spencer -Rianda House
- Rob Weiss – Mentis

Addressing Identified Needs

Plan development

Adventist Health St. Helena will develop strategies to address each need identified in this community health needs assessment. Strategies will be documented in a community health improvement plan (CHIP). The CHIP will describe how AHSH plans to address the health needs and plans to commit, potential partners, and metrics used to evaluate success. If AHSH does not intend to address the need, the CHIP will explain why.

The CHIP will describe the strategies intended to address the health needs and anticipated impact and partnerships. Partnerships are an important to addressing health needs, the CHIP will also describe any planned collaboration between AHSH and other facilities/organizations in addressing the health needs. The improvement plan will be made available May 2020.

Top Health Needs Identified for 2019-2022:

Access to healthcare

- Access to providers - including specialist, dentist, optometrist
- Affordable insurance

Chronic disease

- Obesity
- Diabetes
- Cancer

Mental and behavioral health

- Anxiety
- Stress
- Depression
- Substance Abuse

Housing and Homelessness

2016 Evaluation

Evaluating our efforts encourages accountability to the communities we serve and allows us to share our successes. This section evaluates the impact of actions that were taken to address the significant health needs identified in the prior community health needs assessment and associated implementation strategy (i.e. community health improvement plan) for 2017-2018. These outcomes are related to priority needs that were identified in the 2016 CHNA cycle.

Adventist Health St. Helena identified specific multi-year community benefit strategies to direct its resources and work with others in achieving unmet needs in the area. The following tables provide an update on progress made over the past cycle in meeting the measurable metrics targeted for 2017-2018. Results for 2019 have yet to be completed. More detailed and complete findings can be found in hospital's implementation plan/community benefit report.

Priority Need: Mental Health

Intervention: Utilize the Center for Behavioral Health in Vallejo to expand services in Napa and Solano Counties - Opened a new Behavioral Wellness Center in Vacaville, California.

Adventist Health Vallejo recognized the need to expand access to mental health services in Solano County. After extensive research, it was determined there was high demand for an intensive outpatient program focused on adults suffering from debilitating symptoms of mental illness. Launched in December of 2017, the Behavioral Wellness Center allows individuals to receive thorough treatment in a less restrictive environment than that which is offered in inpatient treatment or residential care. Yet, it provides a more structured therapeutic setting than that which is typically offered in a traditional outpatient setting.

Led by a multidisciplinary team, the Center offers evidence-based, innovative programs, including cognitive behavior therapy and dialectical behavioral therapy. Flexible treatment options, combined with convenient, flexible schedules will help meet patients' needs so they can access care close to home.

Intervention: Recruited three psychiatrists to provide mental health services at Adventist Health Vallejo and Adventist Health St. Helena to serve children, adults and seniors

In an effort to expand access to treatment options for mental health disorders, Adventist Health St. Helena and Adventist Health Vallejo worked together to recruit three new physicians, including Sarah B. Benington, DO, Julie Oldroyd, MD and Heather Lewerenz, MD. These three physicians bring exceptional skills and talent and helped us to meet the growing needs of inpatient psychiatric care. In 2017, they were able to conduct more than 1,750 patient visits combined at both Adventist Health St. Helena and Adventist Health Vallejo.

Intervention: Sponsored Mentis, an organization that provides mental health services for teens.

In an effort to expand access and increase awareness of mental health disorders, Adventist Health St. Helena proudly sponsored Mentis, Napa's center for mental health services to expand access to mental health services and counseling for children in 2018. Mentis' School-Based Program works closely with the Napa, Calistoga, Howell Mountain and St. Helena to provide counseling to children and teens in elementary, middle and high schools struggling with depression, violence, and family conflicts that are causing emotional, behavioral and academic problems. Mentis' therapists work closely with the student and their families to address and resolve problems that are having a significant impact on high risk youth in Napa County.

Intervention: Provide inpatient mental health care for seniors.

Adventist Health St. Helena is working to reduce the gap in services available for our community as it relates to mental health. Our dedicated senior behavioral health unit provides inpatient mental health services for those in need and is the only unit of its kind in the North Bay.

Intervention: Increased outpatient mental health services by expanding available appointments and hours.

Transitioned Dr. Haycraft from part-time inpatient hospital and part-time outpatient clinic setting to full-time clinic setting allowing for additional appointments in clinic and increasing access to immediate mental health resources.

Intervention: Provided community education from an expert psychologist in gun violence to address community fears and help heal after a tragic gun violence incident in the community.

In response to the horrific and tragic gun violence incident that occurred at the Yountville Veterans Home in early 2018, Adventist Health St. Helena held a free community wide presentation and education session in English and Spanish led by expert psychologist Dr. Amy Barnhorst. Approximately 80 community members attended. Dr. Barnhorst addressed the current status and capabilities of our mental health system, gun control and how mental health actually relates to gun violence in the United States. She also discussed healing after such event and resources that are available in the community to all members.

Partner:

- Mentis

Measured Impact

Objective	Baseline Measurement	Performance Target	Intervention	Measurement Update
Expand access with an intensive outpatient program offered via the new Behavioral Wellness Center	2017: 0	0 for 2017	48	Patient visits
Increase access to inpatient services in Napa and Solano County by recruiting three physicians	2017: 0	1,500 patient visits	1,750 patient visits in 2017	AH finance
Create awareness, educate and provide access to mental health services in Napa County through sponsorship of Mentis	2017: 956 individuals	956 will be made aware of mental health disorders through educational programs	48	Patient visits
Increase awareness and treatment of mental health in Napa Valley	2018: # of patients served for mental health services	100% of persons who need services are able to access needed services	55	Patients/Clients
Increase awareness and treatment of mental health in schools through Teens Connect and Mentis	2018: 300 individuals in target audience	100% awareness	300	Mentis
Increase outpatient services	2018: Patient visits	100% of persons who need services are able to access needed services	936 patient visits	Patients/Clients

Priority Need: Obesity and Diabetes

Intervention: Farmer's Market

Through local growers, Adventist Health St. Helena sourced farm fresh produce for a monthly farmers' market available onsite at Café 1878. Employees and community members received food demonstrations and had the option to purchase farm fresh produce once a month.

- 2018 - Total number of people served is approximately 480 people.
- 2017 - Total number of people served is approximately 480 people

Intervention: Wellness Fair for St Helena Unified School District

Adventist Health St. Helena worked together with the St. Helena Unified School District to put together a wellness curriculum that teaches students about mind, body and spirit health. The day's events included education on health snacks, sleep, exercise interventions provided by TakeTEN, and Adventist Health St. Helena's lifestyle medicine program that specializes in helping people to optimize their health through lifestyle and ten proven health habits.

- 2018 - Total number of people served is approximately 285 students.
- 2017 - Total number of people served is approximately 600 students..2017 - Number of Community Members Served: 69.

Intervention: Lead community partners to pursue Blue Zones in Upper Napa Valley

Adventist Health St. Helena opened the eyes of the upper valley community leaders on the benefits of becoming a Blue Zone. Through a series of meetings extended over a 90-day time period. The project was very well received – so much in fact that scope of the project has expanded geographically to include the entire county. At this stage Blue Zones has presented a revised proposal based on a revised scope of work for the entire county and we are awaiting responses from key leaders on next steps to initiate fundraising for the project.

- 2017 - More than 120 leaders of business, government, restaurant, hotel, wine industry, education and city officials participated to help find how we can work together to help our community live longer, healthier and more active lives.

Intervention: Utilize physicians, integrative medicine specialists, and nutritionists to educate parents and students on health-related topics

Adventist Health St. Helena proudly sponsored a series of educational events that helped to educate the public on variety of health topics taught by physicians and dietitians. The Awaken Series is one example of many in which we brought subject matter experts to the community on prevention and quality of life topics as it relates to cancer. In addition, in 2017 we sponsored a monthly Heart Lecture Series whereby we were able to bring in leading cardiac experts who focused their talks on new treatment options for Afib, valves and atherosclerosis.

- 2018 - Total number of people served is approximately 90 community members. In addition, a monthly senior health education series in Calistoga was sponsored that highlights different health-related and self-care topics presented by specialists in each field.
- 2017 - Total number of people served is approximately 273 community members (207 community members in Napa County. We also conducted a lecture on orthopedics and joint replacement which served a total of 109 community members in Napa County and 110 community members in Solano County. We also participated in several educational events surrounding women's heart health, in conjunction with the American Heart Association. Through these events we were able to serve a total of 67 community members).

Intervention: Include prenatal and early life nutrition as a topic in prenatal programs

Adventist Health St. Helena extended prenatal and early life nutrition into its curriculum of its series of twenty free child birth education classes offered over the year. This program teaches them the importance of prenatal health and good nutrition to optimize the health of both the expectant mother and their newly born child.

- 2018 - Total number of people served is approximately 260 mothers and fathers.
- 2017 - Total number of people served is approximately 260 mothers and fathers.

Intervention: Enhance diabetes education program to accommodate for more of the community, including Spanish speaking patients

Adventist Health St. Helena provided our community with access to a free four-week diabetes education class in St. Helena. The free class series helps participant learn how simple lifestyle choices can make all the difference. Plus, participants have an opportunity to meet one on one with a registered dietitian where they work together to tailor a plan around the participant's health and lifestyle.

- 2018 - Total number of people served is approximately 47 community members.
- 2017 - Total number of people served is approximately 184 community members

Intervention: Provide free community exercise programs to encourage physical fitness and weight management.

Together with the City of St. Helena Parks and Recreation department, we were able to introduce a free exercise class where members gathered in the park on a weekly basis, encouraging community members to get outside, get moving and take control of their health.

- 2018 - Total number of people served is approximately 130 community members.
- 2017 - Total number of people served is approximately 273 community members (207 community members in Napa County. We also conducted a lecture on orthopedics and joint replacement which served a total of 109 community members in Napa County and 110 community members in Solano County. We also participated in several educational events surrounding women's heart health, in conjunction with the American Heart Association. Through these events we were able to serve a total of 67 community members).

Partners:

- St. Helena Unified School District
- Blue Zones
- Napa County Health Department
- American Heart Association
- Up Valley Family Centers
- City of St. Helena Parks and Recreation

Measured Impact

Objective	Baseline Measurement	Performance Target	Intervention	Measurement Update
St. Helena Unified School District **What is the objective?**	Participation of students	600 students	600 students	School roster
Introduce Blue Zones **What is the objective?**	Engagement with the community leaders	2017: Initiation of project	600 students	School roster
Diabetes Education Classes	# of participants	2017: 150	2017: Self-Reported	School roster
Increase accessibility to healthy foods	2018: 0	2017: 150	600 students	School roster
Increase education about healthy eating and active living	Knowledge of healthy foods and exercise patterns	2017: 200 people to participate in classes 2018:	2017: 575 participants in community education events in Napa County	2017: Patients/ Clients
Increase opportunities for physical activity	0	2018: % of person participating in opportunities	2017: Patients/ Clients	School roster

Priority Need – Access to Health Care

Intervention: Recruited seven physicians into the network to provide specialty services, including urology, cardiology, cardiac electrophysiology and psychiatry.

Measured Impact

Objective	Baseline Measurement	Performance Target	Intervention	Measurement Update
Expand accessibility to care	2017: 0	2017: Recruit seven physicians Dr. Andreossi, Urology Dr. Potter, General Surgery Dr. John Laird, Interventional Cardiology Dr. Dan Kaiser, MD, Cardiac Electrophysiology Dr. Sarah Benington, DO, Psychiatry Dr. Heather Lewerenz, Psychiatry Dr. Julie Oldroyd, Psychiatry	2017: The total number of patient visits between all seven physicians in 2017 was 4,242 patient visits.	Self reported

Priority Need – Access to Health Care and Dental Care (Dental Care was added in 2018)

Intervention: Launched Dare to C.A.R.E program providing free heart and vascular screening for seniors

Adventist Heart & Vascular Institute launched Dare to C.A.R.E, a free screening for those who qualify to detect carotid artery disease, abdominal aortic aneurysm, renal artery disease and extremity artery disease. This ultrasound screening provides the public with education about the unrecognized risks of vascular disease. Countless lives can be saved by teaching people about vascular disease and options they have for pre-emptive treatment. Adventist Heart & Vascular Institute launched Dare to C.A.R.E, a free screening for those who qualify to detect carotid artery disease, abdominal aortic aneurysm, renal artery disease and extremity artery disease. This ultrasound screening provides the public with education about the unrecognized risks of vascular disease. Countless lives can be saved by teaching people about vascular disease and options they have for pre-emptive treatment.

- 2018 Total number of people served a total of 21 screenings completed in 2018 in Calistoga, CA.

Intervention: Provide specialty care and surgical services to low-income, uninsured patients

Adventist Health St. Helena is a proud partner of Operation Access. Together with other community partners we are able to provide quality specialty care for low-income, uninsured patients. This work improves individual lives as well as the community as a whole. In 2017, the physicians who provide services includes Abhishek Choudhary, MD, Gastroenterology Stephanie Kekulawela, MD, General Surgery John H. Kirk, MD, Gynecology, Eugene Lam, MD, Gastroenterology Mark Potter, MD, General Surgery Andreas Sakopoulos, MD, Cardiothoracic Surgery and Huber Anesthesiology Group. Six physician volunteers provided 37 surgical and diagnostic procedures for 30 individuals at Adventist Health St. Helena. Of those who benefited from the services, 97% of the patients were very satisfied with their experience and 96% reported improved health, 90% reported that it improved their ability to work and 93% reported that it improved their quality of life.

Partners:

- Operation Access

Measured Impact

Objective	Baseline Measurement	Performance Target	Intervention	Measurement Update
Expand accessibility to surgical and specialty care	2018: % of persons with a primary care doctor	2018: 100% of persons with an assigned doctor	2018: 37	2018: Patients/ clients

Priority Need – Cancers

Intervention: Implemented a comprehensive hereditary cancer screening program offered through clinics throughout Napa county. Implementation of a Hereditary Cancer Risk Assessment (HCRA).

To support the program, Candace Westgate, DO, unified a team of specialists in the fields of oncology, oncologic surgery, plastic surgery, hematology, internal medicine, obstetrics, gynecology, dermatology and gastroenterology to work together to launch the county-wide effort. Through HCRA screenings offered through primary care clinics, patients learned if they are predisposed to familial and hereditary cancers. This has proven to improve patient care and population outcomes by assisting patients who have a suspected hereditary cancer syndrome in the early identification of cancer.

Through the support of the Hereditary Cancer Consortium those patients who tested positive are now able to access specialty care to ensure adequate surveillance and/or screenings to align with their type of cancer and condition.

- 2017: More than 454 patients who elected to participate in the Hereditary Cancer Risk Assessment (HCRA). A total of 28 patients tested positive and are now undergoing increased surveillance or tests to understand the extent of their risk, while 426 patients tested negative and can feel confident in knowing they are not at risk of hereditary cancer syndrome.

Intervention: Prevention – Provide access to lung cancer screening program throughout Napa and Lake counties.

Adventist Health St. Helena continues to offer patients access to the Lung Nodule and Early Detection Lung Cancer Screening Program, a program designed to promote earlier detection, more accurate treatment options with early detection, access to advanced technologies and procedures for diagnosis and treatment of lung cancer and the dedicated support of a specialized Lung Health Nurse Navigator.

To support the program, Adventist Health St. Helena provided access to reduced dose CT screenings. According to the New England Journal of Medicine, early CT screenings have proven to increase survival rates by as much as 30% compared to traditional chest x-rays. To make this technology more accessible to all patients, we are offering a discounted rate for high risk patients who qualify.

As part of the program, the hospital continued to offer access to the iLogic Lung Navigation System from Super Dimension which uses Electromagnetic Navigation Bronchosocopy (ENB) to provide a minimally invasive pathway to peripheral lung nodules. With this technology, our physicians are better able to locate, test, and plan treatment for lung nodules and lymph nodes difficult to access with traditional bronchoscopy.

In addition, the program also includes Endobronchial Ultrasound (EBUS), a relatively new procedure used in the diagnosis of lung cancer, lung infections, and other diseases that cause enlarged lymph nodes or masses in the chest. EBUS is a minimally invasive procedure, so patients can have it on an outpatient basis. It is proven to be highly effective. Technology allows physicians to sample central lung masses and lymph nodes with the help of ultrasound guidance.

Intervention: Prevention – Provide access to education around early detection and prevention.

The Martin-O'Neil Cancer Center sponsors a series of educational events for the community focused on cancer prevention. In 2017, the series included topics such as quality of life, and the power of prevention with a plant based diet, among other topics. The events have brought in hundreds of community members to learn from leading experts and is relied upon for family members whose loved ones are undergoing treatment themselves.

- 2017 - Approximately 276 community members attended the program.

Intervention: Prevention – Provide access to support services to individuals undergoing treatment for cancer and/or caregivers or family members who are supporting a loved one who is undergoing treatment for cancer

- Integrative Cancer Support Services are an integral part of the Martin-O'Neil Cancer Center. They provide patients with emotional, physical and spiritual support through all stages of cancer survivorship. The following support services help to strengthen the body, nurture hope and courage, and enrich the spirit:

- Acupuncture
  Proven to be a valuable treatment for a number of side effects associated with cancer treatment such as anxiety, depression, fatigue, insomnia, nausea, neuropathy or pain. We treated 580 patients in the year 2017 alone with acupuncture.

- Massage Therapy / Aromatherapy
  Our Cancer Center offers daily therapeutic massage to patients, their family members and caregivers to relieve stress, reduce pain and anxiety and encourage overall relaxation. In addition, we offer the practice of using natural oils to enhance psychological and physical wellbeing. These are skillfully offered by our massage staff to enhance the healing process.

  A high percentage of patients in the Martin-O'Neil Cancer Center utilize both of these services as they are offered throughout the day in the both the lobby and infusion areas. We provide every new patient two complimentary full body massages.

- Art Therapy
  Expressive art therapy groups are designed to allow individuals to experience thoughts, feelings and emotions through the art making process. The classes are offered the last Wednesday of the month, February - November. Approximately 96 patients participated in Art Therapy in 2017.

- Food of Love
  A complimentary food support program whereby nutrient dense, delicious meals are provided to Martin-O'Neil Cancer Center patients. The Center provided 960 meals in 2017.

- Nutrition Counseling
  Our Oncology Certified Registered Dietitian will meet with you and discuss your personal nutritional needs and guide you with specific dietary recommendations.

- Patient Counseling
  An Oncology Board Certified Licensed Clinical Social Worker meets with you and/ or your loved ones to assess your emotional well-being and provide support as needed.

- 2017 - Total number of people served is approximately 672 community member and participated actively in the services listed above, whether it was a patient or a family member or friend of a patient.

Intervention: Partnered with ZERO Prostate Cancer to promote education and awareness of prostate cancer prevention and treatment to approximately 3,600 community members

In 2018, Adventist Health St. Helena's Martin O'Neil Cancer Center is a proud sponsor of the Zero Prostate Cancer Napa Valley, where a team of staff members, physicians and community members participate in a 5k or 10k walk/run to raise awareness and promote prostate cancer screening. All proceeds provide research for new treatments, free prostate cancer testing, and education for men and families about prostate cancer

Intervention: Held first-ever Turkey Trot to promote the importance of early hereditary cancer screening and educate the community on the AHEAD (Adventist Health Early All-Around Detection) Program for early detection and treatment of genetic cancers

Founded by Dr. Candace Westgate, an obstetrician and gynecologist, our AHEAD program sponsored the first-ever Turkey Trot in St. Helena promoting health, community and the importance of early hereditary cancer screening for genetic cancers

- 2018 - Total number of people served is approximately 150 participants in the first year.

Intervention: Community wide education through the Awaken Series

The Martin-O'Neil Cancer Center held community wide education and support programs throughout 2018 that focused on topics like self-awareness and the importance of genetic screening. During the genetic cancer discussion participants were made aware of genetic screenings available to them.

Partners:

- Myriad Genetics
- Super Dimension

Measured Impact

Objective	Baseline Measurement	Performance Target	Intervention	Measurement Update
Increase access to diagnosis of lung cancer screening	2017: 0 2018: NA	2017: 200 low dose CT screenings	2017: 206 underwent low dose lung screenings. 3 patients diagnosed with lung cancer	Self reported
Identify patients who are predisposed to hereditary cancer syndrome	Increase awareness among patients who present as high risk	2017: 500 patients who undergo HCRA screening 2018: NA	2017: 443 patients were tested/32 tested positive	Patients/Clients
Increase awareness of interventions that prevent cancer	2017: # of attendees	2017: 150 attendees	600 students	School roster
Provide cancer support services for patients diagnoses with cancer and their caregivers	# of participants	2017: 500 participants 2018: 200 participants	2017: 672 participants 2018: 248 participants	Patients/Clients
Increase in number of cases identified through genetic testing	# of genetic tests that result in gene positive outcomes	Genetic tests that test positive	2018: Out of 440 genetic tests, 39 patients tested positive	Patients/Clients

Partners:

- Myriad Genetics
- SuperDimension

Priority Need - Access to shelter and respite care for the homeless

Adventist Health St. Helena is proud to support and be a part of Catholic Charities Shelter and Housing Department's initiative to operate the Nightingale Center, a medical respite center for patients from Queen of the Valley and Adventist Health St. Helena Hospital. The center is designed to help patients who have no place to go to continue with their recovery. The Nightingale House will help patients to be released to a safe and stable environment to minimize recidivism. This facility will have 11 beds to provide temporary on-site residential medical care.

Partners:

- Gasser Foundation
- Catholic Charities

Measured Impact

Objective	Baseline Measurement	Performance Target	Intervention	Measurement Update
Increase access to care for the homeless	# of patients served by the Medical Respite Care Facility	2018: 100% of persons who need services are able to access needed services	2018: Estimated number of patients served is 336	2018: Patients/ Clients

Transportation Program for Seniors

Transportation is a major barrier to healthcare access for many seniors. A recent survey by HAPI (Healthy Aging Population Initiative) indicated that transportation challenges are the leading concern from patients in this population. As a note: 24% of the population of St. Helena is senior, and 22% of Calistoga.

In partnership with Rianda House and Molly's Angels, Adventist Health St. Helena sponsored a pilot with on-demand ride service Lyft for seniors facing transportation challenges getting to and from their appointments at the hospital. The program was very successful and was able to provide approximately 41 rides for seniors.

Partners:

- Rianda House
- Molly's Angels

2019 CHNA Approval

This community health needs assessment was adopted on 10/17/19 by the Adventist Health System/West Board of Directors. The final report was made widely available on December 31, 2019.

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To request a copy, provide comments or view electronic copies of current and previous community health needs assessments or community benefit implementation strategies, please visit the Community Benefits section on our website at https://www.adventisthealth.org/ about-us/community-benefit/.

Appendix A: Qualifications of Consultants

HC2 Strategies, Inc. is a strategy consulting company that works with health systems and hospitals, physician groups, communities and other non-profit organizations across the country to connect and transform the health and well-being of their communities. They work to integrate the clinical and social aspects of community health to improve equity and reduce health disparities.

Laura Acosta, MPH, HC2 Strategies, Inc.

Laura Acosta has experience in healthcare administration, community-based activities, faith communities, and healthy communities initiatives. She provides leadership to various community-based activities focused on improving the quality of life for Inland Empire, California residents. She has extensive knowledge and experience with community benefits, community health needs assessments, and community health plans. Ms. Acosta earned her bachelor degree in Business Administration, and a Master in Public Health from Loma Linda University with a focus in policy and leadership. She has been involved in leadership programs with the Inland Empire Economic Partnership and Healthcare Executives of Southern California, and has been actively involved in experience design.

Jaynie Boren, HC2 Strategies, Inc.

Jaynie is a strategy and business development executive with more than 25 years of progressive leadership responsibility in planning, growing market share, creating new revenue opportunities, and facilitating relationships and joint ventures for independent hospitals, major integrated healthcare delivery systems and tertiary medical centers.

She has the ability to bring individuals with diverse interests together to achieve corporate and business objectives. Jaynie is an executive that can bring together her outstanding market research, planning, marketing, strategy, project development, implementation, and relationship building skills. She has documented success in building strategic plans and working with teams to assure implementation of goals.

James A. Martinez, Ed.D., MPH

James earned a master's degree in epidemiology and a doctoral degree in health education from Columbia University, NY. He is a population health data expert using data to tell the community story. He teaches courses in database design, cartography and GIS applications in public health practice at Loma Linda University Health. He is also a program manager at the Inland Empire Health Plan.

He also works on a community-lead partnership with local government on developing a countywide health improvement framework, and asset mapping applications to promote networks of healthy communities and real-time community health management platforms for hospital emergency department visits and solutions for preventing readmissions.

Appendix B: Glossary of Terms

Ambulatory Care Sensitive Conditions (ACSC)

A set of 28 medical conditions/diagnoses "for which timely and effective outpatient care can help to reduce the risks of hospitalization by either preventing the onset of an illness or condition, controlling an acute episodic illness or condition, or managing a chronic disease or condition." Examples of ACSCs include:

- Angina
- Aspiration
- Asthma
- Cellulitis
- Congestive heart failure
- Constipation
- Convulsions/epilepsy
- COPD
- Dehydration and gastroenteritis
- Dental conditions
- Diabetes complications
- Ear, nose and throat infections
- Gangrene
- Gastro-oesophageal reflux disease
- Hypertension
- Iron deficiency anemia
- Influenza
- Nutritional deficiencies
- Pelvic inflammatory disease
- Perforated/bleeding ulcers
- Pneumonia and other acute LRTI
- Tuberculosis and other vaccine preventable
- UTI/pyelonephritis

Benchmark

A benchmark is a measurement that serves as a standard by which other measurements and/or statistics may be measured or judged. A "benchmark" indicates a standard by which a community can determine whether well the community is performing well in comparison to the standard for specific health outcomes.

Community Resources

Community resources include organizations, people, partnerships, facilities, funding, policies, regulations, and a community's collective experience. Any positive aspect of the community is an asset that can be leveraged to develop effective solutions.

Federal Poverty Level

The set minimum amount of gross income that a family needs for food, clothing, transportation, shelter and other necessities. In the United States, this level is determined by the Department of Health and Human Services and used to determine financial eligibility for certain federal programs. One can calculate various percentage multiples of the guidelines by taking the current guidelines and multiplying each number by 1.25 for 125 percent, 1.50 for 150 percent, etc. 150%, 300%, and 400% are included in the table below.

2019 Poverty Guidelines for the 48 Continental United States, Annual Salary				
Persons in Family/ Household Size	Poverty Guideline (Level)	150% of the FPL	300% of the FPL	400% of the FPL
1	$12,490	$18,735	$37,470	$49,960
2	$16,910	$25,365	$50,730	$67,640
3	$21,330	$31,995	$63,990	$85,320
4	$25,750	$38,625	$77,250	$103,000
5	$30,170	$45,255	$90,510	$120,680
6	$34,590	$51,885	$103,770	$138,360
7	$39,010	$58,515	$117,030	$156,040
8	$43,430	$65,145	$130,290	$173,720
For families/households with more than 8 persons, add $4,420 for each additional person.				

2019 Poverty Guidelines for the 48 Continental United States, Monthly Salary				
Persons in Family/ Household Size	Poverty Guideline (Level)	150% of the FPL	300% of the FPL	400% of the FPL
1	$1,041	$1,561	$3,123	$4,163
2	$1,409	$2,114	$4,228	$5,637
3	$1,778	$2,666	$5,333	$7,110
4	$2,146	$3,219	$6,438	$8,583
5	$2,514	$3,771	$7,543	$10,057
6	$2,883	$4,324	$8,648	$11,530
7	$3,251	$4,876	$9,753	$13,003
8	$3,619	$5,429	$10,858	$14,477

Federally Qualified Health Center

Federally Qualified Health Centers are community-based health care providers that receive funds from the Health Resources & Services Administration Health Center Program to provide primary care services in underserved areas. They must meet a stringent set of requirements, including providing care on a sliding fee scale based on ability to pay and operating under a governing board that includes patients. Federally Qualified Health Centers may be Community Health Centers, Migrant Health Centers, Health Care for the Homeless, and Health Centers for Residents of Public Housing.

Focus Group

A group of people questioned together about their opinions on an issue. For this CHNA, focus groups answered questions related to components of a healthy community and issues in their community.

Food insecurity

A lack of consistent access to food resulting in reduced quality, variety, or desirability of diet or multiple indications of disrupted eating patterns and reduced food intake.

Housing Cost Burden

Measures the percentage of household income spent on mortgage costs or gross rent. The US Department of Housing and Urban Development currently defines housing as affordable if housing for that income group costs no more than 30 percent of the household's income. Families who pay more than 30 percent of their income for housing are considered cost burdened; families who pay more than 50 percent of their income for housing are severely cost burdened.

Health indicator

A single measure that is reported on regularly and that provides relevant and actionable information about population health and/or health system performance and characteristics. An indicator can provide comparable information, as well as track progress and performance over time.

Healthy People 2020

Healthy People 2020 provides science-based, 10-year national objectives for improving the health of all Americans. For three decades, Healthy People has established benchmarks and monitored progress over time to encourage collaborations across communities and sectors, empower individuals toward making informed health decisions, and measure the impact of prevention activities.

Housing Units with Substandard Conditions

Housing that poses a risk to the health, safety or physical well-being of occupants, neighbors, or visitors. Substandard housing increases risk of disease, crime, social isolation and poor mental health. Substandard housing is associated with one or more of the following conditions:

1. Is dilapidated;
2. Does not have operable indoor plumbing;
3. Does not have a usable flush toilet inside the unit for the exclusive use of a family;
4. Does not have a usable bathtub or shower inside the unit for the exclusive use of a family;
5. Does not have electricity, or has inadequate or unsafe electrical service;
6. Does not have a safe or adequate source of heat;
7. Should, but does not, have a kitchen; or
8. Has been declared unfit for habitation by an agency or unit of government.

Infant Mortality Rate

Expressed as a rate per 1,000 births, this is defined as the death of a child prior to its first birthday (should be read, for example, as 7.8 infant deaths for every 1,000 births).

Low Birth Weight

Expressed as a rate per 1,000 births, this refers to infants born with a weight between 1,500 and 2,500 grams or between 3.3 and 5.5 pounds. Very low birth weight infants are born with a weight less than 1,500 grams.

Prenatal Care

Adequacy of prenatal care calculations are based on the Adequacy of Prenatal Care Utilization Index (APNCU), which measures the utilization of prenatal care on two dimensions. The first dimension, adequacy of initiation of prenatal care, measures the timing of initiation using the month prenatal care began reported on the birth certificate. The second dimension, adequacy of received services, is measured by taking the ratio of the actual number of visits reported on the birth certificate to the expected number of visits. The expected number of visits is based on the American College of Obstetrics and Gynecology prenatal care visitations standards for uncomplicated pregnancies (1), and is adjusted for the gestational age at initiation of care and for the gestational age at delivery. The two dimensions are combined into a single summary index, and grouped into four categories: Adequate Plus, Adequate, Intermediate, and Inadequate.

- *Adequate Plus*: Prenatal care begun by the 4th month of pregnancy and 110% or more of recommended visits received.
- *Adequate*: Prenatal care begun by the 4th month of pregnancy and 80-109% of recommended visits received.

- *Intermediate*: Prenatal care begun by the 4th month of pregnancy and 50-79% of recommended visits received.
- *Inadequate*: Prenatal care begun after the 4th month of pregnancy or less than 50% of recommended visits received.

Primary Data

Primary data are new data collected or observed directly from first-hand experience. They are typically qualitative (not numerical) in nature. For this CHNA, primary data were collected through focus groups and key informant interviews.

Secondary Data

Data that has already been collected and published by another party. Typically, secondary data collected for CHNAs is quantitative (numerical) in nature (for example, data collected by a local or state department of health, the Centers for Disease Control and Prevention, or a state department of education).

Teen Birth Rate

Expressed as a rate per 1,000 births, this refers to the quantity of live births by teenagers who are between the ages of 15 and 19.

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Appendix D: Description of Key Informants and Focus Groups

This assessment would not have been possible without input from our community. This section outlines the community leaders that served as key informants for this assessment, as well as a description of the focus groups convened.

- 46 total participants
- 4 focus groups (total of 31 focus group participants)
- 15 key informants

Description of Focus Groups

2019 Focus Group				
Organization	**Location**	**Populations Served**	**Language**	**# of Participants**
UpValley Family Centers	1608 Lake St, Calistoga, CA 94515	Promotoras	Spanish	8
Rianda House	1475 Main St, St. Helena, CA 94574	Seniors	English	8
Napa Valley Unified School D - St. Helena School District	1316 Hillview Place, St. Helena, CA 94574	Teachers and staff	English	9
Abode Services	100 Hartle Court , Napa, CA 94559	Homeless	English	6

Description of Key Informants

2019 Key Informant Contact List				
Name	**Title**	**Organization**	**Sector**	**Population Served**
Amy Zuniga	Head Pastor	Grace Episcopal Church	Faith Community	Community at large
Chris Canning	Mayor	City of Calistoga	Government	City of Calistoga residents
Emma Moyer	Senior Program Manager	Abode Services	Homeless housing	Homeless shelters and outreach programs in Napa County
Geoff Ellsworth	Mayor	City of St. Helena	City Council	City of St. Helena residents
Heather Lewerenz, MD	Behavioral Health Physician	Adventist Health St. Helena	Hospital	Health
Indira Lopez	Program Director	Up Valley Family Centers	Non-profit - Family Resource Center	Upper Valley- Napa & Sonoma County residents
Jennifer Henn, PhD	Public Health Manager - Chronic Disease and Health Equity	Napa County Public Health	Public Health	Napa County residents
Jenny Ocon	Executive Director	UpValley Family Centers	Community based non-profit	Hispanic, migrants, underserved, families, children, seniors
Julie Spencer	Executive Director	Rianda House	Community based non-profit	Napa County seniors
Marylou Wilson, PhD	Superintendent	St. Helena Unified	Education - TK- 12	School aged children & families

2019 Key Informant Contact List				
Name	**Title**	**Organization**	**Sector**	**Population Served**
Rob Weiss	Executive Director	Mentis	Bilingual mental health services	Napa County residents
Robert Cushman, PhD	President and CEO	Pacific Union College	Education - Liberal Arts College	PUC students and staff/ community at large
Rodney Look, MD	Chief of Emergency Services	Adventist Health St. Helena	Hospital	Napa County residents
Steve Herber, MD	President	Adventist Health St. Helena	Hospital	Lake and Napa County residents
Tim Foley	Interim Police Chief	City of St. Helena	Law enforcement	City of St. Helena residents

Appendix E: Asset Inventory and Community Resources

Catholic Charities of the Diocese of Santa Rosa
Napa, CA 94558
(707) 528-8712
www.srcharities.org

Collabria Care
Napa, CA 94559
(707) 258-9080
http://collabriacare.org/

Community Health Initiative
2140 Jefferson Street, Suite D
Napa, CA 94559
(707) 227-0830
Fax (707) 226-9923

COPE Family Center
707 Randolph Street
Napa, CA 94559
(707) 252-1123

Girls on the Run Napa & Solano
Napa, CA 94558
(707) 637-8909
www.gotrnapasolano.org

Leukemia and Lymphoma Society
101 Montgomery Street Suite 750
San Francisco, CA 94104
(415) 6251100

Molly's Angels of Napa Valley
433 Soscol Ave #100, Napa, CA 94559
(707) 224-8971

Napa County Bicycle Coalition
Napa, CA 94558
(707) 812-1770
www.napabike.org

Napa Valley Vine Trail Coalition
Napa, CA 94558
(707) 252-3547
http://www.vinetrail.org

Nimbus Arts
649 Main St, St Helena, CA 94574
(707) 963-5278

OLE Health
Napa, CA 94558
(707) 254-1770
www.olehealth.org

Operation Access
(415) 733-0004

Pacific Union College
(707) 965-6313

Rianda House Senior Activity Center
St. Helena, CA 94574
(707) 963-8555
www.riandahouse.org

St. Helena Chamber of Commerce
(707) 963-4456

St. Helena Soroptomist
PO Box 1007 St. Helena, CA 94574
Email: info@sisthelena.org

St. Helena Unified School District
2198, 465 Main St, St Helena, CA 94574
Phone: (707) 967-2708

UpValley Family Centers of Napa County
St. Helena, CA 94574
(707) 965-5010
www.upvalleyfamilycenters.org

Zero Prostate Cancer Napa Valley
vanessa@zerocancer.org
818-473-53511

UpValley Community Leaders
(707) 965-5010 ext. 200

Healthy Aging Population Initiative (HAPI)
(707) 258-9087

UpValley Senior Collaborative
(707) 963.8555 ext. 105

Park Rx
(707) 967-2736

Live Healthy Napa County
(510) 305-2854

Monrovia Group
(707) 967-2701

2019 CHNA approval

This community health needs assessment was adopted on by the Adventist Health System/West Board of Directors. The final report was made widely available on December 31, 2019.

CHNA/CHIS contact:

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To request a copy, provide comments or view electronic copies of current and previous community health needs assessments or community benefit implementation strategies, please visit the Community Benefits section on our website at https://www.adventisthealth.org/about-us/community-benefit/

10 Woodland Road
St. Helena, CA 94574