A Community Health Needs Assessment
Prepared for Fauquier and Rappahannock Counties
By Community Health Solutions

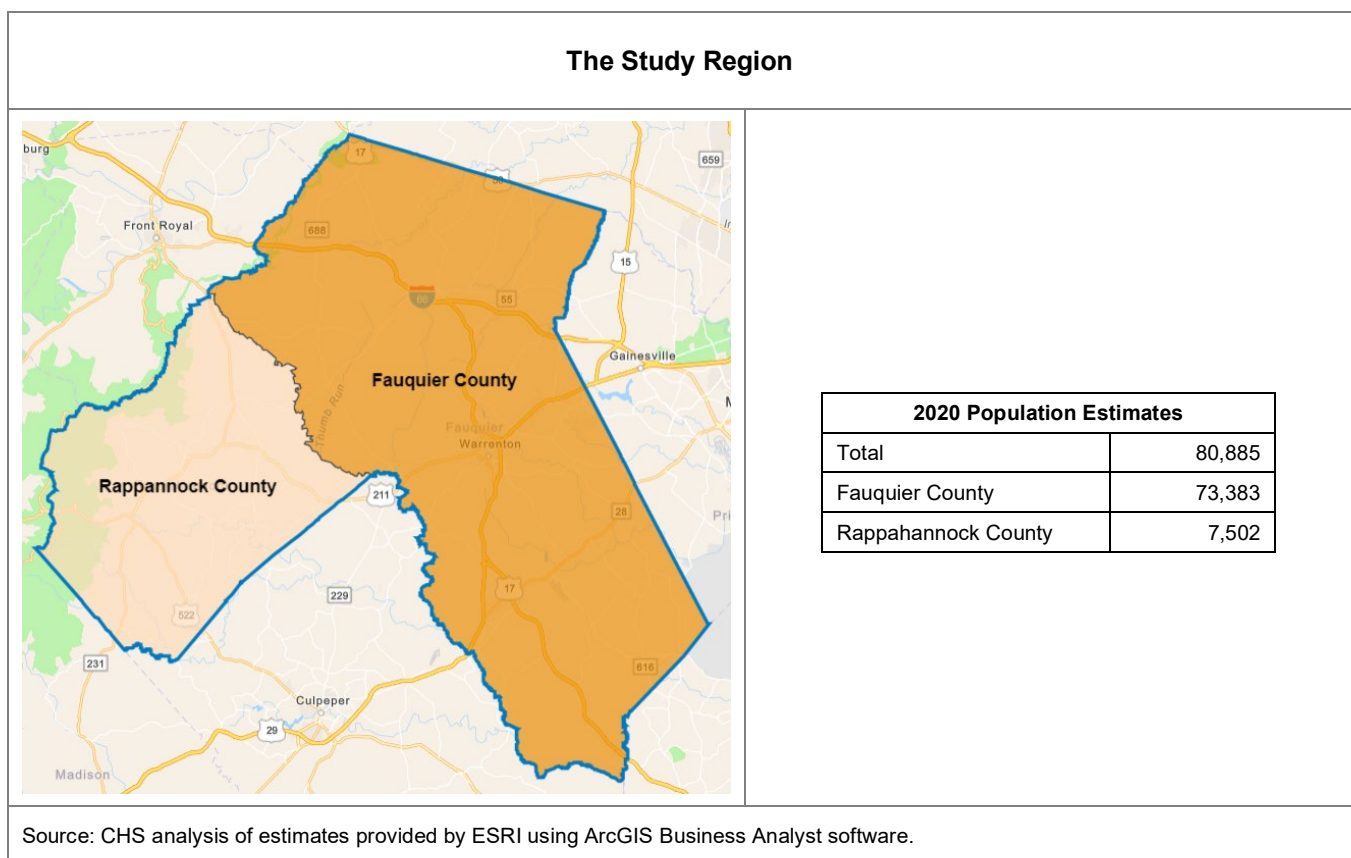**September 2020**

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Executive Summary

This report presents the results of a Community Health Needs Assessment (CHNA) for Fauquier and Rappahannock counties. The CHNA was guided by five regional organizations that decided to collaborate for community health assessment and improvement.[1]

As shown in the map below, this region is home to more than 80,000 community members. The CHNA study was designed to provide insight about community health needs and opportunities for community health improvement. Research activities for the study included a survey of community residents, a survey of community professionals, and analysis of a variety of community health indicators.

<table>
<tr><td colspan="2" align="center">The Study Region</td></tr>
<tr><td>

</td><td>

2020 Population Estimates	
Total	80,885
Fauquier County	73,383
Rappahannock County	7,502

</td></tr>
<tr><td colspan="2">Source: CHS analysis of estimates provided by ESRI using ArcGIS Business Analyst software.</td></tr>
</table>

This Executive Summary provides an overview of the study results. More detailed analysis is provided in the four sections that follow, including:

- ☐ Section 1. Insights from Community Residents
- ☐ Section 2. Insights from Community Professionals
- ☐ Section 3. Community Indicator Profiles
- ☐ Section 4. Social Determinants of Health

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[1] Community Health Solutions provided research support, data analysis support, and drafting support for the CHNA.

Summary Insights from Community Residents (Section 1)

Section 1 of the report presents results from the survey of community residents. Insights were collected via surveys administered online (see Section 1 for more detail on the impact of COVID-19 on survey methods). Four hundred (400) community residents submitted a response (although not every respondent answered every question). The respondents provided rich insights about community health in the study region. The summary results are outlined below and presented in more detail in Section 1 of the report.

Demographic Profile
- 400 community residents completed the survey
- Respondents were mostly white, female, middle aged (35-64), middle/upper income level, and live in Fauquier County.
- A large majority of respondents (92%) reported they obtain health information from their health care provider, and more than half (55%) obtain health information online.

Community Needs Related to COVID-19
- 23% reported they or an immediate family member lost employment.
- Four respondents (1%) reported they or an immediate family member lost housing.
- Groups who need extra help during COVID-19 include elderly, Hispanic, low income residents; children; working parents/families; essential workers, food insecure individuals; immunocompromised/high risk individuals and the unemployed.
- Among the most identified personal difficulties were keeping good mental health; feeling lonely or isolated from others; and keeping good physical health.

Neighborhood and Community Environment Needs
- The leading neighborhood needs were affordable housing; jobs/healthy economy; and an environment more welcoming of diversity.

Health Care Service Needs
- The leading health care service needs were affordable health insurance; mental health services; and healthcare for the uninsured/underinsured.

Community Support Service Needs
- The leading community support service needs were after school programs; public transportation; and aging services.

Defining a Healthy Community
- Respondents defined a healthy community as one with access to healthcare services; access to community and social services; supports for healthy lifestyles; supports for people with disabilities; and supports for children.

Groups Who Need Help Obtaining Better Health
- The elderly population was mentioned by most respondents. Other vulnerable populations included low income; children; people with behavioral health concerns and minority populations (Hispanic, immigrants, etc.).

New Health Issues
- Among the most commonly identified new issues were behavioral health issues; COVID-19; access to healthcare; unhealthy lifestyles; and child health.

Health Resources
- Commonly mentioned community assets included healthcare services; community and social services; community engagement; and support for health equity.

Working Together for Community Health Improvement
- A wide range of ideas were provided by the respondents. Collaboration ideas included COVID-19 response; healthcare services; supports for children; and to support people with disabilities.

Ideas and Suggestions for Promoting Better Health
- Commonly mentioned ideas included community and social services; healthcare services; supports for children; supports for healthy lifestyles; and supports for people with disabilities.

Summary Insights from Community Professionals (Section 2)

Section 2 of the report presents results from the survey of community professionals. The survey was sent to 170 community professionals based on lists from the project partners. A total of 38 (22%) respondents whose organizations serve Fauquier and/or Rappahannock county submitted a response (although not every respondent answered every question). As with community residents, community professionals provided rich insights about community health needs and opportunities in the study region. The summary results are outlined below and presented in more detail in Section 2 of the report.

Organizational Affiliation
- 38 community professionals completed the survey
- Respondents were affiliated with public health, healthcare safety net organizations, public safety; schools and local nonprofits.

Community Needs Related to COVID-19
- 76% reported an increase in clients/consumers who lost employment.
- 35% reported an increase the number of clients/consumers who lost housing.
- Groups identified as needing extra help due to COVID-19 include elderly; Hispanic; low income; children; immigrants; isolated individuals; people with disabilities; and the homeless population.
- Among the most identified difficulties were access to keeping feeling lonely or isolated; experiencing overall financial hardship; keeping good mental health; getting childcare; managing schooling at home for children; and getting essential supplies for daily living.

Community Health Concerns
- Among the most commonly identified concerns were depression; other mental health conditions; substance abuse of illegal and prescriptions drugs; and adult and obesity/overweight.

Community Services that Need Strengthening
- The most commonly mentioned services that need strengthening include behavioral health services; transportation; job/vocational training; and employment opportunity/workforce development.

Defining a Healthy Community
- Respondents defined a healthy community as one with access to healthcare; access to community and social services; supports for people with behavioral health concerns; healthy lifestyle supports and supports for people with disabilities.

Community Health Assets
- Commonly mentioned community assets were healthy lifestyle supports; healthcare services; community and social services; supports for the elderly and supports for children.

Vulnerable or At-Risk Populations

- Most commonly mentioned groups included the elderly population; people with behavioral health concerns; minority population; low income population; and people with disabilities.

New Health Issues

- Among the most commonly identified new issues were child health; behavioral health; COVID-19; disability-related issues and access to healthcare.

Working Together for Community Health Improvement

- Collaboration ideas included more community collaboration; healthcare services; community and social services; and healthy lifestyle supports.

Ideas and Suggestions for Promoting Better Health

- Commonly mentioned ideas included expanding healthcare services, addressing health equity; community and social services; and supporting the low-income population.

Summary Insights from Community Indicator Profiles (Section 3)

Section 3 of the report provides a quantitative profile of the study region based on a wide array of community health indicators. To produce the profile, Community Health Solutions analyzed data from multiple sources. By design, the analysis does not include every possible indicator of community health. The analysis is focused on a set of indicators that provide broad insight into community health and for which there were readily available data sources. The summary results are outlined below and presented in more detail in Section 3 of the report.

Community Demographics

- The total population of the study region is estmated at 80,885 people.
- Children age 0-17 represent 22% of the population.
- Seniors age 65+ represent 18% of the population.
- 7% percent of the population is Black/African American.
- 9% of the population is Hispanic.
- Counties vary in population size and percent distribution by age, race, and ethnicity.

Social Determinants of Health

- 6% of individual residents have incomes below poverty.
- 6% of households have incomes below poverty.
- 7% of the population age 25+ is without a high school diploma.
- 6% of the population may have concerns about food insecurity.
- 12% of households may be struggling with housing.

Health Risk Behaviors for Adults

- An estimated 63,451 adults age 18+ reside in the study region.
- Applying health district level survey data to the local population, an estimated:
  - 64% are overweight or obese.
  - 26% do not meet recommendations for physical activity.
  - 83% consume less than five servings of fruits and vegetables per day.
  - 20% are smokers.
  - 12% are at risk for binge drinking.

Health Risk Behaviors for High School Youth

- An estimated 6,083 youth age 14-19 reside in the study region.
- Applying health district level survey data to the local population, an estimated:
  - 36% are overweight or obese.
  - 29% have used tobacco or vapor products.
  - 58% do not meet recommendations for physical activity.

Access to Health Care

- An estimated 64,237 individuals age 0-64 lived in the study region in 2018.
- According to health insurance estimates from the US Census Bureau, and estimated 10% of individuals age 0-64 were uninsured at any point in 2018.
- The uninsured rate increases as income drops, with an uninsured rate of 28% for those with income below 138% of poverty.
- As of 2020, both counties are fully or partly designated as medically underserved areas by the U.S. Health Resources and Services Administration.

Leading Causes of Death

- In 2018 the five leading causes of death the study region were malignant neoplasms (154); heart disease (141); accidents (46); cerebrovascular disease (34); and chronic lower respiratory disease (31).

Maternal and Infant Health

- In 2018 residents of the study region had:
  - 931 total pregnancies and 859 live births.
  - 241 non-marital births and 24 births to teenage mothers.
  - 51 low weight births
  - 5 infant deaths

Cancer Incidence

- From 2013-2017, study region residents had 1,975 reported cases of cancer.
- The most frequent cancer types by site were breast (303), lung and bronchus (270), prostate (266), and colorectal (154).

Communicable Disease Incidence

- In 2018 the most common communicable diseases reported in the study region were hepatitis C - chronic (58), Lyme disease (42), campylobaceteriosis (24), salmonellosis (17), and spotted fever (12).

Injury and Violence

- In 2016 the study region had 70 deaths related to injury or violence, with the leading causes of death being poison (29), overdoes due to drug poisoning (27), traumatic brain injury (25), motor vehicle traffic injury (14), and suicide (11).
- In 2018 study regoin residents had 264 inpatient hospitalizations for injury or violence-related incidents, with the leading causes being unintentional fall (73), firearm (57), overdose due to drug poisoning (56), traumatic brain injury (37), and self harm (25).

Potentially Avoidable Hospitalizations

- Some specifically-defined hospitalizations are potentially avoidable with adequate access to outpatient care and other health supports.
- In 2018 study region residents had 789 potentially avoidable hospitalizations.
- The leading diagnoses for these hospitalizations were congestive heart failure (240), community acquired pneumonia (200), COPD or asthma in older adults (147), diabetes (87), and urinary tract infection (81). Most of these hospitalizations were for residents age 65+.

Hospitalizations for Mental Health and Substance Use Diagnoses

- In 2018 study residents had 407 hospitalizations for behavioral health conditions in Virginia community hospitals.
- The leading causes of hospitalization were major depressive disorder - recurrent (116); alcohol related disorders (75); bipolar disorder (63); major depressive disorder - single episode (47); and schizoaffective disorders (22).

Adult Mental Health and Substance Use: Incidence and Prevalence

- An estimated 63,451 adults age 18+ reside in the study region:
- An estimated 19% may have had any mental illness in the past year, and 4% may have had a serious mental illness in the past year.
- An estimated 6% may have had an alcohol use disorder in the past year, and 3% may have had an illicit drug use disorder in the past year.

Child and Youth Mental Health and Substance Use: Incidence and Prevalence

- An estimated 15,026 children and youth age 3-17 reside in the study region.
- An estimated 3-10% may have one or more or more of these conditions: ADD or ADHD, anxiety problems, depression, behavioral or conduct problems, or other cognitive or mental health conditions.
- Among an estimated 6,383 residents age 12-17, an estimated 4% may have had a substance use disorder in the past year.

Summary Insights on Social Determinants of Health (Section 4)

Section 4 presents community insights and data for exploring social determinants of health in the region. Social determinants of health (SDoH) have been defined as the conditions under which people are born, grow, live, work, and age, and include factors such as socioeconomic status, education, employment, social support networks, and neighborhood characteristics.[2] A growing body of research indicates that SDoH can be linked to a lack of opportunity and resources to protect, improve, and maintain health. The impacts of SDoH can be seen in disparities in health status and access to healthcare for individuals and populations.

Section 4 explores the results of the CHNA study from a SDoH perspective. Part A provides summary insights about SDoH from the survey of community residents and the survey of community professionals. Part B presents a set of maps that show where populations with SDoH risk reside within the counties and the regional overall. This type of geographic information can be helpful for planning efforts to reduce health disparities and increase health equity.

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[2] American Academy of Family Physicians

Section 1. Insights from Community Residents

To generate community input for the community health needs assessment, a Community Insight Survey was conducted with community residents. Insights were collected via surveys administered online. Four hundred (400) community residents submitted a response (although not every respondent answered every question). The respondents provided rich insights about community health in the study region. This section describes the methods and results of the survey.

A. Survey Methods

The project partners began with a common aim to conduct an inclusive survey with insights from all demographic groups, including low-income and minority populations. The original plan was to accomplish this aim by conducting the survey using a two-pronged approach with online and paper surveys. Online surveys could be completed by community residents willing and able to do so. Paper surveys could be completed at various community sites where diverse people gather, including people with lower income and people from minority backgrounds.

The arrival of COVID-19 and the related protective measures made it impossible to conduct the survey on site at community locations. Consequently, all survey responses reported here were completed online. We recognize there could be many community members who would have completed a paper survey, including community members with lower income or lack of digital access. This is apparent in the survey results, which are under-representative of low-income and minority households relative to their overall proportion of the population. This occurred despite the project partners' extra efforts to reach out to members of these population segments. The project partners are committed to listening to and learning from these populations in a variety of ways as the community continues to open in the coming months.

It should also be noted that the surveys were conducted online using convenience sampling methods. Convenience sampling is a practical approach for obtaining insights from as many people as possible. It differs from probability sampling, which involves random selection of a smaller group of respondents that should be representative of the broader population. The results of a convenience sample are instructive for understanding the scope of issues and opportunities in a community; however, they are not necessarily representative of the entire community.

The survey results are presented in the following order:

|	
B	Demographic Profile
C	Community Needs Related to COVID-19
D	Neighborhood and Community Environment
E	Health Care Service Needs
F	Community Services
G	In their Own Words – Insights from Community Residents

B. Demographic Profile

Community residents were asked to describe their demographic background. The resulting demographic profile of survey respondents is shown in **Exhibit 1.1**. (See notes in the survey overview regarding under-representation of low income and minority populations). Exhibit 1.2 shows the reported zip code of residence for survey respondents.

Exhibit 1.1 Demographic Profile (n=400)						
Category	**Count**	**Percent**		**Category**	**Count**	**Percent**
Age (n=400)				**Education (n=398)**		
18-24	16	4%		Less than High School	2	1%
25-34	33	8%		High School or GED	25	6%
35-44	77	19%		Some College	76	19%
45-54	105	26%		Associate's Degree	33	8%
55-64	90	23%		Bachelor's Degree	104	26%
65-74	58	14%		Master's Degree	130	33%
75-84	19	5%		Professional Degree	11	3%
85+	2	1%		Doctorate	17	4%
Race (n=399)				**Household Size (n=400)**		
Asian	2	1%		1	39	10%
American Indian or Alaska Native	1	0%		2	127	32%
Black or African American	16	4%		3	70	18%
Multiple Race	8	2%		4	100	25%
Pacific Islander	0	0%		5	47	12%
White	364	91%		More Than 5	17	4%
Other	8	2%				
				School Aged Children in the Household (n=399)		
Ethnicity (n=395)				Yes	171	43%
Hispanic, Latino, or Spanish origin	18	5%		No	228	57%
Non-Hispanic, Latino, or Spanish origin	377	95%				
				Sources of Health Information (n=397)		
Gender (n=392)				Health Care Provider (Example: Physician, Nurse Practitioner)	363	92%
Female	327	83%		Online Resources (Example: WebMD)	218	55%
Male	65	17%		Family Member	100	25%
Unknown	0	0%		Friends	87	22%
				Urgent Care	85	21%
Income (n=396)				Hospital Emergency Department	38	10%
Less than $25,000	13	3%		Local Health Department	31	8%
$25,000-$34,999	14	4%		Social Media Resources (Example: Facebook)	30	8%
$35,000-$49,999	36	9%		Free Clinic	21	5%
$50,000-$74,999	57	14%		Faith Based Organization	13	3%
$75,000+	255	64%				
Don't Know/Not Sure	21	5%				

Community residents were also asked to indicate the zip code where they live in the study region. The map and table in **Exhibit 1.2** show the number of survey responses received from residents of each zip code. (Please note some zip codes overlap county boundaries.)

Exhibit 1.2
Zip Code of Residence
(n=400)
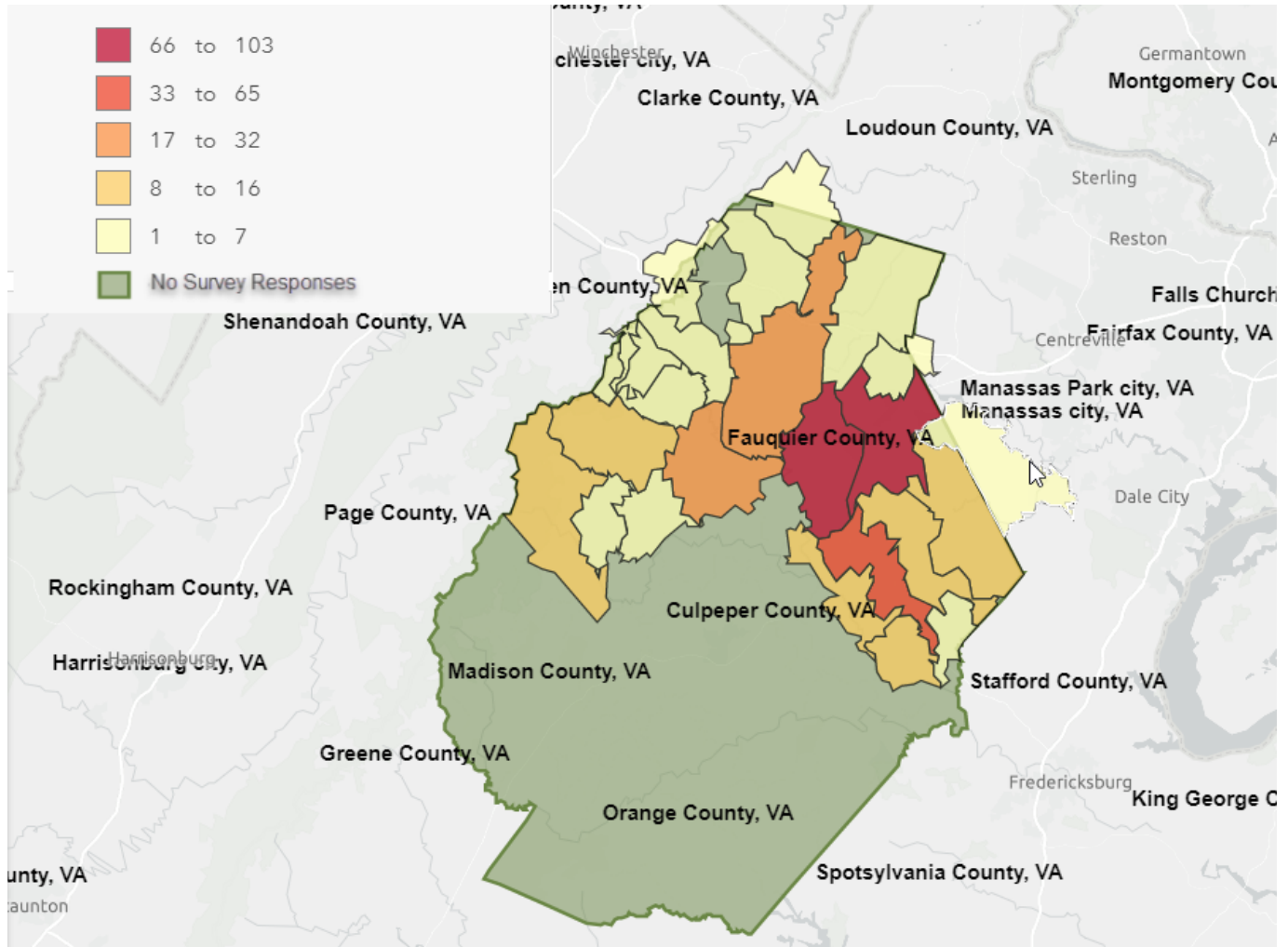
Top 10 Zip Codes	Count	Percent
20186 (Culpeper County)/ (Fauquier County)	103	26%
20187 (Fauquier County)	89	22%
22712 (Fauquier County)	42	11%
20115 (Fauquier County)	24	6%
20106 (Culpeper County)/ (Rappahannock County	19	5%
22747 (Rappahannock County)	15	4%
22728 (Fauquier County)	13	3%
20119 (Fauquier County)	12	3%
22734 (Culpeper County)/ (Fauquier County)	11	3%
22740 (Culpeper County)/ (Rappahannock County)	10	3%

C. Community Needs Related to COVID-19

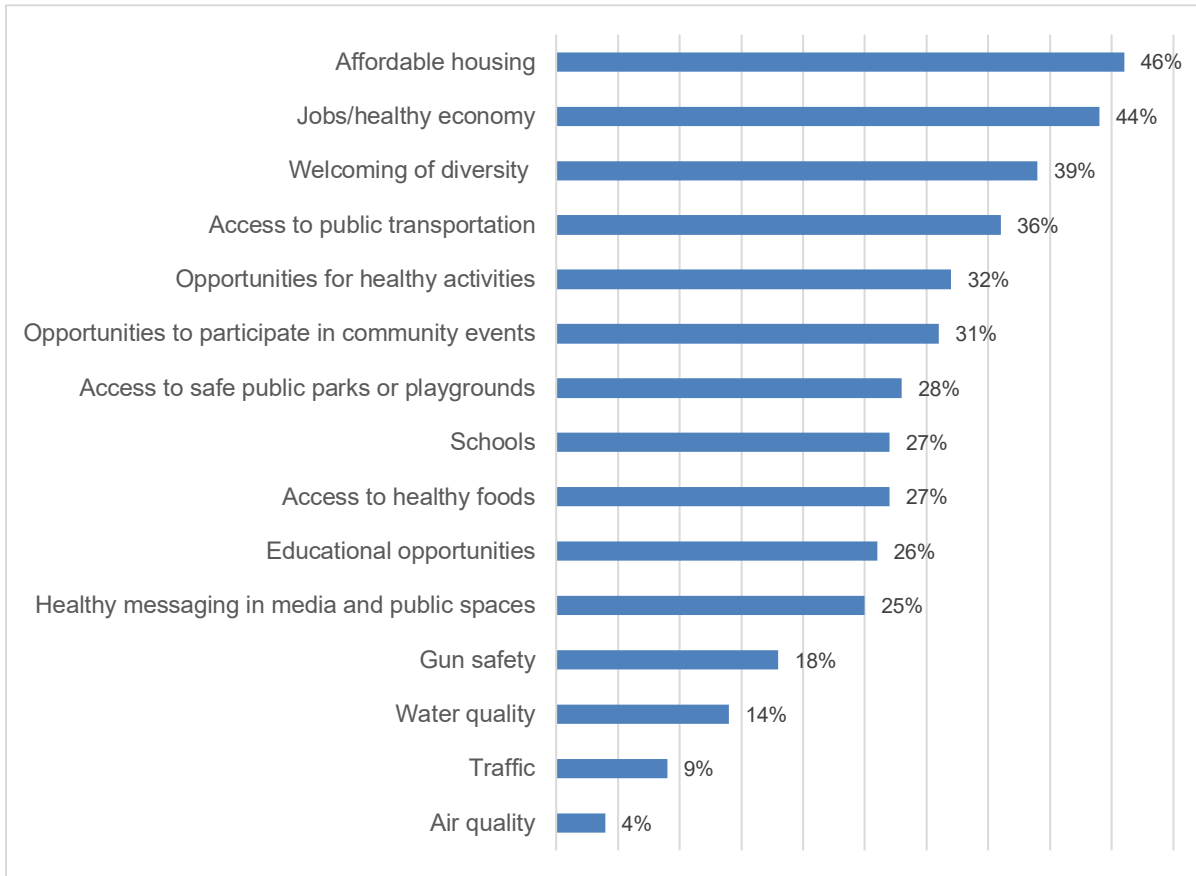Community residents were asked to share their insights on community needs specifically related to COVID-19. The results are shown in **Exhibit 1.3**. Twenty-three percent (23%) said they or an immediate family member lost employment due to COVID-19, and four respondents (1%) reported they or a family member lost housing. Survey respondents identified multiple groups that need extra help due to COVID.19. They also shared their experiences of personal difficulty as shown in the bottom panel.

Exhibit 1.3
Community Needs Related to COVID-19

Household/Personal Employment (n=400) or Housing Loss (n=399)

Groups Who Need Extra Help (n=220)

Experiences of Personal Difficulty during COVID-19 (n=326)

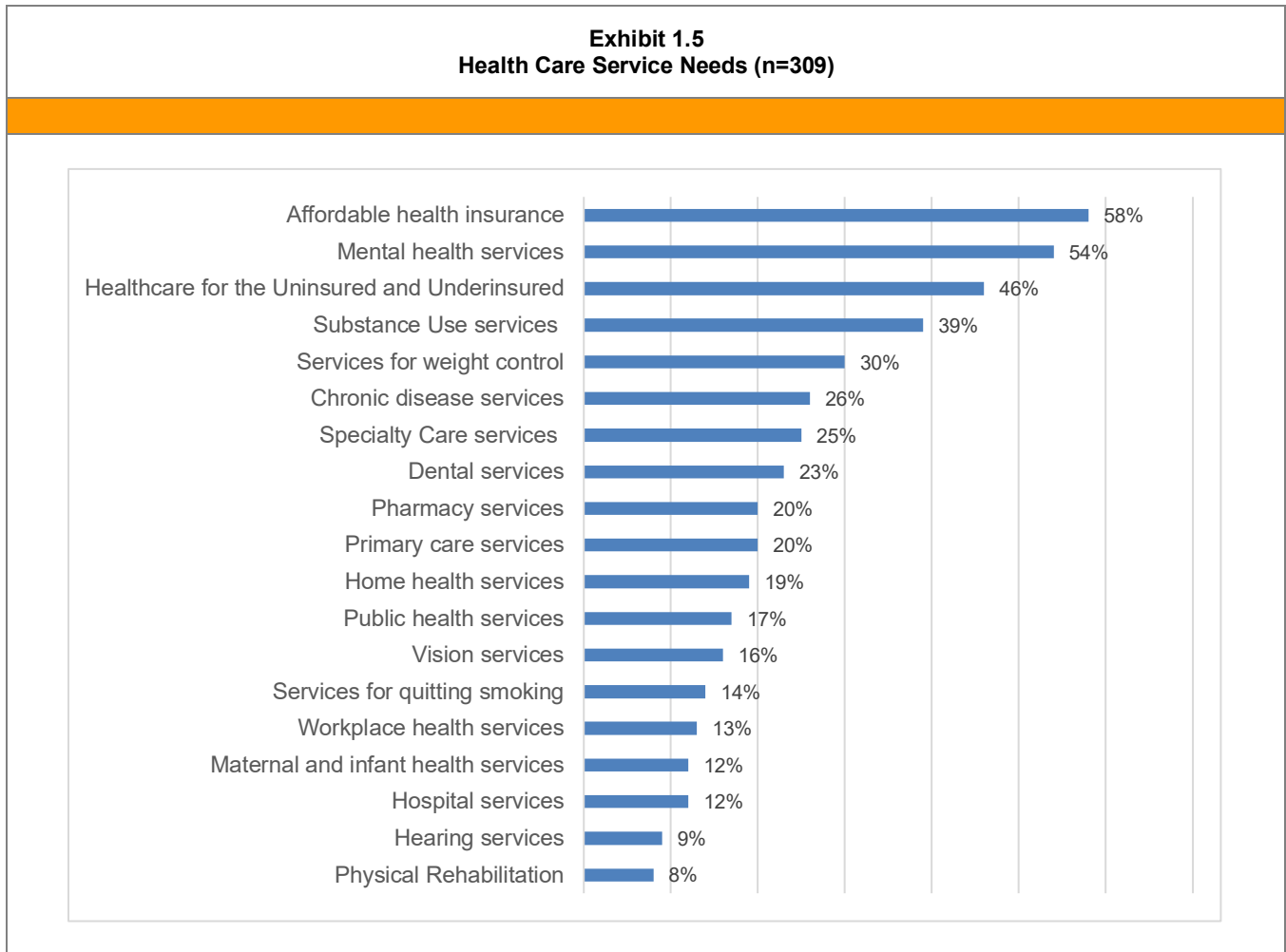| Category	Percent
Keeping good mental health	16%
Feeling lonely or isolated from others	14%
Keeping good physical health	12%
Getting essential supplies for daily living	11%
Managing schooling at home for children	10%
Getting dental care	6%
Getting healthy food	5%
Keeping good dental health	5%
Getting childcare	5%
Getting health care	4%
Experiencing overall financial hardship	4%
Taking care of a person who is elderly or disabled and…	4%
Affording housing costs	2%
Getting social services	1%
Getting in-home care services	1%
Getting transportation	0%

D. Neighborhood and Community Environment

Widening the perspective beyond those issues directly related to COVID-19, community residents were asked to review a list of common community health needs and concerns and identify which of these needs are present in their community. The results are shown in **Exhibit 1.4**.

Exhibit 1.4
Neighborhood and Community Environment (n=344)

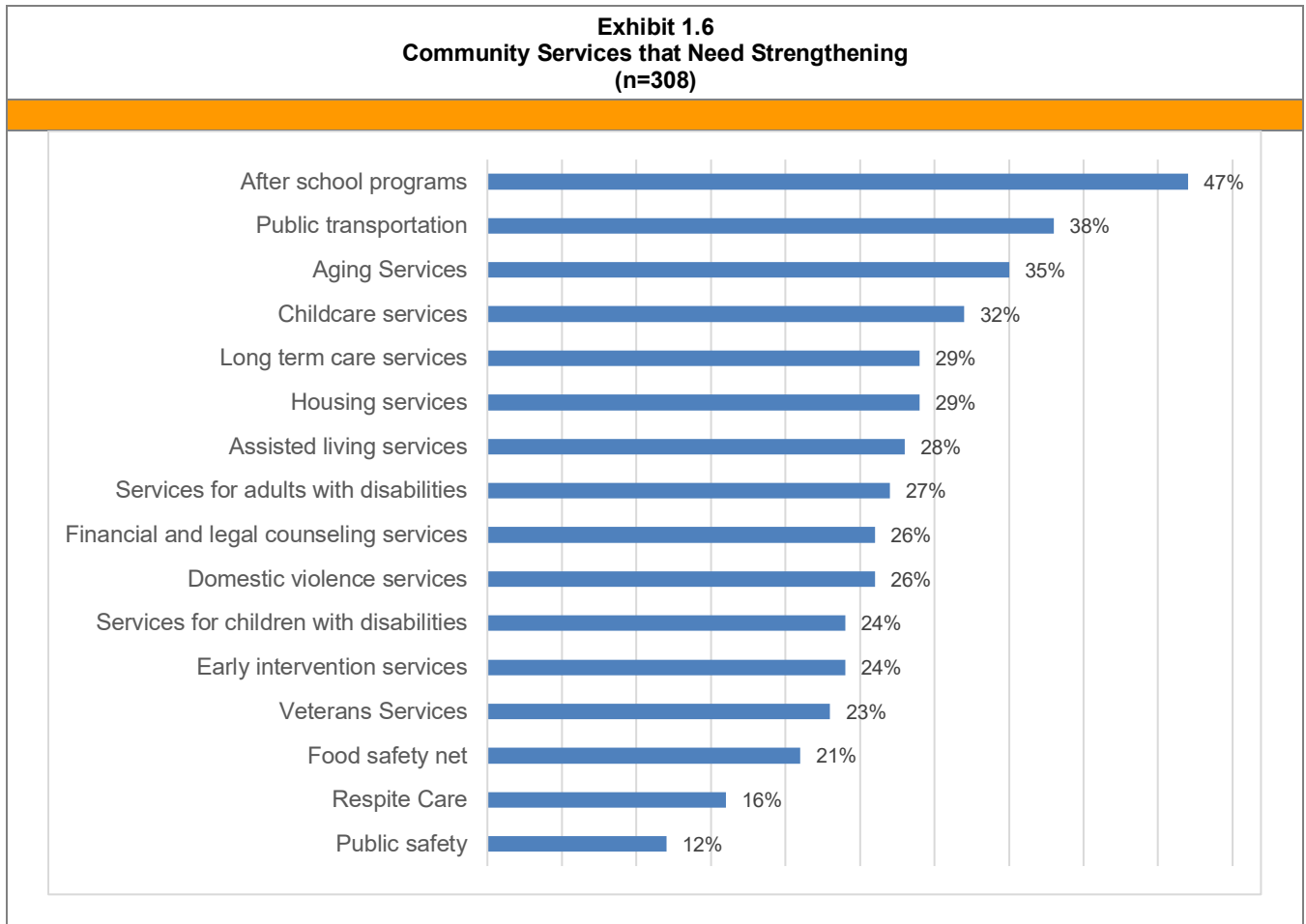| Category	Percentage
Affordable housing	46%
Jobs/healthy economy	44%
Welcoming of diversity	39%
Access to public transportation	36%
Opportunities for healthy activities	32%
Opportunities to participate in community events	31%
Access to safe public parks or playgrounds	28%
Schools	27%
Access to healthy foods	27%
Educational opportunities	26%
Healthy messaging in media and public spaces	25%
Gun safety	18%
Water quality	14%
Traffic	9%
Air quality	4%

E. Health Care Service Needs

Community residents were asked to review a list of common health services, and identify which services need strengthening in their community. The results are shown in **Exhibit 1.5.**

Exhibit 1.5
Health Care Service Needs (n=309)

Service	Percent
Affordable health insurance	58%
Mental health services	54%
Healthcare for the Uninsured and Underinsured	46%
Substance Use services	39%
Services for weight control	30%
Chronic disease services	26%
Specialty Care services	25%
Dental services	23%
Pharmacy services	20%
Primary care services	20%
Home health services	19%
Public health services	17%
Vision services	16%
Services for quitting smoking	14%
Workplace health services	13%
Maternal and infant health services	12%
Hospital services	12%
Hearing services	9%
Physical Rehabilitation	8%

F. Community Services

Community residents were asked to review a list of common community support services and identify which of those services need strengthening in their community. The results are shown in **Exhibit 1.6**.

Exhibit 1.6
Community Services that Need Strengthening
(n=308)

Service	Percentage
After school programs	47%
Public transportation	38%
Aging Services	35%
Childcare services	32%
Long term care services	29%
Housing services	29%
Assisted living services	28%
Services for adults with disabilities	27%
Financial and legal counseling services	26%
Domestic violence services	26%
Services for children with disabilities	24%
Early intervention services	24%
Veterans Services	23%
Food safety net	21%
Respite Care	16%
Public safety	12%

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G. In Their Own Words – Insights from Community Residents

Community residents were asked to share in their own words their insights on the health and well-being of their community. **Exhibit 1.7** presents a summary of the **most common themes** and the associated number of responses. The most common themes are provided as a summary illustration, but they do not represent all the responses provided. The detailed responses are provided under separate cover.

Exhibit 1.7
In their Own Words – Insights from Community Resident Survey Respondents

1. How would you define a healthy community? (n=209)

85 Access to Healthcare Services Medical, Dental, Behavioral Health	56 Access to Community & Social Services	25 Supports for Healthy Lifestyles	24 Supports for People with Disabilities	22 Supports for Children

2. Are there particular groups of people within your neighborhood or community who need help obtaining better health? (n=177)

63 Elderly Population	36 Low Income Population	28 Child Population	23 People with Behavioral Health Concerns	17 Minority Population

3. Are there any new health issues within your neighborhood or community that others may not be aware of, but could cause serious harm today or in the future? (n=140)

35 Behavioral Health Issues	31 COVID-19 Issues	30 Access to Health Care Issues	16 Unhealthy Lifestyle Issues	16 Child Health Issues

4. In your view, what are the people, places or things that contribute the most to better health in your neighborhood or community? (n=185)

54 Healthcare Services	68 Community & Social Services	10 Community Engagement	8 Support for Health Equity

5. Please share your ideas about how people could work together to promote better health in your neighborhood or community (n=262)

65 COVID-19 Response	43 Healthcare Service	43 Supports for Children	25 Supports for People with Disabilities

6. Do you have any ideas on how local organizations can help you and others in your neighborhood or community achieve better health? (n=120)

30 Community & Social Services	23 Healthcare Services	16 Supports for Children	15 Supports for Healthy Lifestyles	11 Supports for People with Disabilities

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Section 2. Insights from Community Professionals

In addition to the survey of community residents described in Section 1, a second *Community Insight Survey* was conducted with a group of community professionals identified by the Planning District 9 Planning Workgroup. This section describes the methods, summary results, and detailed results for each section of the survey.

A. Survey Methods

The survey was conducted online with a pool of potential respondents identified by the project partners from their existing lists of community contacts. One section of the survey included questions about community needs related to COVID-19. The other sections asked respondents for their insights about community health issues beyond COVID-19. The survey link was sent to a total of 170 community professionals based on lists from the project partners. A total of 38 (22%) respondents whose organizations serve Fauquier and/or Rappahannock county submitted a response (although not every respondent answered every question).

The survey results are presented in the following order:

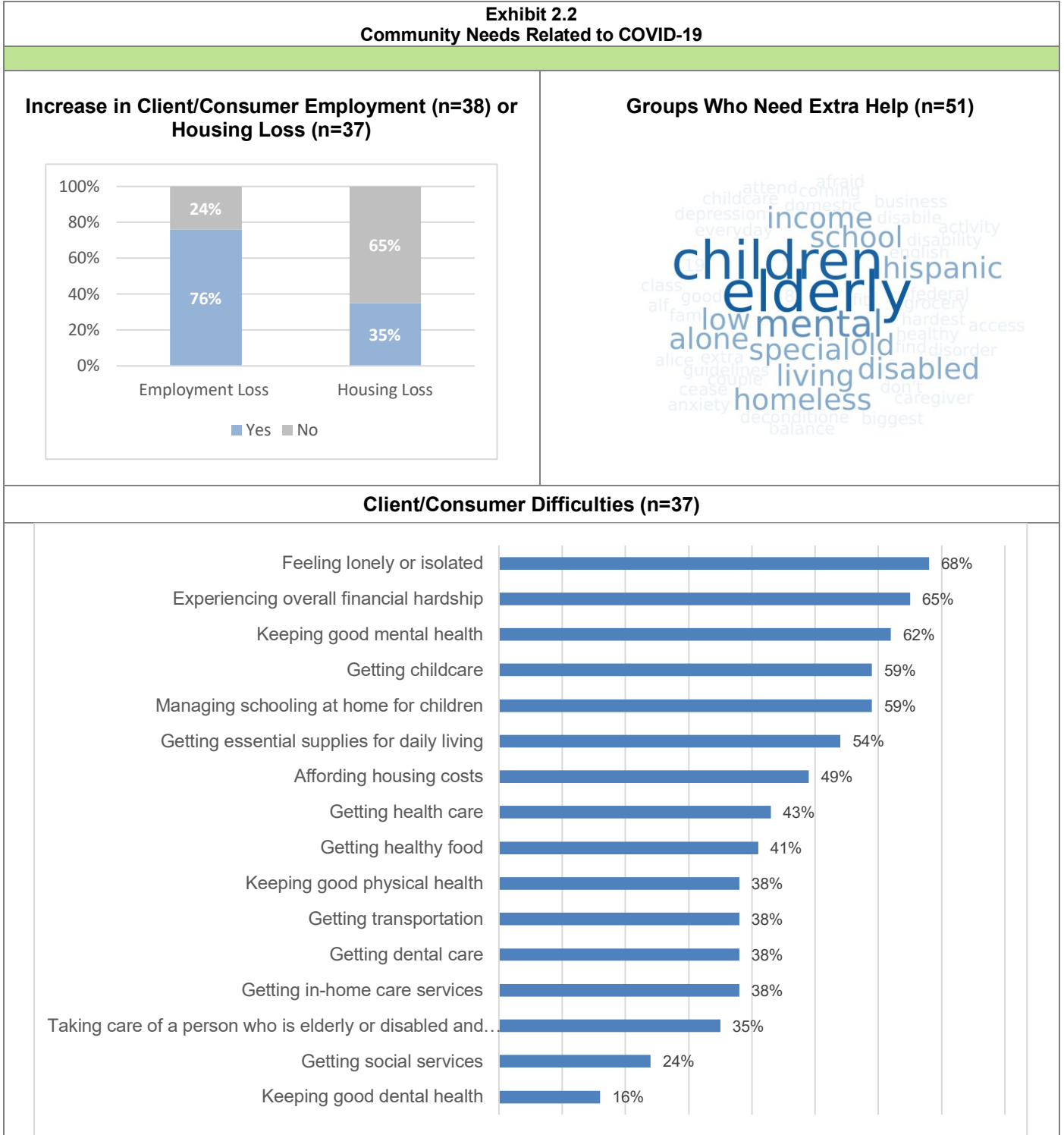|	
B	Organizational Affiliation and Geographic Perspective
C	Community Needs Related to COVID-19
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E	Services and Supports that Need Strengthening
F	In their Own Words – Insights from Community Professionals

B. Organizational Affiliation and Geographic Perspective

Survey Responses were received from 38 community professionals from the organizations listed in **Exhibit 2.1**.
Each respondent was asked to describe their geographic perspective in terms of the counties for which they would
share insights on the survey. Most respondents identified multiple counties.

Exhibit 2.1 **Organizational Affiliation and Geographic Perspective** **(n=38)**

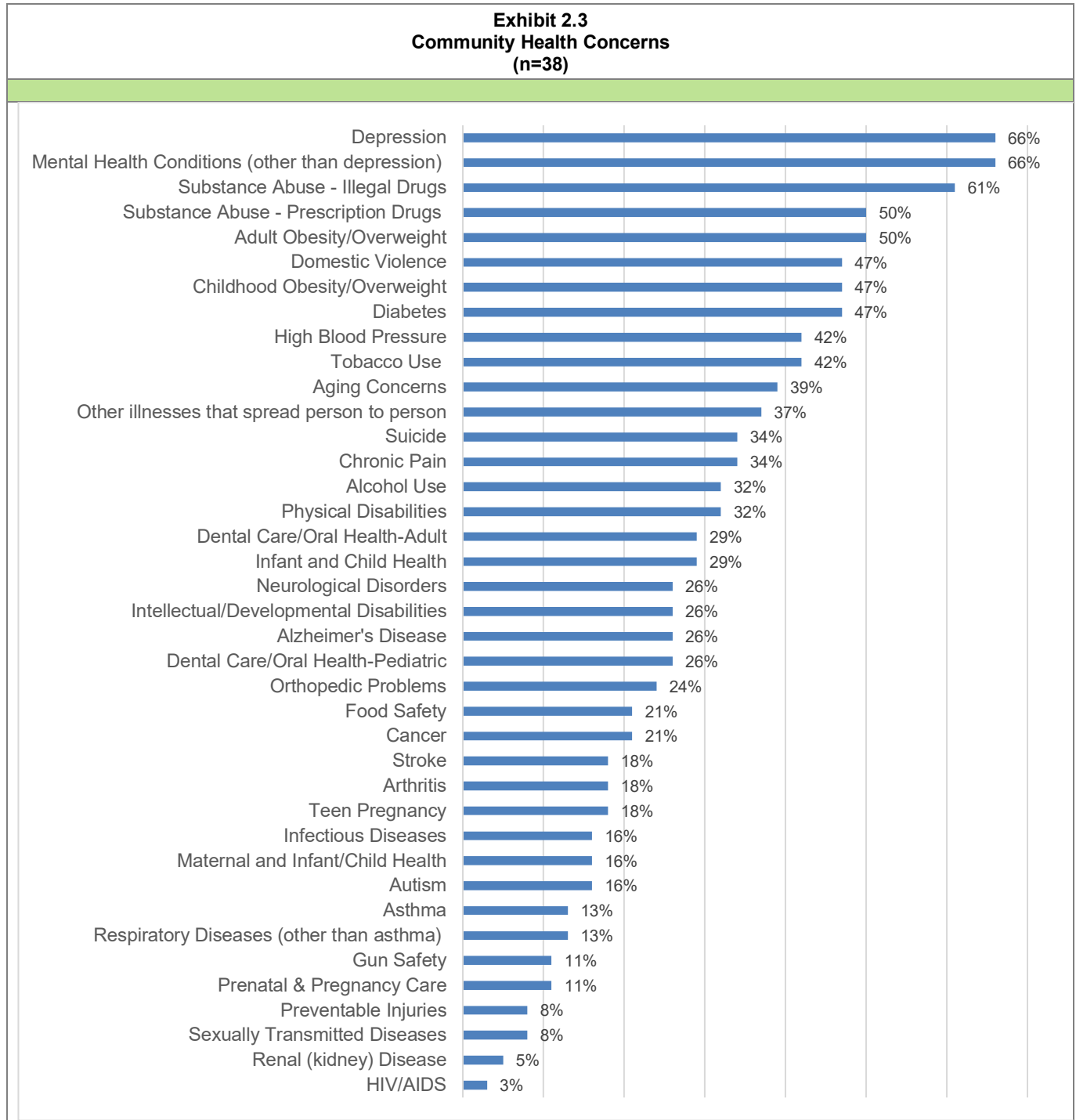| **By Organization** *(A count denotes multiple respondents from the same organization.)*	**By Geographic Perspective** (Can select multiple)	
☐ Aging Together	Fauquier	87%
☐ Anonymous	Rappahannock	68%
☐ Boys & Girls Club of Fauquier		
☐ BRCCC		
☐ Caring Angels Home Health		
☐ Come As You Are, Inc.		
☐ Culpeper Chamber of Commerce		
☐ DARS		
☐ Fauquier Community Action Committee, Head Start		
☐ Fauquier County		
☐ Fauquier County Parks & Recreation		
☐ Fauquier County Public Schools/FRESH		
☐ Fauquier County Sheriff's Office/Jail		
☐ Fauquier Department of Social Services		
☐ Fauquier Free Clinic		
☐ Fauquier Health		
☐ FCCC		
☐ Headwaters		
☐ Horse and Soul Counseling		
☐ Lord Fairfax Community College		
☐ Mental Health Assoc. and others.		
☐ Mental Health Association of Fauquier		
☐ NH UVA Culpeper Medical Center		
☐ Operation First Response		
☐ PATH Foundation		
☐ Piedmont Dispute Resolution Center		
☐ Powell Wellness Center (2)		
☐ Rappahannock center for education		
☐ Rappahannock County OEM		
☐ Rappahannock County Sheriff's Office		
☐ Virginia Cooperative Extension		
☐ Virginia Department of Health (4)		
☐ Wakefield School		
☐ Windy Hill Foundation, Inc.		

C. Community Needs Related to COVID-19

Community professionals were asked to share their insights on community needs specifically related to COVID-19. As shown in **Exhibit 2.2**, 76% said they have seen an increase in employment loss due to COVID-19, and 35% said they have seen an increase in housing loss. Survey respondents also identified multiple groups that need extra help due to COVID-19. They also shared their perceptions of client/consumer difficulty as shown in the bottom panel.

Exhibit 2.2
Community Needs Related to COVID-19

Increase in Client/Consumer Employment (n=38) or Housing Loss (n=37)

Groups Who Need Extra Help (n=51)

Client/Consumer Difficulties (n=37)

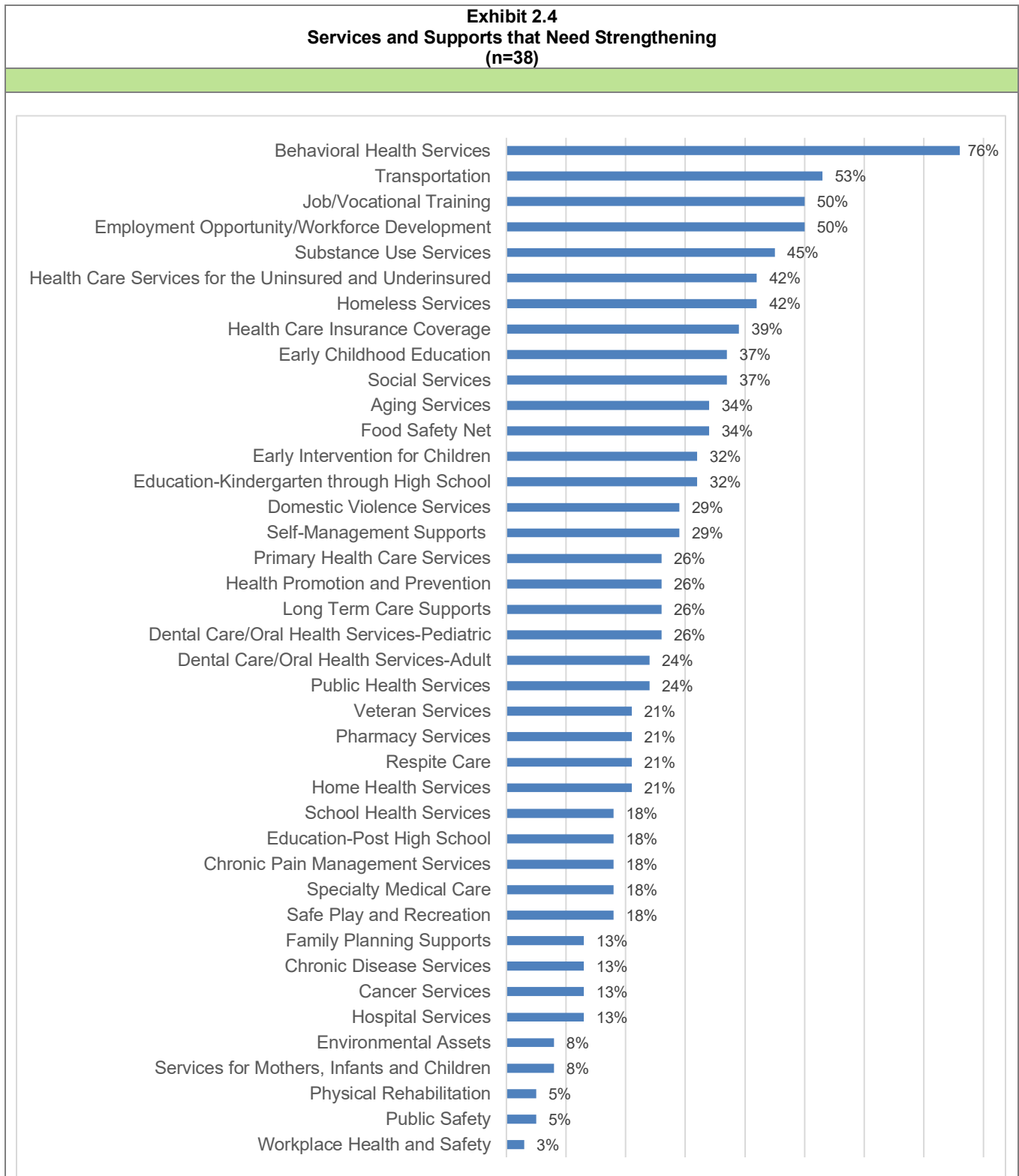|	
Feeling lonely or isolated	68%
Experiencing overall financial hardship	65%
Keeping good mental health	62%
Getting childcare	59%
Managing schooling at home for children	59%
Getting essential supplies for daily living	54%
Affording housing costs	49%
Getting health care	43%
Getting healthy food	41%
Keeping good physical health	38%
Getting transportation	38%
Getting dental care	38%
Getting in-home care services	38%
Taking care of a person who is elderly or disabled and…	35%
Getting social services	24%
Keeping good dental health	16%

D. Community Health Concerns

Community professionals were asked to review a list of common community health needs and identify which of these needs are present in their community. The results are shown in **Exhibit 2.3**.

Exhibit 2.3
Community Health Concerns
(n=38)

Concern	Percentage
Depression	66%
Mental Health Conditions (other than depression)	66%
Substance Abuse - Illegal Drugs	61%
Substance Abuse - Prescription Drugs	50%
Adult Obesity/Overweight	50%
Domestic Violence	47%
Childhood Obesity/Overweight	47%
Diabetes	47%
High Blood Pressure	42%
Tobacco Use	42%
Aging Concerns	39%
Other illnesses that spread person to person	37%
Suicide	34%
Chronic Pain	34%
Alcohol Use	32%
Physical Disabilities	32%
Dental Care/Oral Health-Adult	29%
Infant and Child Health	29%
Neurological Disorders	26%
Intellectual/Developmental Disabilities	26%
Alzheimer's Disease	26%
Dental Care/Oral Health-Pediatric	26%
Orthopedic Problems	24%
Food Safety	21%
Cancer	21%
Stroke	18%
Arthritis	18%
Teen Pregnancy	18%
Infectious Diseases	16%
Maternal and Infant/Child Health	16%
Autism	16%
Asthma	13%
Respiratory Diseases (other than asthma)	13%
Gun Safety	11%
Prenatal & Pregnancy Care	11%
Preventable Injuries	8%
Sexually Transmitted Diseases	8%
Renal (kidney) Disease	5%
HIV/AIDS	3%

E. Services and Supports that Need Strengthening

Community professionals were asked to review a list of common community services and supports, and identify which of those services need strengthening in their community. The results are shown in **Exhibit 2.4**.

Exhibit 2.4
Services and Supports that Need Strengthening
(n=38)

Service	Percent
Behavioral Health Services	76%
Transportation	53%
Job/Vocational Training	50%
Employment Opportunity/Workforce Development	50%
Substance Use Services	45%
Health Care Services for the Uninsured and Underinsured	42%
Homeless Services	42%
Health Care Insurance Coverage	39%
Early Childhood Education	37%
Social Services	37%
Aging Services	34%
Food Safety Net	34%
Early Intervention for Children	32%
Education-Kindergarten through High School	32%
Domestic Violence Services	29%
Self-Management Supports	29%
Primary Health Care Services	26%
Health Promotion and Prevention	26%
Long Term Care Supports	26%
Dental Care/Oral Health Services-Pediatric	26%
Dental Care/Oral Health Services-Adult	24%
Public Health Services	24%
Veteran Services	21%
Pharmacy Services	21%
Respite Care	21%
Home Health Services	21%
School Health Services	18%
Education-Post High School	18%
Chronic Pain Management Services	18%
Specialty Medical Care	18%
Safe Play and Recreation	18%
Family Planning Supports	13%
Chronic Disease Services	13%
Cancer Services	13%
Hospital Services	13%
Environmental Assets	8%
Services for Mothers, Infants and Children	8%
Physical Rehabilitation	5%
Public Safety	5%
Workplace Health and Safety	3%

F. In Their Own Words – Insights from Community Professionals

Community professionals were asked to share in their own words their insights on the health and well-being of their community. **Exhibit 2.5** provides a summary of the **most common themes** and the associated number of responses. The most common themes are provided as a summary illustration, but they do not represent all the responses provided. The detailed responses are provided under separate cover.

Exhibit 2.5
In their Own Words – Insights from Community Professionals

1.   In your own words, how would you define the idea of a "healthy community"? (n=31)

19 Access to Healthcare (Medical, Dental, Behavioral)	10 Access to Community & Social Services	8 Supports for People with Behavioral Health Concerns	5 Healthy Lifestyle Supports	3 Supports for People with Disabilities

2.   In your view, what are the most important health assets within the community? (n=33)

17 Healthy Lifestyle Supports	14 Healthcare Services	11 Community and Social Services	6 Supports for Elderly	3 Supports for Children

3.   Are there particular groups within the community who are at greater risk for health problems or difficulties obtaining their best health? (n=34)

13 Elderly Population	8 People with Behavioral Health Concerns	7 Minority Population	6 Low Income Population	5 People with Disabilities

4. Are there any new health issues within the community that may not be widely known yet, but could cause serious harm today or in the future? (n=18)

8 Child Health Issues	6 Behavioral Health Issues	4 COVID-19 Issues	3 Disability-Related Issues	3 Access to Healthcare

5. Please share your ideas about how people could work together to promote optimal health in the community (n=28)

12 More Community Collaboration	6 Healthcare Services	6 Community & Social Services	4 Healthy Lifestyle Supports

6. Please share your additional ideas or suggestions (n=11)

4 Health Care Services	2 Health Equity	1 Community and Social Services	1 Low Income Population

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Section 3. Community Indicator Profiles

This section of the report provides a quantitative profile of the study region based on a wide array of community health indicators. To produce the profile, Community Health Solutions analyzed data from multiple sources. By design, the analysis does not include every possible indicator of community health. The analysis is focused on a set of indicators that provide broad insight into community health and for which there were readily available data sources.

The results of this profile can be used to evaluate community health status compared to the Commonwealth of Virginia overall. The results can also be helpful for determining the number of people affected by specific health concerns. In addition, the results can be used alongside the survey results to help inform action plans for community health improvement.

The community data profiles are organized into two sections as outlined below. Health factors include demographics and other factors that can influence health status and access to health care for community populations. Health outcomes are indicators of the health status of community members.

Health Factor Profiles	Health Outcome Profiles
A. Community Demographics B. Social Determinants of Health C. Health Risk Behaviors for Adults D. Health Risk Behaviors for Youth E. Access to Health Care	F. Leading Causes of Death G. Maternal and Infant Health H. Cancer Incidence I. Communicable Disease Incidence J. Injury and Violence K. Preventable Hospitalization L. Mental Health and Substance Use

A. Health Factors: Community Demographics

Exhibit 3.1 provides a demographic profile of each county and the study region. Focusing on rates in the bottom panel, compared to Virginia as a whole, the study region is more rural, has a higher percentage of seniors age 65+, and is less racially and ethnically diverse.

Exhibit 3.1 Community Demographics (2020)					
Indicator		**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Estimated Counts					
Total Population	Population	73,383	7,502	80,885	8,684,166
Age	Children Age 0-17	16,151	1,283	17,434	1,857,391
	Adults Age 18-29	9,481	830	10,311	1,425,254
	Adults Age 30-44	12,857	1,139	13,996	1,728,750
	Adults Age 45-64	21,893	2,303	24,196	2,272,656
	Seniors Age 65+	13,001	1,947	14,948	1,400,115
Sex	Female	37,126	3,766	40,892	4,411,676
	Male	36,257	3,736	39,993	4,272,490
Race	Asian	1,259	74	1,333	609,644
	Black/African American	5,489	324	5,813	1,687,062
	White	61,106	6,860	67,966	5,667,763
	Other or Multi-Race	5,529	244	5,773	719,697
Ethnicity	Hispanic Ethnicity	7,308	301	7,609	880,213
Estimated Rates					
Total Population	Population Density (pop. per sq. mile)	113.3	28.2	88.5	219.9
Age	Children Age 0-17 pct. of Total Pop.	22%	17%	22%	21%
	Adults Age 18-29 pct. of Total Pop.	13%	11%	13%	16%
	Adults Age 30-44 pct. of Total Pop.	18%	15%	17%	20%
	Adults Age 45-64 pct. of Total Pop.	30%	31%	30%	26%
	Seniors Age 65+ pct. of Total Pop.	18%	26%	18%	16%
Sex	Female pct. of Total Pop.	51%	50%	51%	51%
	Male pct. of Total Pop.	49%	50%	49%	49%
Race	Asian pct. of Total Pop.	2%	1%	2%	7%
	Black/African American pct. of Total Pop.	7%	4%	7%	19%
	White pct. of Total Pop.	83%	91%	84%	65%
	Other or Multi-Race pct. of Total Pop.	8%	3%	7%	8%
Ethnicity	Hispanic Ethnicity pct. of Total Pop.	10%	4%	9%	10%
Source: Community Health Solutions analysis of data from ESRI. See Appendix B: Data Sources for details					

B. Health Factors: Social Determinants of Health

Exhibit 3.2 shows selected social determinants of health for residents of each county and the study region as a whole. Social determinants of health are social and economic factors that can influence health and access to health care for individuals and populations. The results show there are substantial numbers of community residents with low income, without a high school diploma, with food insecurity, and housing problems. These factors can impact an individual's health status and access to health services and supports.

Exhibit 3.2 **Social Determinants of Health (Various Years)**					
Indicator		**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Estimated Counts					
Income	Total Population (Individual) in Poverty (2018)	4,177	650	4,827	893,580
	Total Households in Poverty (2018)	1,423	313	1,736	330,813
Education	Population Age 25+ Without a High School Diploma (2020)	3,704	595	4,299	593,336
Food Insecurity	Food Insecure Population (2017)	4,030	590	4,620	863,390
Housing	Households with Severe Housing Problems[3] (2012-2016)	2,840	520	3,360	461,330
Estimated Rates					
Income	Total Population (Individual) in Poverty pct. of Total Population for Whom Poverty Status is Determined (2018)	6%	9%	6%	11%
	Total Households in Poverty pct. of Total Households for Whom Poverty Status is Determined (2018)	6%	11%	6%	11%
	Median Household Income (2020)	$95,822	$61,522	$91,883	$73,543
	Per Capita Income (2020)	$45,542	$37,720	$44,817	$40,095
Education	Population Age 25+ Without a High School Diploma pct. of Total Pop. Age 25+ (2020)	7%	10%	7%	10%
Food Insecurity	Food Insecure Population pct. of Total Population (2017)	6%	8%	6%	10%
Housing	Households with Severe Housing Problems pct. of Total Households (2012-2016)	12%	16%	12%	15%
Source: Community Health Solutions analysis of data from ESRI, The U.S. Department of Housing and Urban Development, and Feeding America. See Appendix B: Data Sources for details					

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[3] Percentage of households with at least 1 of 4 housing problems: overcrowding, high housing costs, lack of kitchen facilities, or lack of plumbing facilities.

C. Health Factors: Risk Behaviors for Adults

Exhibit 3.3 shows selected health risk behaviors for adults by county and the study region. Health risk behaviors include lifestyle factors that can influence health including development of chronic disease. Please note that these figures are estimates derived by applying 2017/2018 health district estimates to 2020 local demographics for the study region. They are subject to error and presented for planning purposes only. The results show there are substantial numbers of community residents who could reduce their health risks by improving their diet, reducing their body weight, engaging in physical activity, reducing alcohol consumption, and ceasing smoking.

Exhibit 3.3 Adult Health Risk Behaviors (2020 Estimates)					
Indicator		**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Estimated Counts					
Total Estimated Adults age 18+		57,232	6,219	63,451	6,826,775
Lifestyle Risk Factors	Less than Five Servings of Fruits and Vegetables Per Day	47,503	5,162	52,664	5,597,956
	Overweight or Obese	36,628	3,980	40,609	4,505,672
	Not Meeting Recommendations for Physical Activity in the Past 30 Days	14,880	1,617	16,497	1,501,891
	At-risk for Binge Drinking[4]	6,868	746	7,614	1,092,284
	Smoker	11,446	1,244	12,690	1,024,016
Chronic Conditions[5]	High Cholesterol	22,320	2,425	24,746	2,389,371
	High Blood Pressure	21,748	2,363	24,111	2,184,568
	Arthritis	14,308	1,555	15,863	1,774,962
	Diabetes	6,296	684	6,980	750,945
General Health Status	Fair or Poor Health Status	10,302	1,119	11,421	1,570,158
Estimated Rates					
Lifestyle Risk Factors	Less than Five Servings of Fruits and Vegetables Per Day	83%	83%	83%	82%
	Overweight or Obese	64%	64%	64%	66%
	Not Meeting Recommendations for Physical Activity in the Past 30 Days	26%	26%	26%	22%
	At-risk for Binge Drinking	12%	12%	12%	16%
	Smoker	20%	20%	20%	15%
Chronic Conditions	High Cholesterol	39%	39%	39%	35%
	High Blood Pressure	38%	38%	38%	32%
	Arthritis	25%	25%	25%	26%
	Diabetes	11%	11%	11%	11%
General Health Status	Fair or Poor Health Status	18%	18%	18%	23%
Source: Community Health Solutions analysis of data from Virginia Department of Health Behavioral Risk Factor Surveillance System and demographic estimates from ESRI. See Appendix B: Data Sources for details					

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[4] Males having five or more drinks on one occasion, females having four or more drinks on one occasion.
[5] As told by a doctor or other health professional

D. Health Factors: Risk Behaviors for Youth

Exhibit 3.4 shows selected health risk behaviors for youth by county and the study region as a whole. Please note that all indicators in this profile are based on 2019 health district estimates applied to 2020 local demographics for the study region. They are subject to error and presented for planning purposes only. The results show there are substantial numbers of community youth who could reduce their health risks by avoiding tobacco and vapor products, engaging in more physical activity, and sustaining healthier body weight.

Exhibit 3.4 High School Youth Health Risk Behaviors (2020 Estimates)					
Indicator		**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Estimated Counts					
Total Estimated High School Youth Age 14-19		5,639	444	6,083	652,253
Lifestyle Risk Factors	Used tobacco or vapor products	1,635	129	1,764	150,018
	Not Meeting Recommendations for Physical Activity in the Past Week	3,271	258	3,528	384,829
Chronic Conditions	Asthma	1,128	89	1,217	136,973
	Overweight or Obese	2,030	160	2,190	202,198
Estimated Rates					
Lifestyle Risk Factors	Used tobacco or vapor products	29%	29%	29%	23%
	Not Meeting Recommendations for Physical Activity in the Past Week	58%	58%	58%	59%
Chronic Conditions	Asthma	20%	20%	20%	21%
	Overweight or Obese	36%	36%	36%	31%
Source: Community Health Solutions analysis of data from Virginia Department of Health Youth Risk Behavior Surveillance System and demographic estimates from ESRI. See Appendix B for details					

E. Health Factors: Access to Health Care

Access to health care is essential for individual and population health. Exhibit 3.5 provides indicators of access to health insurance for community residents. As shown, an estimated 6,663 community members may lack health coverage, with higher uninsured rates among lower-income populations. Looking beyond health coverage, Exhibit 3.6 shows that both counties in the region have been designated as full or partial medically underserved areas by the U.S. Health Resources and Services Administration. The designations are based on several factors including primary care provider supply, infant mortality, prevalence of poverty and the prevalence of seniors age 65+.

Exhibit 3.5 **Access to Health Coverage-Uninsured Population (2018 Estimates)**					
Indicator		**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Estimated Counts - Population					
Total Population Age 0-64	Total Population Age 0-64	59,005	5,232	64,237	6,981,520
	Total Population Age 0-19	17,370	1,253	18,623	1,935,423
	Total Population Age 18-64	42,550	4,067	46,617	5,141,142
Estimated Counts - Uninsured					
Uninsured Population Age 0-64	All Incomes	5,965	698	6,663	705,225
	138% to 400% of Poverty	2,914	354	3,268	353,297
	<= 200% of Poverty	2,368	330	2,698	341,332
	<= 138% of Poverty	1,440	204	1,644	218,164
Uninsured Population Age 0-19	All Incomes	998	104	1,102	95,977
	138% to 400% of Poverty	505	56	561	49,807
	<= 200% of Poverty	394	52	446	46,780
	<= 138% of Poverty	229	30	259	28,816
Uninsured Population Age 18-64	All Incomes	5,055	604	5,659	618,552
	138% to 400% of Poverty	2,450	302	2,752	307,967
	<= 200% of Poverty	2,008	284	2,292	299,182
	<= 138% of Poverty	1,232	178	1,410	192,475
Estimated Rates - Uninsured					
Uninsured Population Age 0-64	All Incomes	10%	13%	10%	10%
	138% to 400% of Poverty	16%	16%	16%	14%
	<= 200% of Poverty	27%	27%	27%	20%
	<= 138% of Poverty	28%	29%	28%	20%
Uninsured Population Age 0-19	All Incomes	6%	8%	6%	5%
	138% to 400% of Poverty	8%	9%	8%	6%
	<= 200% of Poverty	12%	15%	13%	8%
	<= 138% of Poverty	6%	8%	13%	5%
Uninsured Population Age 18-64	All Incomes	12%	15%	12%	12%
	138% to 400% of Poverty	20%	19%	20%	17%
	<= 200% of Poverty	36%	32%	35%	26%
	<= 138% of Poverty	37%	33%	36%	26%

Notes: These data may reflect conservative estimates of health coverage for 2018. Readers are encouraged to review current data on Medicaid Expansion enrollment that which updated on a regular basis. Click here view the Department of Medical Assistance Services Medicaid Expansion Access Dashboard.

Source: Community Health Solutions analysis of data from US Census Bureau Small Area Health Insurance Estimates
See Appendix B: Data Sources for details

Exhibit 3.6 Access to Health Care-Medically Underserved Areas/Populations			
Locality	**Index of Medical Underservice Score (0= Highest Need 100 =Lowest Need)**	**Service Area Name (s)**	**Rural Status**
Fauquier County	42.6	Lee Division Service Area	Non-Rural
	62.0	Northern Fauquier County	Non-Rural
Rappahannock County	58.6	Entire County	Partially Rural
Source: Community Health Solutions analysis of data from Health Resources and Services Administration. See Appendix B: Data Sources for details			

F. Health Outcomes: Leading Causes of Death

Exhibit 3.7 shows the leading causes of death for each county and the study region as a whole. In 2018 the five leading causes of death in the study region were malignant neoplasms (154), heart disease (141), accidents (46), cerebrovascular disease (34), and chronic lower respiratory disease (31). Age-adjusted mortality rates for the study region are not available.

Exhibit 3.7 Mortality (2018)				
Indicator	**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Counts- Deaths by Leading Cause				
Total Deaths by All Causes	573	68	641	69,353
Malignant Neoplasms	134	20	154	15,142
Heart Disease	124	17	141	14,526
Accidents	45	1	46	3,799
Cerebrovascular Disease	33	1	34	3,771
Chronic Lower Respiratory Disease	25	6	31	3,466
Alzheimer's Disease	17	3	20	2,594
Nephritis and Nephrosis	10	4	14	1,563
Diabetes	12	1	13	2,281
Influenza and Pneumonia	12	0	12	1,279
Suicide	7	1	8	1,198
Chronic Liver Disease	7	0	7	943
Parkinson's Disease	6	1	7	878
Septicemia	3	1	4	1,121
Primary Hypertension	1	1	2	788
Rates-Age Adjusted Per 100,000 Population				
Total Deaths by All Causes	671.8	568.7	N/A	683.8
Malignant Neoplasms	147.5	132.1	N/A	149.3
Heart Disease	146.6	134.8	N/A	147.1
Accidents	65.8	6.8	N/A	42.1
Cerebrovascular Disease	39.5	7.8	N/A	38.8
Chronic Lower Respiratory Disease	28.9	41.5	N/A	34.7
Alzheimer's Disease	21.9	20.8	N/A	27.1
Nephritis and Nephrosis	13.3	28.2	N/A	15.9
Diabetes	14.8	6.8	N/A	22.8
Influenza and Pneumonia	15.8	0	N/A	13.0
Suicide	10.3	7.4	N/A	13.4
Chronic Liver Disease	6.9	0	N/A	9.3
Parkinson's Disease	7.1	7.4	N/A	9.2
Septicemia	3.6	19.5	N/A	11.3
Primary Hypertension	1.4	5.6	N/A	8.0

N/A- Age Adjusted Rates at the Study Region are not available publicly.

Source: Community Health Solutions analysis of data from Virginia Department of Health. See Appendix B: Data Sources for details

G. Health Outcomes: Maternal and Infant Health

Exhibit 3.8 shows indicators of maternal and infant health for each county and the study region as a whole. In 2018 there were 859 total live births, with 51 low weight births, 241 non-marital births, and 24 births to teens. The region also had 5 infant deaths during 2018.

Exhibit 3.8 Natality (2018)				
Indicator	**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Counts				
Total Pregnancies	873	58	931	119,960
Teenage Pregnancies (Age 10-19)	27	2	29	5,158
Infant Deaths	5	0	5	558
Total Live Births	803	56	859	99,629
Low Weight Births	47	4	51	8,201
Non-Marital Births	221	20	241	33,663
Teenage Births (Age 10-19)	22	2	24	3,824
Rates				
Total Pregnancies Rate per 1,000 Females	70.8	54.7	69.6	71.1
Teenage Pregnancies Rate per 1,000 Females age 10-19	5.9	5.4	5.9	9.8
Infant Death Rate per 1,000 Live Births	6.2	0	5.8	5.6
Live Birth Rate per 1,000 Population	11.4	7.7	11.0	11.7
Low Weight Births as a pct. of Total Births	6%	7%	6%	8%
Non-Marital Births as a pct. of Total Births	28%	36%	28%	34%
Teenage Births (Age 10-19) Rate per 1,000 Females age 10-19	4.8	5.4	4.9	7.3

Source: Community Health Solutions analysis of data from Virginia Department of Health. See Appendix B: Data Sources for details

H. Health Outcomes: Cancer Incidence

Exhibit 3.9 shows reported cancer incidence for each county and the study region as a whole for 2013-2017. Over this period, study region residents had 1,975 reported cases of cancer. The most frequent cancer types by site were breast (303), lung and bronchus (270), prostate (266), and colorectal (154).

Exhibit 3.9 Cancer Incidence (2013-2017)				
Indicator	**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Counts- Cancer Incidence by Site				
Cancer Incidence by All Sites	1,745	230	1,975	198,496
Breast	268	35	303	32,339
Cervix Uteri	15	^	--	1,342
Ovary	25	^	--	2,556
Prostate	230	36	266	23,638
Colorectal	130	24	154	16,568
Lung and Bronchus	238	32	270	27,117
Brain and Other Nervous System	23	^	--	2,747
Hodgkin Lymphoma	^	^	--	1,001
Non-Hodgkin Lymphoma	75	^	--	7,986
Kidney and Renal Pelvis	73	^	--	7,416
Liver and Intrahepatic Bile Duct	42	^	--	3,709
Leukemia	57	^	--	4,951
Melanoma of the Skin	52	^	--	9,441
Myeloma	25	^	--	2,954
Oral Cavity and Pharynx	46	^	--	5,611
Pancreas	51	^	--	5,839
Thyroid	64	^	--	5,817
Rates- Age Adjusted Rate Per 100,000 Population				
All Sites	414.5	375.9	--	415.8
Breast	^	^	--	^
Cervix Uteri	^	^	--	^
Ovary	^	^	--	^
Prostate	^	^	--	^
Colorectal	32.1	46.3	--	35.2
Lung and Bronchus	55.3	51.9	--	56.4
Brain and Other Nervous System	5.7	^	--	6
Hodgkin Lymphoma	^	^	--	2.4
Non-Hodgkin Lymphoma	17.7	^	--	17.1
Kidney and Renal Pelvis	16.7	^	--	16
Liver and Intrahepatic Bile Duct	9.2	^	--	7.3
Leukemia	15.3	^	--	10.9
Melanoma of the Skin	12.2	^	--	20
Myeloma	5.8	^	--	6.2
Oral Cavity and Pharynx	10.3	^	--	11.4
Pancreas	11.5	^	--	12.2
Thyroid	17.3	^	--	13

^ Data are suppressed for incidence counts if counts<11 and for rates if counts<16.
-- Data are not publicly available
Source: Community Health Solutions analysis of data from Virginia Department of Health- Virginia Cancer Registry. See Appendix B: Data Sources for details

I. Health Outcomes: Communicable Disease Incidence

Exhibit 3.10 shows the incidence of communicable disease for each county and the study region as a whole. In 2018 the most commonly reported communicable diseases were hepatitis C - chronic (58), Lyme disease (42), campylobacteriosis (24), salmonellosis (17), and spotted fever (12). Local rates of incidence were higher than Virginia rates for most communicable diseases.

Exhibit 3.10 Communicable Disease (2018)				
Indicator	**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Counts- Communicable Disease Incidence by Leading 10 Conditions				
Hepatitis C, chronic	55	3	58	10,405
Lyme disease	38	4	42	1,139
Campylobacteriosis	22	2	24	1,665
Salmonellosis	17	0	17	1,365
Spotted Fever Rickettsiosis (including RMSF)	12	0	12	339
Pertussis	8	0	8	245
Varicella (Chickenpox)	6	0	6	352
Escherichia coli infection, Shiga Toxin-Producing	4	1	5	400
Hepatitis B, chronic	3	2	5	2,050
Lead, elevated levels	1	0	1	872
Rates- Crude Rate Per 100,000 Population				
Hepatitis C, chronic	79.2	41.0	75.5	122.8
Lyme disease	54.7	54.6	54.7	13.4
Campylobacteriosis	31.7	27.3	31.3	19.7
Salmonellosis	24.5	0.0	22.1	16.0
Spotted Fever Rickettsiosis (including RMSF)	17.3	0.0	15.6	4.0
Pertussis	11.5	0.0	10.4	2.9
Varicella (Chickenpox)	8.6	0.0	7.8	4.2
Escherichia coli infection, Shiga Toxin-Producing	5.8	13.7	6.5	4.7
Hepatitis B, chronic	4.3	27.3	6.5	24.2
Lead, elevated levels	1.4	0.0	1.3	10.3

Source: Community Health Solutions analysis of data from Virginia Department of Health. See Appendix B: Data Sources for details

J. Heath Outcomes: Injury and Violence

This section presents indicators of deaths and hospitalizations due to injury and violence. **Exhibit 3.11** shows indicators of deaths by injury and violence for each county and the study region as a whole. In 2016 the study region had 70 deaths related to injury or violence, with the leading causes of death being poison (29), drug poisoning due to overdose (27), traumatic brain injury (25), motor vehicle traffic injury (14), and suicide (11). Crude death rates were higher than the Virginia rates for total deaths. Age-adjusted death rates were not available for this analysis.

Exhibit 3.11 Injury and Violence-Deaths (2016)				
Indicator	**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Counts – Injury and Violence Related Deaths by Cause				
Injury and Violence Related Deaths	65	5	70	5,154
Poison (non-drug)	27	2	29	1,027
Drug Poisoning (Overdose)	25	2	27	1,430
Traumatic Brain Injury	23	2	25	811
Motor Vehicle Traffic Injury	13	1	14	1,131
Suicide	10	1	11	736
Unintentional Fall	9	1	10	1,644
Firearms	6	1	7	1,323
Homicide	1	0	1	434
Rates - Crude Rate Per 100,000 Population				
Total Injury and Violence Related Deaths	94.1	--	91.6	61.3
Poison (non-drug)	--	--	--	12.2
Drug Poisoning (Overdose)	--	--	--	17
Traumatic Brain Injury	--	--	--	9.6
Motor Vehicle Traffic Injury	--	--	--	13.4
Suicide	--	--	--	8.7
Unintentional Fall	--	--	--	19.5
Firearms	--	--	--	15.7
Homicide	--	--	--	5.2
-- Rates are not calculated where the number of deaths is less than 30. Source: Community Health Solutions analysis of data from Virginia Department of Health. See Appendix B: Data Sources for details				

Exhibit 3.12 shows hospitalizations due to injury and violence for each county and the study region as a whole. In 2018 study region residents had 264 inpatient hospitalizations for injury or violence-related incidents, with the leading causes being unintentional fall (73), firearm (57), drug poisoning due to overdose (56), traumatic brain injury (37) and self-harm (25). Crude hospitalization rates were higher for the study region compared to Virginia for unintentional fall and firearm.

Exhibit 3.12 Injury and Violence-Hospitalization (2018)				
Indicator	**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Counts-Injury and Violence Related Discharges				
Injury and Violence Related Discharges	247	17	264	32,021
Unintentional Fall	68	5	73	7,234
Firearm	54	3	57	6,156
Drug Poisoning (Overdose)	53	3	56	7,155
Traumatic Brain Injury	34	3	37	5,438
Self-harm	24	1	25	3,622
Poisoning (non-drug)	9	2	11	1,310
Motor Vehicle Injury	4	0	4	881
Assault	1	0	1	225
Rates- Crude Rate Per 100,000 Population				
Injury and Violence Related Discharges	349.5	--	338.8	375.9
Unintentional Fall	96.2	--	93.7	84.9
Firearm	76.4	--	73.1	72.3
Drug Poisoning (Overdose)	75.0	--	71.9	84.0
Traumatic Brain Injury	48.1	--	47.5	63.8
Self-harm	--	--	--	42.5
Poisoning (non-drug)	--	--	--	15.4
Motor Vehicle Injury	--	--	--	10.3
Assault	--	--	--	2.6

-- Rates are not calculated where the number of discharges is less than 30.

Source: Community Health Solutions analysis of data from Virginia Health Information, Inc. and demographic estimates from Virginia Department of Health. See Appendix B: Data Sources for details

K. Health Outcomes: Potentially Avoidable Hospitalizations

Exhibit 3.13 shows indicators of potentially avoidable hospitalizations for each county and the study region as a whole. These hospitalizations are potentially avoidable with adequate access to outpatient care and other health supports. Case are defined using specific diagnosis and procedure codes as noted in **Appendix A**.

In 2018 study region residents had 789 potentially avoidable hospitalizations, with most being for residents age 65+. The leading diagnoses for these hospitalizations were congestive heart failure (240); community acquired pneumonia (200); COPD or asthma in older adults (147); diabetes (87); and urinary tract infection (81). The age-adjusted rate of these hospitalizations was higher in than for Virginia as a whole overall and for community acquired pneumonia; COPD or asthma in older adults; urinary tract infection and hypertension.

Exhibit 3.13 Potentially Avoidable Hospitalizations (2018)				
Indicator	**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Counts-Discharges by Diagnosis				
Total Discharges by All Diagnoses	749	40	789	69,654
Congestive Heart Failure	232	8	240	24,850
Community Acquired Pneumonia	187	13	200	8,353
COPD or Asthma In Older Adults	141	6	147	12,338
Diabetes	80	7	87	13,267
Urinary Tract Infection	77	4	81	7,150
Hypertension	31	2	33	3,103
Asthma in Younger Adults	1	0	1	600
Rates-Age Adjusted Per 100,000 Population				
Total Discharges by All Diagnoses	886.8	316.5	810.5	711.4
Congestive Heart Failure	271.2	--	242.5	250.4
Community Acquired Pneumonia	220.7	--	204.2	85.0
COPD or Asthma in Older Adults	154.6	--	139.6	119.5
Diabetes	103.0	--	99.3	141.5
Urinary Tract Infection	95.5	--	86.3	74.5
Hypertension	40.3	--	37.2	33.0
Asthma in Younger Adults	--	--	--	7.5

-- Rates are not calculated where the number of discharges is less than 30.

Source: Community Health Solutions analysis of data from Virginia Health Information, Inc. and demographic estimates from ESRI. See Appendix B: Data Sources for details

L. Health Outcomes: Mental Health and Substance Use

This section presents indicators of mental health and substance use for each county and the study region as a whole.   Focusing first on hospitalizations, **Exhibit 3.14** shows that study region residents had 407 discharges from Virginia community hospitals for behavioral health conditions in 2018. The leading causes of hospitalization were major depressive disorder - recurrent (116); alcohol related disorders (75); bipolar disorder (63); major depressive disorder - single episode (47); and schizoaffective disorders (22). Rates were lower in the study region that Virginia as whole for all diagnoses where a rate was calculated.

Exhibit 3.14 Hospitalization for Mental Health and Substance Use Diagnoses (2018)				
Indicator	**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Counts- Discharges by Diagnosis				
Total Discharges by All Diagnoses	376	31	407	66,201
Major depressive disorder, recurrent	107	9	116	16,253
Alcohol related disorders	70	5	75	8,386
Bipolar disorder	54	9	63	9,985
Major depressive disorder, single episode	44	3	47	6,506
Schizoaffective disorders	22	0	22	6,026
Reaction to severe stress, and adjustment disorders	14	1	15	3,031
Persistent mood [affective] disorders	11	1	12	1,634
Schizophrenia	10	1	11	3,082
Unspecified mood [affective] disorder	7	0	7	1,963
Unspecified psychosis not due to a substance or known physiological condition	7	0	7	1,129
Unspecified dementia	5	1	6	659
Other anxiety disorders	3	1	4	712
Opioid related disorders	3	0	3	1,425
Other psychoactive substance related disorders	3	0	3	990
Rates- Crude Rate Per 100,000 Population				
Total Discharges	532.0	427.5	522.3	777.2
Major depressive disorder, recurrent	151.4	--	148.9	190.8
Alcohol related disorders	99.0	--	96.2	98.5
Bipolar disorder	76.4	--	80.8	117.2
Major depressive disorder, single episode	62.3	--	60.3	76.4
Schizoaffective disorders	--	--	--	70.7
Reaction to severe stress, and adjustment disorders	--	--	--	35.6
Persistent mood [affective] disorders	--	--	--	19.2
Schizophrenia	--	--	--	36.2
Unspecified mood [affective] disorder	--	--	--	23.0
Unspecified psychosis not due to a substance or known physiological condition	--	--	--	13.3
Unspecified dementia	--	--	--	7.7
Other anxiety disorders	--	--	--	8.4
Opioid related disorders	--	--	--	16.7
Other psychoactive substance related disorders	--	--	--	11.6
-- Rates are not calculated where the number of discharges is less than 30. Source: Community Health Solutions analysis of data from Virginia Health Information, Inc. and demographic estimates from ESRI. See Appendix B: Data Sources for details				

Exhibit 3.15 shows indicators of adult mental health and substance use for each county and the study region as a whole. Please note that these figures are estimates derived by applying 2017/2018 health district or statewide estimates to 2020 local demographics for the study region. They are subject to error and presented for planning purposes only.

Among an estimated 63,451 adults age 18+ in the study region, an estimated 19% may have had a mental illness in the past year, and an estimated 4% may have had a serious mental illness in the past year. An estimated 6% may have had an alcohol use disorder in the past year, and 3% may have had an illicit drug use disorder in the past year.

Exhibit 3.15 Estimated Prevalence of Adult Behavioral Health and Substance Use (2020 Estimates)					
Indicator		**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Estimated Counts					
Total Estimated Adults age 18+		57,232	6,219	63,451	6,826,775
Behavioral Health	One or more days of poor mental health in the past 30 days	16,597	1,804	18,401	2,389,371
	Any Mental Illness in the Past Year	10,760	1,169	11,929	1,283,434
	Received Mental Health Services in the Past Year	8,871	964	9,835	1,058,150
	Major Depressive Episode in the Past Year	3,892	423	4,315	464,221
	Serious Mental Illness in the Past Year	2,289	249	2,538	273,071
Substance Use	Substance Use Disorder in the Past Year	4,464	485	4,949	532,488
	Needing but Not Receiving Treatment at a Specialty Facility for Substance Use in the Past Year	4,235	460	4,695	505,181
	Alcohol Use Disorder in the Past Year	3,319	361	3,680	395,953
	Illicit Drug Use Disorder in the Past Year	1,602	174	1,777	191,150
Estimated Rates					
Behavioral Health	One or more days of poor mental health in the past 30 days	29%	29%	29%	35%
	Any Mental Illness in the Past Year	19%	19%	19%	19%
	Received Mental Health Services in the Past Year	16%	16%	16%	16%
	Major Depressive Episode in the Past Year	7%	7%	7%	7%
Substance Use	Serious Mental Illness in the Past Year	4%	4%	4%	4%
	Substance Use Disorder in the Past Year	8%	8%	8%	8%
	Needing but Not Receiving Treatment at a Specialty Facility for Substance Use in the Past Year	7%	7%	7%	7%
	Alcohol Use Disorder in the Past Year	6%	6%	6%	6%
	Illicit Drug Use Disorder in the Past Year	3%	3%	3%	3%
Source: Community Health Solutions analysis of data from Virginia Department of Health Behavioral Risk Factor Surveillance System, National Surveys on Drug Use and Health State Prevalence Estimates, and demographic estimates from ESRI. See Appendix B: Data Sources for details					

Exhibit 3.16 shows indicators of mental health and substance use for children and youth. As with the adult estimates in **Exhibit 3.15**, these figures are estimates derived by applying 2017/2018 statewide estimates to 2020 local demographics for the study region. They are subject to error and presented for planning purposes only.

Among an estimated 15,026 study region residents age 3-17, an estimated 3%-10% may have one or more behavioral health conditions including: ADD or ADHD, anxiety problems, depression, behavioral or conduct problems, or other cognitive or mental health conditions. Among an estimated 6,383 study region residents age 12-17, an estimated 3% may have had an illicit drug use disorder and an estimated 2% may have an alcohol use disorder in the past year.

Exhibit 3.16 Estimated Prevalence of Child and Youth Behavioral Health and Substance Use (2020 Estimates)				
Indicator	**Fauquier**	**Rappahannock**	**Study Region Total**	**Virginia**
Estimated Counts - Population				
Total Estimated Children Age 3-17	13,920	1,106	15,026	1,565,040
Total Estimated Child Age12-17	5,912	471	6,383	628,758
Estimated Counts – Mental Health and Substance Use				
Behavioral Health (Age 3-17) — ADD or ADHD	1,350	107	1,458	151,809
Anxiety problems	960	76	1,037	107,988
Depression	459	36	496	51,646
Behavioral or conduct problems	960	76	1,037	107,988
Speech or other language disorder	863	69	932	97,032
Learning Disability	905	72	977	101,728
Other mental health condition	668	53	721	75,122
Autism or Autism Spectrum Disorder	445	35	481	50,081
Substance Use (Age 12-17) — Substance Use Disorder in the Past Year	213	17	230	22,635
Needing but Not Receiving Treatment at a Specialty Facility for Substance Use in the Past Year	213	17	230	22,635
Illicit Drug Use Disorder in the Past Year	154	12	166	16,348
Alcohol Use Disorder in the Past Year	112	9	121	11,946
Estimated Rates – Mental Health and Substance Use				
Behavioral Health (Age 3-17) — ADD or ADHD	10%	10%	10%	10%
Anxiety problems	7%	7%	7%	7%
Depression	3%	3%	3%	3%
Behavioral or conduct problems	7%	7%	7%	7%
Speech or other language disorder	6%	6%	6%	6%
Learning Disability	7%	7%	7%	7%
Other mental health condition	5%	5%	5%	5%
Autism or Autism Spectrum Disorder	3%	3%	3%	3%
Substance Use (Age 12-17) — Substance Use Disorder in the Past Year	4%	4%	4%	4%
Needing but Not Receiving Treatment at a Specialty Facility for Substance Use in the Past Year	4%	4%	4%	4%
Illicit Drug Use Disorder in the Past Year	3%	3%	3%	3%
Alcohol Use Disorder in the Past Year	2%	2%	2%	2%

Source: Community Health Solutions analysis of data from National Surveys on Drug Use and Health State Prevalence Estimates, National Survey of Children's Health, and demographic estimates from ESRI. See Appendix B: Data Sources for details

Section 4. Social Determinants of Health

Social determinants of health (SDoH) have been defined as the conditions under which people are born, grow, live, work, and age, and include factors such as socioeconomic status, education, employment, social support networks, and neighborhood characteristics.[6] A growing body of research indicates that SDoH can be linked to a lack of opportunity and resources to protect, improve, and maintain health. The impacts of SDoH can be seen in disparities in health status and access to healthcare for individuals and populations.

This section explores the results of the CHNA study from an SDoH perspective. Part A provides summary insights about SDoH from the survey of community residents and the survey of community professionals. Part B presents a demographic profile of the region that may be helpful for understanding where populations with SDoH risk reside. This type of information can be helpful for planning efforts to reduce health disparities and increase health equity.

A. Insights from Surveys of Community Residents and Community Professionals

Respondents to both surveys were asked if there are particular groups of people within their neighborhood or community who need help obtaining better health. As shown in **Exhibit 4.1**, the most frequently identified populations are shown in the exhibit below, along with a list of specific mentions. Members of these populations have one or more social determinants of health that could influence their health status and access to health services and supports. The list is consistent with research on populations at higher risk for health challenges because of one or more social determinants of health.

Exhibit 4.1 Insights about Vulnerable Populations from Community Residents and Community Professionals				
Most Frequently Identified Populations in the Survey of Community Residents (n=177)				
63 Elderly Population	36 Low Income Population	28 Child Population	23 People with Behavioral Health Concerns	17 Minority Population
Most Frequently Identified Popuilations in the Survey of Community Professionals (n=34)				
13 Elderly Population	8 People with Behavioral Health Concerns	7 Minority Population	6 Low Income Population	5 People with Disabilities
Specific Populations Identified in One or Both Surveys				

- ☐ At-risk youth
- ☐ Black/African American
- ☐ Children
- ☐ Elderly
- ☐ English as Second Language
- ☐ Hispanic
- ☐ Homeless
- ☐ Immigrants (including undocumented)
- ☐ LGBTQ

- ☐ Low-income
- ☐ People of color
- ☐ People with disabilities
- ☐ People with mental health conditions
- ☐ People with substance use problems
- ☐ Re-entrants from incarceration
- ☐ Unemployed
- ☐ Uninsured

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[6] American Academy of Family Physicians

B. Community Mapping of SDoH Indicators

For purposes of assessment and planning it is helpful to understand where populations with SDoH risk factors reside in the community. The following exhibits provide maps and data for four SDoH indicators including low income, minority status, disability, and aging. There are many additional SDoH not shown here. The indicators shown are intended as a starting point for further analysis of SDoH factors in local communities.

Exhibit 4.2 shows the estimated median household income at the county and census tract level as of 2020. County indicators range from $95,822 in Fauquier County to $61,522 in Rappahannock County. At the census tract level, the range expands from a low of $59,614 to a high of $135,544. The lighter census tracts are the areas with the lowest median household income.
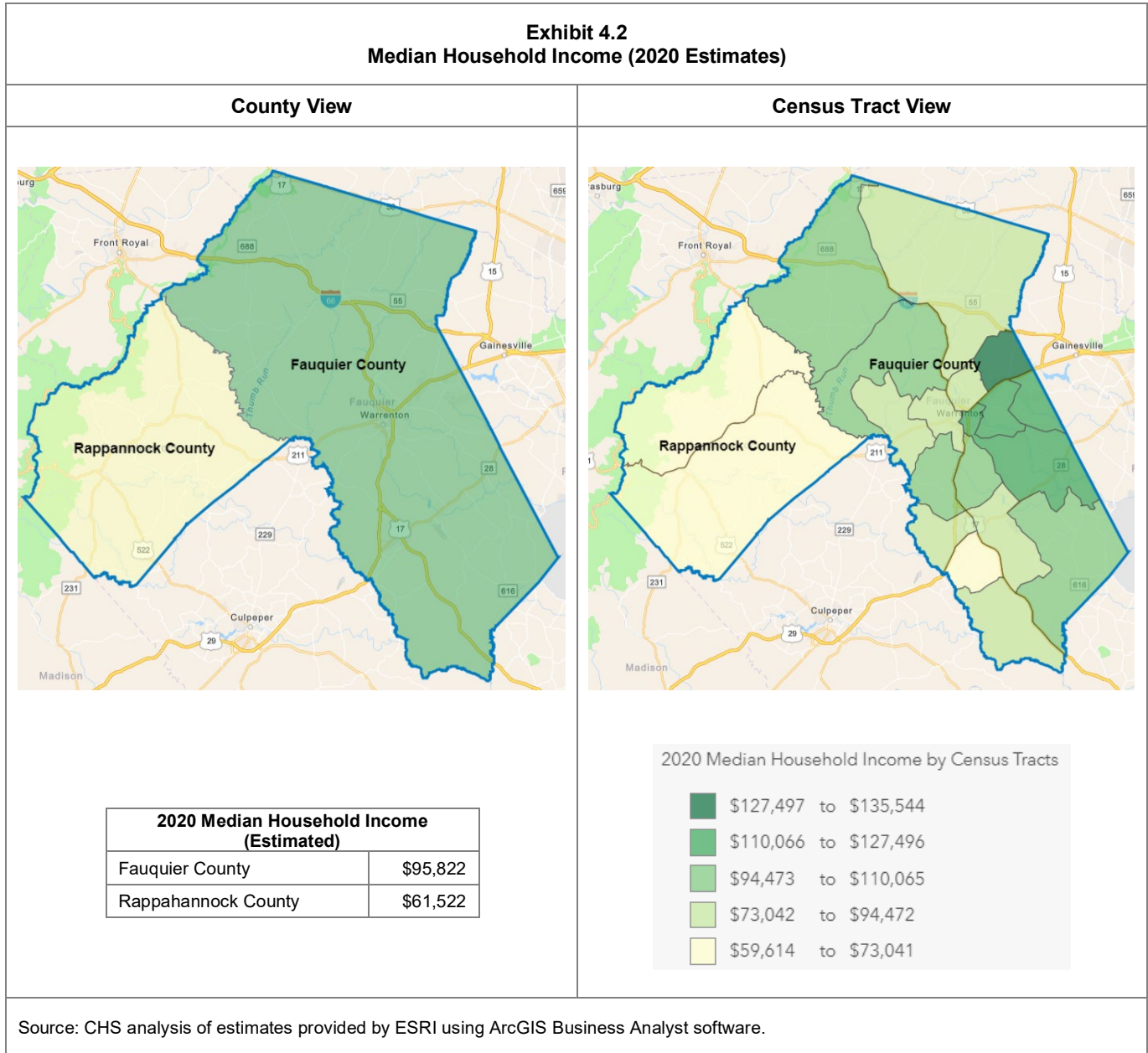

Exhibit 4.2
Median Household Income (2020 Estimates)

County View	Census Tract View

2020 Median Household Income (Estimated)

2020 Median Household Income (Estimated)	
Fauquier County	$95,822
Rappahannock County	$61,522

2020 Median Household Income by Census Tracts

$127,497 to $135,544	
$110,066 to $127,496	
$94,473 to $110,065	
$73,042 to $94,472	
$59,614 to $73,041	

Source: CHS analysis of estimates provided by ESRI using ArcGIS Business Analyst software.

Exhibit 4.3 shows the estimated number of households with income below poverty as of 2018. The county view shows a total of 1,736 households with income below poverty in 2018, along with the county-level figures. The census tract view shows where households in poverty are located within counties and across the region.
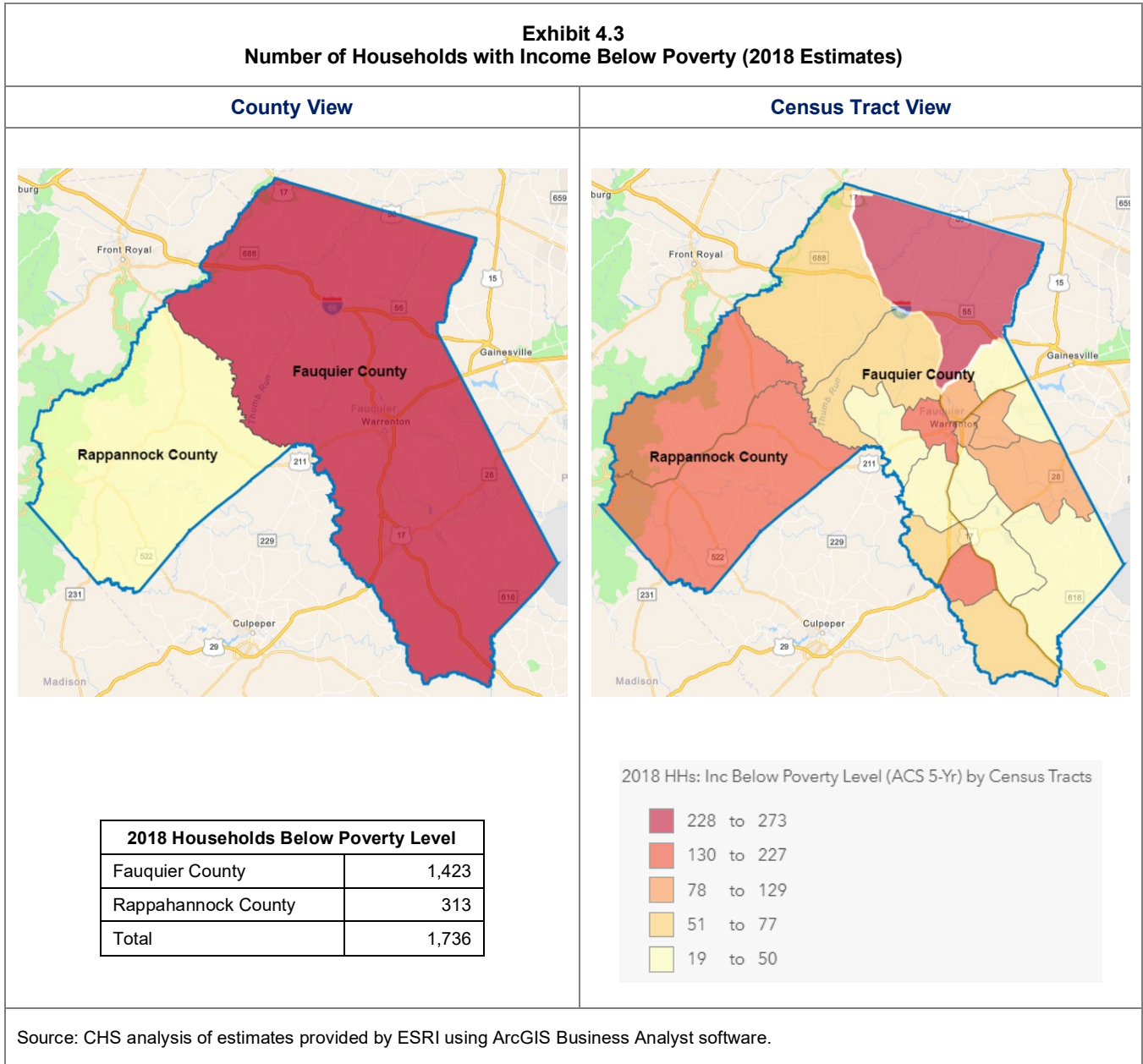

Exhibit 4.3
Number of Households with Income Below Poverty (2018 Estimates)

County View	Census Tract View

2018 Households Below Poverty Level

Fauquier County	1,423
Rappahannock County	313
Total	1,736

2018 HHs: Inc Below Poverty Level (ACS 5-Yr) by Census Tracts

228 to 273
130 to 227
78 to 129
51 to 77
19 to 50

Source: CHS analysis of estimates provided by ESRI using ArcGIS Business Analyst software.

Exhibit 4.4 shows the estimated number of minority residents as of 2020. In this analysis, minority residents include people of races other than White, plus people of Hispanic ethnicity. The county view shows a total of 16,974 minority residents in the study region as a whole, along with the county-level figures. The census tract view shows where minority residents reside within counties and across the region.
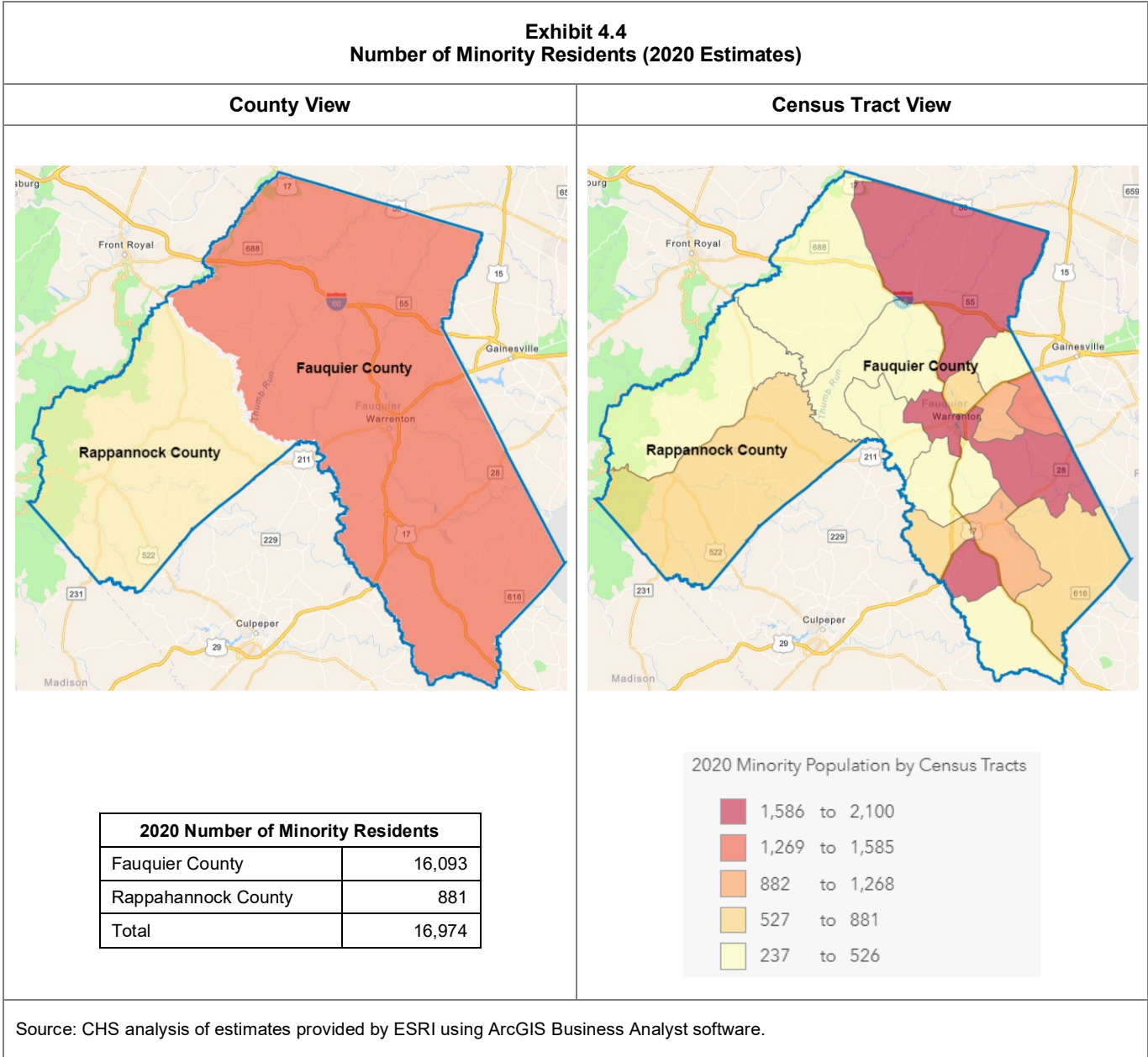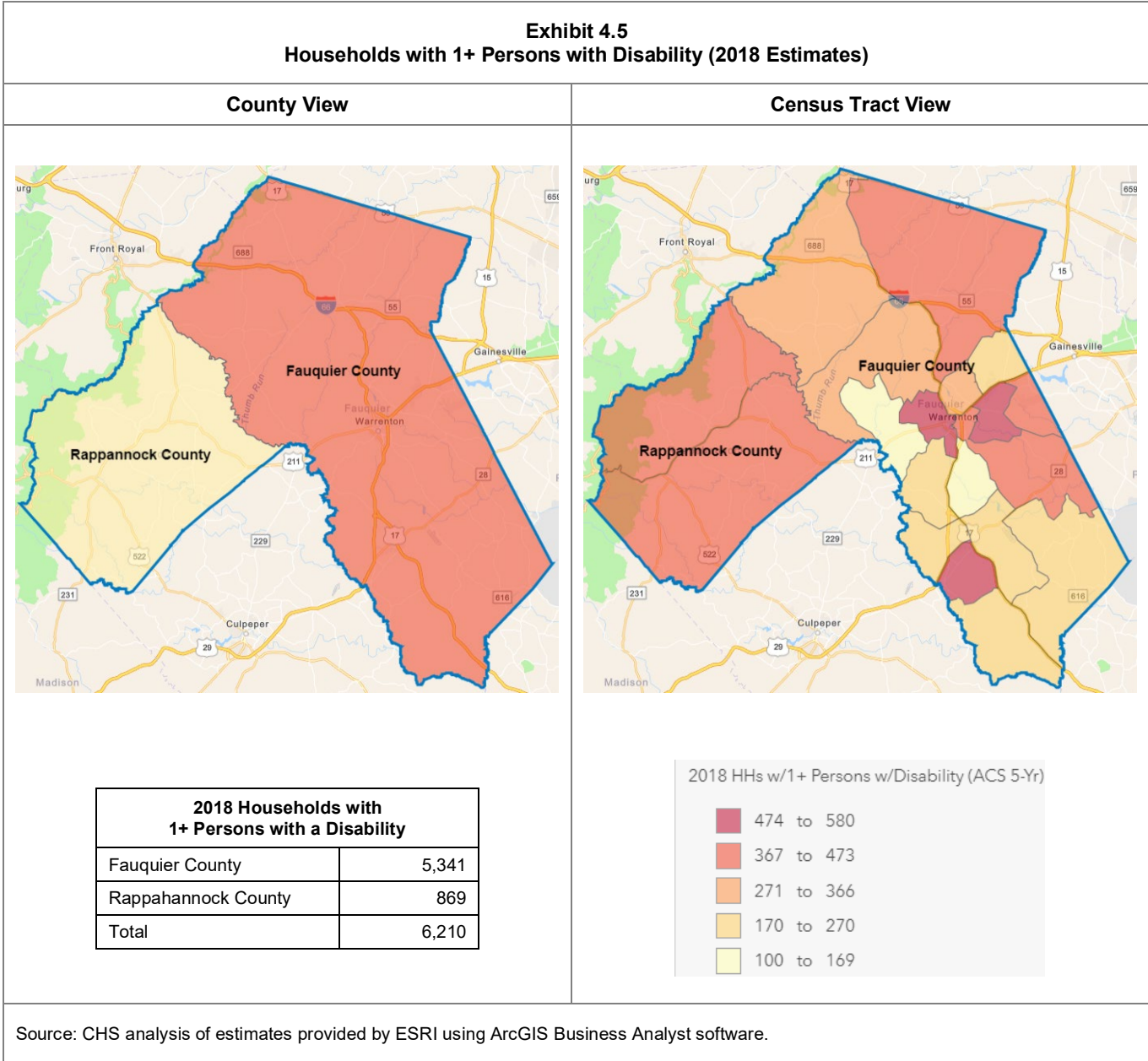
Exhibit 4.4
Number of Minority Residents (2020 Estimates)

County View	Census Tract View

2020 Number of Minority Residents

2020 Number of Minority Residents	
Fauquier County	16,093
Rappahannock County	881
Total	16,974

2020 Minority Population by Census Tracts

1,586 to 2,100	
1,269 to 1,585	
882 to 1,268	
527 to 881	
237 to 526	

Source: CHS analysis of estimates provided by ESRI using ArcGIS Business Analyst software.

Exhibit 4.5 shows the estimated number of households having one or more members with a disability as of 2018. The county view shows a total of 6,210 households meeting this definition, along with county-level figures. The census tract view shows where these households are located within counties and across the region.
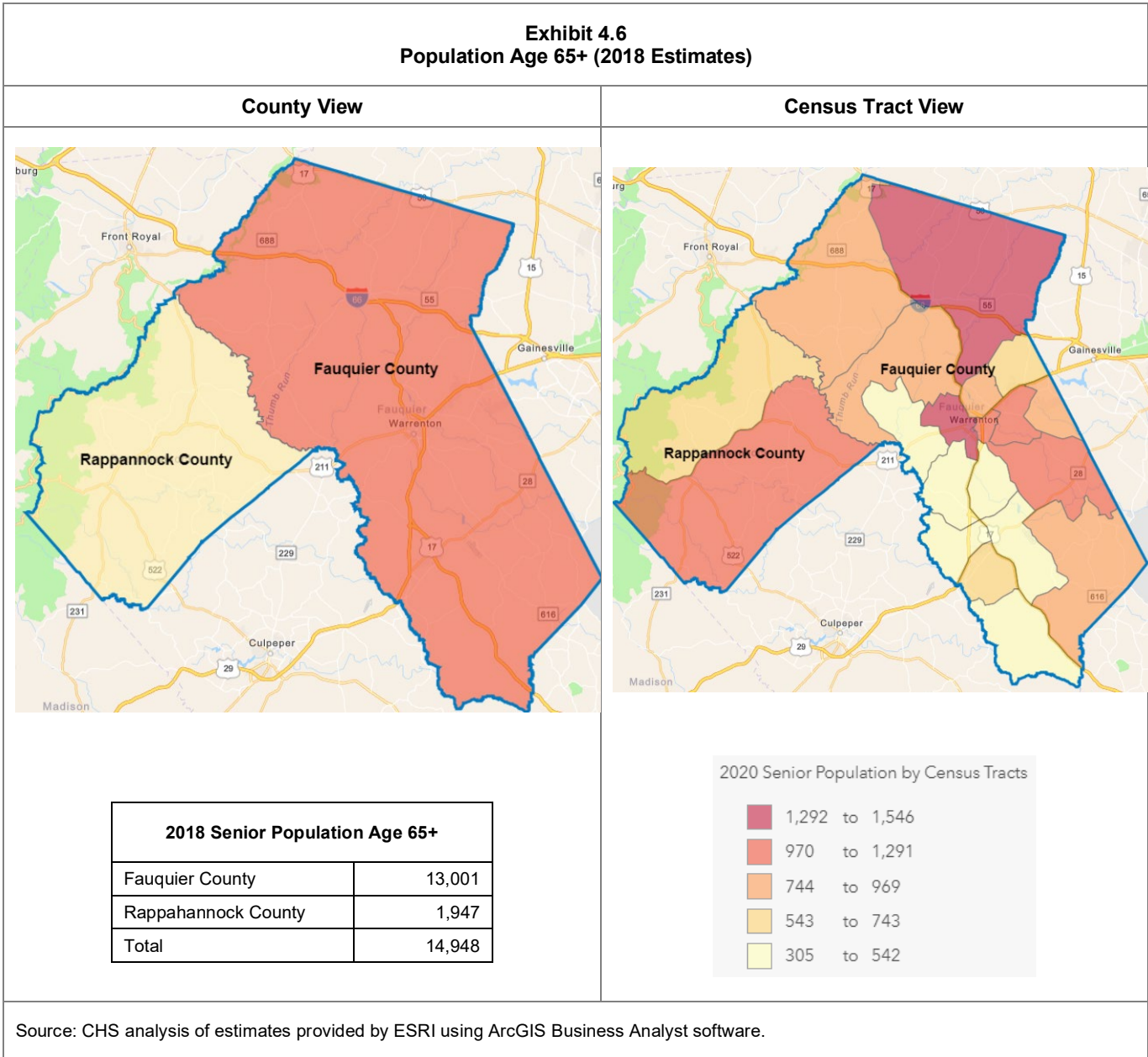

Exhibit 4.5
Households with 1+ Persons with Disability (2018 Estimates)

County View	Census Tract View

2018 Households with 1+ Persons with a Disability

Fauquier County	5,341
Rappahannock County	869
Total	6,210

2018 HHs w/1+ Persons w/Disability (ACS 5-Yr)

	474 to 580
	367 to 473
	271 to 366
	170 to 270
	100 to 169

Source: CHS analysis of estimates provided by ESRI using ArcGIS Business Analyst software.

Exhibit 4.6 shows the estimated population age 65+ as of 2020. The county view shows there are an estimated 14,948 residents age 65+ in the study region as a whole, along with county-level figures. The census tract view shows where the population age 65+ resides within counties and across the region.

Exhibit 4.6
Population Age 65+ (2018 Estimates)

County View	Census Tract View

2018 Senior Population Age 65+

Fauquier County	13,001
Rappahannock County	1,947
Total	14,948

2020 Senior Population by Census Tracts

	1,292	to 1,546
	970	to 1,291
	744	to 969
	543	to 743
	305	to 542

Source: CHS analysis of estimates provided by ESRI using ArcGIS Business Analyst software.

Appendix A: Data Sources

Profile	Source
Section 1. Insights from Community Residents	Community Health Solutions analysis of Community Insight survey responses submitted by community residents conducted in June-July 2020.
Section 2. Insights from Community Professionals	Community Health Solutions analysis of Community Insight survey responses submitted by community professionals conducted in June-July 2020.
Section 3. Community Indicator Profiles	
A. Community Demographics	Community Health Solutions analysis of demographic estimates from ESRI. (2020).
B. Social Determinants of Health	Community Health Solutions analysis of data from ESRI (2018 and 2020), The U.S. Department of Housing and Urban Development (2012-2016), and Feeding America (2017).
C. Health Risk Behaviors for Adults	Estimates of chronic disease and risk behaviors for adults 18+ were produced by Community Health Solutions using: ☐ Data from the Virginia Behavioral Risk Factor Surveillance System (2017 and 2018 ☐ Local demographic estimates from ESRI (2020). Estimates are used when there are no primary sources of data available at the local level. The estimates are for planning purposes only and are not guaranteed for accuracy. The statistical model to produce the local estimates was developed by Community Health Solutions. Local health district rates were used to render estimates at the locality level. Therefore, direct comparisons of local estimates with state estimates are not recommended. Because of data limitations, it is not possible to assign specific margins of error or levels of significance to these statistical estimates.
D. Health Risk Behaviors for Youth	Estimates of chronic disease and risk behaviors for high school youth age 14-19 were produced by Community Health Solutions using: ☐ Data from the Virginia Youth Risk Behavioral Surveillance System from the Centers for Disease Control (2019). https://www.vdh.virginia.gov/content/uploads/sites/69/2020/06/2019VAH-Summary-Tables.pdf ☐ Local demographic estimates from ESRI (2020). Estimates are used when there are no primary sources of data available at the local level. The estimates are for planning purposes only and are not guaranteed for accuracy. The statistical model to produce the local estimates was developed by Community Health Solutions. Local health district rates were used to render estimates at the locality level. Therefore, direct comparisons of local estimates with state estimates are not recommended. Because of data limitations, it is not possible to assign specific margins of error or levels of significance to these statistical estimates.

Profile	Source
E. Access to Health Care-Uninsured Population	Community Health Solutions analysis of demographic estimates from US Census Bureau, Small Area Health Insurance Estimates (2018). Differences between local rates and state rates may reflect estimation error rather than valid differences. Therefore, direct comparisons of local estimates with state estimates are not recommended. These data may reflect conservative estimates of health coverage for 2018. Readers are encouraged to review current data on Medicaid Expansion enrollment that which updated on a regular basis. Click here view the Department of Medical Assistance Services Medicaid Expansion Access Dashboard.
E. Access to Health Care-Medically Underserved Areas/Populations	Community Health Solutions analysis of U.S. Health Resources and Services Administration data. For more information, visit: http://muafind.hrsa.gov/
F. Leading Causes of Death	Data were obtained from the Virginia Department of Health (2018)
G. Maternal and Infant Health	Data were obtained from the Virginia Department of Health (2018)
H. Cancer Incidence	Data were obtained from the Virginia Department of Health-Cancer Registry (2013-2017)
I. Communicable Disease Incidence	Data were obtained from the Virginia Department of Health (2018) https://www.vdh.virginia.gov/data/communicable-diseases/
J. Injury and Violence-Deaths	Data were obtained from the Virginia Department of Health Data Portal (2016) and Virginia Department of Health NCHS Bridged-Race population estimates. https://www.vdh.virginia.gov/data/injury-violence/ https://apps.vdh.virginia.gov/HealthStats/stats.htm
J. Injury and Violence-Hospitalization	Community Health Solutions analysis of hospital discharge data from the Virginia Health Information (VHI) 2018 datasets and demographic estimates from Virginia Department of Health (2018). Data include discharges for Virginia residents from Virginia hospitals reporting to Virginia Health Information, Inc.) The analysis includes records of discharges of Virginia residents from Virginia hospitals excluding state and federal facilities. Data reported are based on the patient's primary diagnosis. Injury and Violence definitions were developed using coding methodology from the Healthcare Cost and Utilization Project (HCUP) Clinical Classifications Software Refined (CCSR) for International Classification of Diseases, Tenth Revision, Clinical Modification (ICD-10-CM)-coded diagnoses https://www.hcup-us.ahrq.gov/toolssoftware/ccsr/DXCCSR-User-Guide.pdf NOTE: Virginia Health Information (VHI) requires the following statement to be included in all reports utilizing its data: VHI has provided non-confidential patient level information used in this report which was compiled in accordance with Virginia law. VHI has no authority to independently verify this data. By accepting this report the requester agrees to assume all risks that may be associated with or arise from the use of inaccurately submitted data. VHI edits data received and is responsible for the accuracy of assembling this information, but does not represent that the subsequent use of this data was appropriate or endorse or support any conclusions or inferences that may be drawn from the use of this data.

Profile	Source
K. Potentially Avoidable Hospitalization	Community Health Solutions analysis of hospital discharge data from the Virginia Health Information (VHI) 2018 datasets and demographic estimates from Virginia Department of Health (2018). Data include discharges for Virginia residents from Virginia hospitals reporting to Virginia Health Information, Inc.) The analysis includes records of discharges of Virginia residents from Virginia hospitals excluding state and federal facilities. Data reported are based on the patient's primary diagnosis. Potentially Avoidable Hospitalizations-The PQI definitions are detailed in their specification of ICD-9 diagnosis codes and procedure codes. Not every hospital admission for congestive heart failure, bacterial pneumonia, etc. is included in the PQI definition; only those meeting the detailed specifications. Low birth weight is one of the PQI indicators, but for the purpose of this report, low birth weight is included in the Maternal and Infant Health Profile. Also, there are four diabetes related PQI indicators which have been combined into one for the report. For more information, visit the AHRQ website at http://www.qualityindicators.ahrq.gov/modules/pqi_overview.aspx NOTE: Virginia Health Information (VHI) requires the following statement to be included in all reports utilizing its data: VHI has provided non-confidential patient level information used in this report which was compiled in accordance with Virginia law. VHI has no authority to independently verify this data. By accepting this report the requester agrees to assume all risks that may be associated with or arise from the use of inaccurately submitted data. VHI edits data received and is responsible for the accuracy of assembling this information, but does not represent that the subsequent use of this data was appropriate or endorse or support any conclusions or inferences that may be drawn from the use of this data.
L. Mental Health and Substance Use: Hospitalizations	Community Health Solutions analysis of hospital discharge data from the Virginia Health Information (VHI) 2018 datasets and demographic estimates from Virginia Department of Health (2018). Data include discharges for Virginia residents from Virginia hospitals reporting to Virginia Health Information, Inc.) The analysis includes records of discharges of Virginia residents from Virginia hospitals excluding state and federal facilities. Data reported are based on the patient's primary diagnosis. NOTE: Virginia Health Information (VHI) requires the following statement to be included in all reports utilizing its data: VHI has provided non-confidential patient level information used in this report which was compiled in accordance with Virginia law. VHI has no authority to independently verify this data. By accepting this report the requester agrees to assume all risks that may be associated with or arise from the use of inaccurately submitted data. VHI edits data received and is responsible for the accuracy of assembling this information, but does not represent that the subsequent use of this data was appropriate or endorse or support any conclusions or inferences that may be drawn from the use of this data.
L. Mental Health and Substance Use: Adult Incidence and Prevalence	Estimates of behavioral health and substance use for adults 18+ were produced by Community Health Solutions using: □ Data from the Virginia Behavioral Risk Factor Surveillance System (2017 and 2018) □ National Surveys on Drug Use and Health State Prevalence Estimates (2016-2017) http://www.samhsa.gov/data/NSDUH.aspx □ Local demographic estimates from ESRI (2020). Estimates are used when there are no primary sources of data available at the local level. The estimates are for planning purposes only and are not guaranteed for accuracy. The statistical model to produce the local estimates was developed by Community Health Solutions. Local health district or statewide rates were used to render estimates at the locality level. Therefore, direct comparisons of local estimates with state estimates are not recommended. Because of data limitations,

Profile	Source
	it is not possible to assign specific margins of error or levels of significance to these statistical estimates.
L. Mental Health and Substance Use: Child and Youth Incidence and Prevalence	Estimates of behavioral health and substance use for adults 18+ were produced by Community Health Solutions using: ☐ National Surveys on Drug Use and Health State Prevalence Estimates (2016-2017) http://www.samhsa.gov/data/NSDUH.aspx ☐ Statewide Virginia results from the 2016-2017 National Survey of Children's Health https://www.childhealthdata.org/browse/survey ☐ Local demographic estimates from ESRI (2020). Estimates are used when there are no primary sources of data available at the local level. The estimates are for planning purposes only and are not guaranteed for accuracy. The statistical model to produce the local estimates was developed by Community Health Solutions. Local health district and/or statewide rates were used to render estimates at the locality level. Therefore, direct comparisons of local estimates with state estimates are not recommended. Because of data limitations, it is not possible to assign specific margins of error or levels of significance to these statistical estimates.
Section 4. Social Determinants of Health	☐ Community Health Solutions analysis of Community Insight survey responses submitted by community residents conducted in June-July 2020. ☐ Community Health Solutions analysis of Community Insight survey responses submitted by community professionals conducted in June-July 2020. ☐ Community Health Solutions analysis of demographic estimates from ESRI. (2020).