



# Virginia Cooperative Extension

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## Situation Analysis Report



### Roanoke/Salem

# 2018

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## Introduction

The 2018 Roanoke/Salem Situational Analysis developed from a combination of primary and secondary data collection, with the aim of accurately and adequately conveying the current state of opportunities and challenges within the Roanoke Valley.

### Secondary Data Collection

A concentrated data collection effort began in spring 2018 with Extension faculty and staff collecting secondary data sources from a variety of ongoing and recently released surveys and reports conducted amongst Roanoke Valley residents. Utilizing secondary data provided Extension staff a wider view of the community than could have been accomplished by Extension efforts alone, as well as reduced survey fatigue among community members - a commonly cited complaint among residents in recent years. By streamlining efforts and utilizing existing resources, the voices of nearly 10,000 Roanoke residents are amplified to better inform Extension programming in the years to come.

A list of these valuable data sources, as well as the number of residents or agencies contributing (where applicable) are as follows:

- *2013 Virginia Outdoors Plan*, Roanoke Valley-Alleghany Regional Commission, 2013
- *2017 State of the City Address*, Mayor Sherman Lea, 2017
- *Community Feedback*, Melrose-Orange Target Area Stakeholders, 2017 (12 residents)
- *County Health Rankings and Roadmaps*, Robert Wood Johnson Foundation, 2018
- *Diabetes Burden in Virginia*, Virginia Department of Health, 2017-2018
- *Farmer Listening Sessions: Findings*, Local Environmental Agriculture Project, 2017
- *General Summary*, Melrose Orange Target Area Stakeholders, 2017
- *Livable Roanoke Valley Update: Our State of Health*, Healthy Roanoke Valley/United Way, 2018 (50 Organizations)
- *Northwest Roanoke Food Access Initiative*, Invest Health, 2017 (321 residents)
- *Partnership for a Livable Roanoke Valley Plan*, Roanoke Valley-Alleghany Regional Commission, 2014 (225 residents)
- *Plan Roanoke*, City of Roanoke, 2018 (Roanoke City Residents, 200 residents)
- *Regional Report Card*, Roanoke Valley-Alleghany Regional Commission, 2017 (99 agencies and programs)
- *Roanoke County Youth Risk Behavior Survey*, Roanoke County Public Schools, 2012-2016 (8,000 youth)

- *“Roanoke Local” Regional Agriculture Report*, Local Environmental Agriculture Project/Roanoke-Alleghany Regional Commission, 2016
- *Roanoke Valley Community Health Needs Assessment*, Carilion Clinic, 2015 (88 residents)
- *Roanoke Valley Community Health Needs Assessment*, Carilion Clinic, 2018 (81 stakeholders; 102 survey respondents)
- *Virginia Community Profiles*, Virginia Employment Commission, 2018

## Primary Data Collection

Primary data collection occurred in fall 2018 with guidance from the Roanoke Unit’s Extension Leadership Council (ELC). The initial ELC meeting tasked members with reviewing community surveys and reports, as well as providing an open forum for members to direct Extension staff to other community information and resources of value to the process. Subsequent ELC meetings facilitated members through a brainstorming process on pertinent issues in the Roanoke Valley. From this process of primary and secondary source data collection, a list of eleven top issues developed. Extension faculty transferred these issues into an online Qualtrics survey and redistributed the survey to ELC members, the Extension team, and other community leaders. Respondents ranked the topics in order of greatest importance. A list of six top priority issues emerged.

## Unit Profile

The Roanoke Valley in Southwest Virginia is an area adjacent to and including the Roanoke River between the Blue Ridge Mountains to the east and the Appalachian Plateau to the west. The Valley includes Roanoke County, and two independent cities, Roanoke and Salem.

## Basic Demographics

As of 2016, the total population of the Roanoke Metropolitan Statistical Area (MSA) was 312,891. The median age of residents in Roanoke City (38.1) trends slightly lower than that of Roanoke County (43.7) and Salem (41). When looking at the region as a whole, residents are fairly evenly distributed across age groups with 23% under age 19, 23.5% between 20-39, 27.3% between 40-59, and 26.2% over age 60.<sup>1</sup>

Across the Roanoke Valley, Roanoke City remains home to the most ethnically diverse population, with approximately 64% white, 28% African American, 3% Asian, 3% mixed race, and the remaining 2% representing smaller minority groups.<sup>2</sup> Roanoke County and Salem are relatively similar, with 86.5% and 85.8% Caucasian residents respectively and 6-7% African American. All regions have seen an increase in Hispanic residents from 2013-2017.

<sup>1</sup> Roanoke Regional Partnership, 2018

<sup>2</sup> Community Health Needs Assessment (2018), Carilion Clinic

## Economic Status

The Roanoke region faces several distinct challenges, particularly around economic disparities. Some of these challenges are outlined in Carilion Clinic's most recent Community Health Needs Assessment, which states, "*According to the American Community Survey (ACS), 44.9% of people in the City of Roanoke live below 200% of the Federal Poverty Level (FPL) compared to 26.5% for the State of Virginia. In some areas of the City of Roanoke, the rate of people living below 200% FPL jumps as high as 70%.<sup>3</sup>*" As of December 2018, Virginia's unemployment rate (2.6%) was below the national average (3.7%), and on par with local rates: Roanoke City (2.7%), Roanoke County (2.3%), and Salem City (2.4%).<sup>4</sup>

In recent years, major economic development focus has been on healthcare and medical research and tourism/outdoor recreational opportunities. Carilion Clinic, the region's largest employer and healthcare provider, has largely led the healthcare expansion. Higher education is also a major economic driver with the expansion of the Virginia Tech Health Sciences campus (Virginia Tech Carilion School of Medicine and Fralin Biomedical Research Institute), as well as the continued growth of Roanoke College, Hollins University, and Virginia Western Community College.

## Health

The Roanoke Valley is home to the largest number of medical resources in the region, thanks in large part to the Carilion Clinic and Lewis Gale health systems. Located in the beautiful Blue Ridge mountains, the Roanoke Valley offers residents a number of outdoor amenities such as camping, hiking trails, urban greenways and blueways, and cycling of all types. Roanoke City, Roanoke County, and Salem City have robust Parks and Recreation resources with numerous centers used for fitness and recreational programming.

Despite these resources, many citizens face significant challenges related to achieving and maintaining good health. In the 2018 County Health Rankings, published by the Robert Wood Johnson Foundation, Roanoke County was ranked 31 for positive health outcomes out of combined 133 counties and independent cities in Virginia, with health outcomes being how long and how well citizens live in that area. Salem ranked at 50, while Roanoke City lagging significantly at 104 of 133. Behaviors included in the analysis include tobacco/drug use, diet and exercise, access to and quality of healthcare, and socioeconomic factors like education, employment, social support, and community safety.<sup>5</sup>

Drug use is also of great concern, with an average of 260.9 overdoses in Roanoke City (per 100,000 people.) Virginia declared opioid addiction a public health emergency in 2018, though

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<sup>3</sup> Community Health Needs Assessment (2018), Carilion Clinic

<sup>4</sup> Virginia Employment Commission (2018)

<sup>5</sup> County Health Rankings 2018, Robert Wood Johnson Foundation (2018)

the problem has been building for many years.<sup>6</sup> As a result, numerous local agencies, organizations, medical providers, and concerned citizens are working to address the situation.

## Education

Educational attainment across public schools (K-12) has been steadily increasing across the region, with more students graduating high school on time than ever before. The most dramatic rise is in Roanoke City, where just 59% of students graduated on time in 2008. By the end of 2018, that number increased to 90%. Roanoke County and Salem graduation rates have remained relatively stable in recent years, aligning with national trends between 91-94%.<sup>7</sup> Similar disparities exist for post-high school education among municipalities for those who have a Bachelor's degree or higher: Salem (28%), Roanoke County (35%), and Roanoke City (23%). Across the nation and across Virginia, the number of students being homeschooled has also increased, creating opportunities for an array of learning environments and structures.

## Community and Resident Perspectives

The following section outlines information gathered from citizens in the Roanoke Valley through a variety of community-based focus groups, surveys, and reports. Reports and surveys used in this analysis represent over 10,000 Roanoke Valley residents, agencies, organizations, and others.

## Health and Wellness

A common theme across Roanoke Valley residents as it relates to health is a concern for the often vast disparities that can be seen in health outcomes across the community. This concern is reflected in a significant and consistent focus on food access, transportation, healthcare access, and mental health services. Additionally, residents increasingly understand “health” as a broadening term, encompassing physical, mental, and social elements.

According to Carilion Clinic's 2018 Community Health Needs Assessment (CNHA), the top ten health concerns identified by citizens of the Roanoke Valley were poverty, transportation, access to mental and behavioral health services, lack of healthy behaviors as a priority, high number of uninsured or underinsured individuals, affordable and safe housing, access to dental care, poor diet, high cost of medical care, and educational attainment (Appendix A). Residents were asked, “What things do you need to have to have good health?” Subcategories that emerged included (but were not limited to) “social interaction, healthy food/diet, personal prioritization of health, exercise, clean air and water, and life skills.”<sup>8</sup>

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<sup>6</sup> Community Health Needs Assessment (2018), Carilion Clinic

<sup>7</sup> *Roanoke again sets record for on-time graduation*, Roanoke Times, October 2018

<sup>8</sup> Community Health Needs Assessment (2018), Carilion Clinic

## Positive Youth Development

Across the Roanoke Valley, youth and what lies ahead are a central talking point for community conversations about the region's future. As mentioned above, the Carilion Clinic Community Health Needs assessment cited residents' belief that "life skills" contribute to good health. The 2016 Youth Risk Behavior Survey (YRBS) offers insight into many challenges facing youth. While the survey is a reflection of answers youth gave about their recent behaviors, the results mirror concerns among parents, teachers, and community leaders.

The Prevention Council of the Roanoke Valley reports that 2016 saw marginal increases in self-reported symptoms of depression for middle and high school students, reflecting a national trend. Marijuana use in the past thirty days increased for middle school students but decreased for high school students. Nearly 10% of middle and high school students reported abusing prescription drugs in the past thirty days. Bullying, both in person and via technologies, was identified as an issues to watch, with 29% of student reporting that they'd received threatening messages and 35% reporting they sent threatening messages. Among high school students, 33% reported feeling sad and hopeless and 19% reportedly seriously considering suicide.

## Agriculture & Natural Resources

Food is directly tied to agriculture and the desire for healthy and affordable fresh foods is a recurring theme across many citizen-informed reports, surveys, and focus groups. During the December 2017 Melrose Orange Target Area stakeholders meeting, a grocery store and greater food access was listed as the second highest priority item for the neighborhood. A desire for more community gardens was ranked tenth, out of 22 possible choices.<sup>9</sup>

In 2017, Local Environmental Agriculture Project in collaboration with VCE hosted a series of Farmer Listening Sessions. Through these sessions, major concerns and priorities of our Roanoke Valley farmers were voiced. The top issues for the Roanoke-area producers were accessibility to markets, farm profitability, farm scale and production increases, and consumer education and awareness.<sup>10</sup> Through these sessions, a Consumer Education Action Team and a Food Hub Action Team were formed to address these concerns.

## Priority Issues

Six priority issues developed in the course of the Roanoke unit's primary data collection and analysis. Of surveyed respondents, poor health behaviors and lack of life skills were identified as the top two issues (27%). Mental health was the third highest ranked issue (18%), followed by food access, poverty, and diversity and inclusion equally weighted (9%). This section outlines those issues and the Roanoke unit's role in responding to these issues through educational programming and community involvement.

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<sup>9</sup> *General Summary*, Melrose Orange Target Area Stakeholders Meeting, 2017

<sup>10</sup> Farmer Listening Sessions: Findings (2017), Local Environmental Agriculture Project

## Poor Health Behaviors

The Robert Wood Johnson Foundation described health behaviors as “behaviors that protect us from or put us at risk for disease.”<sup>11</sup> As previously outlined, numerous surveys of residents in the Roanoke Valley support the belief that poor health behaviors are a key priority issue for Roanoke Valley residents. Health behaviors commonly cited as the most pressing issues include poor dietary choices (often due to some combination of a lack of education, limited access, or affordability), lack of physical activity, poor chronic disease management, smoking/tobacco use, and drug and alcohol use.

Virginia Cooperative Extension has long provided programming to address many of the ongoing health behaviors with which residents struggle. For those community members with the most limited resources, the Family Nutrition Program offers educational series for adults and youth. Adult programming includes Eat Smart, Be Active; Healthy Eating and Staying Active as We Age (45+); and Eating Healthy Through Pregnancy. Youth programming includes Organwise Guys, Choose Health, and Teen Cuisine. Any adults who qualify for a federal program such as SNAP/food stamps, WIC, or Medicaid are eligible to participate in these programs at no cost. Youth qualify for FNP programming if their school has a high rate of students receiving free & reduced lunch or if they are enrolled in a program (such as after school or summer camp) that serves a low-income or high risk population.

The broader field of Family & Consumer Sciences touches on a variety of additional health and wellness related topics, including building basic and immediate skills around food preparation, food safety for both home consumers and the food service industry, chronic disease prevention and management, and increasing opportunities for and knowledge of ways to be more physically active. Some of these programs include ServSafe Manager and Food Handler trainings, Diabetes Prevention Program (DPP), Balanced Living with Diabetes, Cook Smart Eat Smart, and Lifelong Improvements through Fitness Together (LIFT).

Youth are also encouraged to make healthy choices through a variety of 4-H programming. Summer camping programs encourage youth to try new healthy activities such as canoeing, climbing, swimming and horseback riding. Club meetings have also adopted the “healthy snack” options, after a statewide initiative was launched in 2017. The Roanoke office currently offers 4-H Yoga for Kids, which promotes physical activity, mindful practices, and stress reduction.

While many Agriculture and Natural Resources programs will be outlined in sections below, activities such as growing healthful foods and being physically active through gardening and other outdoor activities also contribute to healthier behaviors for the community at large.

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<sup>11</sup> What shapes health-related behaviors? (2011) Robert Wood Johnson Foundation



## **Lack of Life Skills**

Life skills are the ability for adaptive and positive behavior that enable us to deal effectively with the demands and challenges of everyday life. They are a set of human skills acquired through teaching or direct experience that are used to handle problems and questions commonly encountered in daily human life. The lack of life skills necessary for youth and adults to be successful in their lives and careers was identified as one of the top two issues faced by Roanoke Valley residents.

The 4-H Program targets life skill development in order to support youth in becoming productive, contributing individuals in society. In the Roanoke Valley, all three school systems, Roanoke City, Roanoke County and Salem have integrated 4-H School Enrichment programs to supplement their curriculum, all which focus on technical and subject matter concepts as well as life skill development. These skills include teamwork, leadership, communication, cooperation, decision making, handling criticism, flexibility, initiative and social skills. In-School and after-school programs that focus on these skills include embryology, character education, tree seedling projects, leadership development, public speaking and interview skills.

In the traditional 4-H club setting, 4-H effectively develops life skills such as decision-making, responsibility, interpersonal skills, a service ethic and social skills. Clubs and project book completion emphasizes the development of practical technical skills. Members and volunteer leaders often cite the hands-on learning opportunities available through the club experience. Community, afterschool and project clubs are offered to youth in the Roanoke Valley, all which focus on life skill development.

Camping programs create an environment of cooperation and team building. Youth are exposed to many traditional skills such as basic auto mechanics, sewing, and problem solving activities associated with the challenge course program.

As a partner with the 21st Century Learning Grant, VCE-Roanoke has played a key role in bringing life skill programming to youth in the afterschool program in Roanoke City. The program at William Fleming High School, "Next: Life after graduation," focuses on financial literacy, leadership development and soft-skill development. Plans for these programs will continue through the fall of 2019.

Family Nutrition Program Assistants work with Virginians to teach essential life skills like cooking, managing a food budget, using SNAP/EBT, being physically active, handling food safely, and planning meals. Family and Consumer Sciences expands on the work of FNP for all members of the community, from young children to seniors, with education on cooking skills, financial management, and stress reduction. ANR and Master Gardeners teach horticulture and gardening skills to youth and adults alike, from beginning to advanced courses.

## Mental Health

According to the World Health Organization, mental health includes "subjective well-being, perceived self-efficacy, autonomy, competence, intergenerational dependence, and self-actualization of one's intellectual and emotional potential, among others. The WHO further states that the well-being of an individual is encompassed in the realization of their abilities, coping with normal stresses of life, productive work and contribution to their community. Cultural differences, subjective assessments, and competing professional theories all affect how one defines "mental health."<sup>12</sup>

Mental illness costs America 193.2 billion in lost earnings per year. Mood disorders, including major depression, dysthymic disorder are the 3<sup>rd</sup> most common cause of hospitalization in the US for both youth and adults ages 18-44. Depression ranks among the most costly health concerns in the US, according to American Psychological Association.<sup>13</sup>

Mental Health America of Roanoke Valley reported in 2018 that 1 in 5 adults has an undiagnosed mental health problem. In addition, 56% of adults with mental health care needs will never receive treatment.<sup>14</sup> In Roanoke, access to mental health treatment continues to be a major healthcare issue. In Carilion Clinic's 2015 Community Health Needs Assessment, it identified access to mental health and substance use as its number two priority.<sup>15</sup>

In Roanoke County Schools Youth Risk Behavior Survey, a 5 year comparison was completed from 2012-2016. Mental health was identified as an issue with 29.9 % of students surveyed. Survey responses identified feelings of "hopelessness, thoughts of suicide and self-harm.

Programs that address positive life styles, education, stability and life skills all are solution focus, aimed to impart independence and positive mental health.

Roanoke Valley 4-H Youth programs offer opportunities for youth to participate in positive activities that foster a sense of belonging, self-worth and personal achievement. Through club participation, workshops, competitive learning events (hippology, public speaking, presentation, performing arts and horse shows), after-school programs and residential camps youth are exposed to multiple new experiences led by caring adult and teen volunteers. When surveyed, Roanoke youth expressed that after their 4-H participation they were excited that they "tried new things" and "met new friends that made them feel accepted."

## Food Access

USDA defines "food insecurity" as a lack of consistent access to enough food for an active, healthy life.<sup>16</sup> Many factors influence access to food, including affordability, proximity, and

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<sup>12</sup> *A study of mental health and psychological wellbeing among teachers and lecturers.* IJIP, 2016

<sup>13</sup> *Facts about mental illness in the United States,* Origins Behavioral Healthcare, 2017

<sup>14</sup> Mental Health America of Roanoke Valley, 2018

<sup>15</sup> *Community Health Needs Assessment,* Carilion Clinic, 2018

<sup>16</sup> Food Security in the U.S. Overview, USDA ERS

education. According to Feeding America Southwest Virginia reports, Roanoke City has shown an increase in food insecurity for the total population and Salem City has shown a rise in food insecurity among children under 18.<sup>17</sup> When asked regarding issues that affect health in the community, 29.6% of respondents to the Carilion Community Health Needs Assessment said “access to healthy foods” was an important issue.

Access to an adequate grocery store is a recurring theme in surveys and focus groups conducted among the Melrose-Orange Target Area (MOTA) community group. Among MOTA survey respondents, 34% of reported using food assistance vouchers (SNAP, WIC, or both), the rate of use is highest among the youngest age groups (< 34 years of age). Most respondents (67%) indicated that they shop for food every other week or once a week, and 33% reported getting to their primary food retailer by way of bus, family/friend, taxi, or foot.<sup>18</sup>

Current programs around Roanoke are working to address these issues, yet there is still unmet need for access to healthy food for residents of the Roanoke Valley, especially in Roanoke City’s Northwest and Southeast neighborhoods. Current programs include Healthy Community Action Teams in Salem and Roanoke City, school-led initiatives such as Andrew Lewis Middle School’s student-run food pantry, and community gardens run by community groups, churches, and nonprofits. VCE continues their Family Nutrition Program (FNP) programming for low-income adults and youth, has a cooking program for Head Start families, and more. Community partners have teamed with local health care providers to establish the Fresh Foods Prescription Program, through which Type-2 diabetes patients redeem a written prescription for fresh foods and vegetables at local farmers markets. This model is expanding from a clinical setting to a community setting through partnership with Virginia Cooperative Extension.

FCS and SNP holds cooking demonstrations at farmers markets and mobile farmers market stops to show consumers good ways to use fresh produce at home. Through Virginia Fresh Match, people who receive SNAP benefits can double their dollars spent at participating farmers markets or the mobile farmers market. Carilion has started an urban farm in Roanoke’s Southeast neighborhood to help increase access and education of residents. VCE works closely with community partners focused on food access and food systems, including Local Environmental Agriculture Project (LEAP), the Roanoke Community Garden Association, Apple Ridge Farms, Carilion, United Way, and the Virginia Farmers Market Association. The Master Gardener program also provides significant contributions of time, energy, and expertise to food access projects.

Multiple organizations in Roanoke are working collaboratively to help address issues of healthy food access within the City. The Star City Food Systems Coalition, spearheaded by Apple Ridge Farms, is a collaborative effort of multiple community agencies and organizations that has a mission to “To improve food access and create healthy, equitable, sustainable, and community-driven local food systems in Roanoke.” There are also urban agriculture projects

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<sup>17</sup> Food Insecurity Rates compared to Population (2016), Feeding America Southwest Virginia

<sup>18</sup> *Invest Health: Strategies for Healthier Cities*, Northwest Roanoke Food Access Initiative, 2017

starting up within city limits that should help increase access to fresh, healthy foods for residents of Roanoke City in coming years. LEAP is expanding farmers market incentives to community members with WIC benefits and Medicaid, in addition to the doubling of SNAP dollars spent at market. VCE continues to partner with organizations throughout the community to hold educational programs around growing and cooking fresh, healthy foods. These coordinated efforts are actively working to diminish the barriers to accessing healthy, affordable, and fresh foods for residents of the Roanoke Valley.

## Poverty

Currently in the United States, a person's zip code can be an accurate predictor of life expectancy. Social determinants of health, including poverty, race/ethnicity, education, and employment status, have a great deal of influence of quality and length of life.<sup>19</sup> Those who fall below the Federal government's poverty threshold, approximately \$25,000 for a family of four in 2018,<sup>20</sup> are considered to live in poverty. Roanoke City's percentage of people in poverty is 21.6%, standing in great contrast to Virginia's state poverty rate of 10.6%, Salem City's rate of 8.9%, and Roanoke County's rate of 7.3%.<sup>21</sup> In the 2018 Community Health Needs Assessment, poverty was among the top three responses for both needs and barriers to health for members of our community.<sup>22</sup>

Currently, there are programs addressing poverty in the Roanoke area, however there is room to grow programming and for community partners to collaborate to help expand programming and increase our reach. Examples of such programs include FNP's adult programming, providing information on grocery budgeting and money saving strategies. Family and Consumer Sciences offers ServSafe and Customer Service training to help build residents' marketable skills for better employment. 4-H Youth Development offers resume and career skills building opportunities to empower youth to graduate high school with a plan for their next steps in life, whether that be pursuing a college degree or entering the workforce. The Roanoke unit's work with Roanoke City Public Schools, the Rescue Mission, Total Action for Progress (TAP), and the United Way provides greater opportunity for VCE's educational resources to reach residents who often need it most.

The VCE Roanoke office offers Poverty Simulation training for community organizations, with the goal of helping citizens better understand the realities of living in poverty and the issues that so many residents in our community face every day. In addition to the Family Nutrition Program, the Roanoke/Salem unit is home to a SNAP-Ed Extension Agent who works on policy and systems issues that affect those living in poverty, trains the trainers for various

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<sup>19</sup> Could Where You Live Influence How Long You Live? Robert Wood Johnson Foundation

<sup>20</sup> Poverty Thresholds by Family Size and Number of Children (2018), US Census Bureau

<sup>21</sup> American Community Survey, 5-Year Estimates, U. S. Census Bureau

<sup>22</sup> Community Health Needs Assessment (2018), Carilion Clinic

curriculum tailored to low-income audiences, and who helps increase the healthy food options in local corner stores.

In 2018, Roanoke began the Master Financial Educator volunteer program. Through partnership with other financial wellness-focused organizations, agencies, and financial institutions, VCE is working to increase understanding of personal finance such as setting long term goals and money strategies. Financial education also reaches youth through the 4-H Reality Store simulation, which walks youth through the realities of the costs they can expect in adulthood, providing a platform to discuss the value of education, job training, costs associated with children, and much more.

## Diversity & Inclusion

As stated by the Director of Virginia Cooperative Extension, *“VCE values human diversity because it strengthens our system, our programs and our lives. In fact, it is our recognition of the power of diversity that drives us to reach out to diverse audiences across the state. Diversity is sought in the people that help us determine local and state needs; diversity is sought in the audiences to whom we deliver our programs; diversity is sought in our employees and our volunteers. So as our state becomes increasingly more diverse, we have a unique opportunity to shape a world where respect for diversity is commonplace.”* The Roanoke Valley is a uniquely diverse community in the southwest district of the state. Virginia Cooperative Extension’s programming must be a reflection of the communities we serve. In Roanoke’s case, this directive gives ample opportunity for even richer, creative programs that engage new and diverse partners across all topic areas.

In the Family Nutrition Program, the Roanoke unit is currently home to one Spanish-speaking adult program assistant who offers Spanish-language programs in the community. Recipes used in Family Nutrition Program classes and workshops have roots various ethnic food traditions, allowing some flexibility to create culturally relevant experiences for participants. In the field of Family & Consumer Sciences, a number of programs focus on traditional diets, such as African American Heritage, Mediterranean Cuisine, and Latin American Heritage. These classes not only teach health and nutrition information on foods native to various geographic areas, but also include historical and cultural information about the diets’ origins. The ServSafe food safety program, which is required of local restaurants by the health department, is available in Chinese, Korean, Spanish, and Japanese. On a state level, many VCE publications and educational resources are increasingly being translated into Spanish and other languages and language translation services are available to clients as needed.

Agriculture is an important and relevant part of life and cultural identity for many individuals in the Roanoke Valley, particularly those who may have recently immigrated from more agrarian settings. Working through community partners such as the Roanoke Community Garden Association and Total Action for Progress (TAP), VCE staff, faculty, Master Gardeners and

Master Food Volunteers are able to both provide information and services to immigrants, while also learning from and about food and agriculture in other cultures.

4-H Youth programming is offered through the school systems of Roanoke City, Roanoke County and Salem, thus allowing all youth to gain access to programs and opportunities because of the promotion and support from teachers and administration. Parents become aware of programs such as 4-H camp, Share-the-Fun talent shows and summer workshops because of the partnership with our schools. The after-school programming provided through the 21st Century Learning Grant has opened new programs to youth in Roanoke City. Public Speaking programs at two middle schools and one high school in 2018 gave English Language Learners an opportunity to practice their English in a unique and supportive manner with their peers. Diversity and inclusion are essential elements of 4-H's goals related to positive youth development, workforce development and organizational sustainability.

To truly value and embrace diversity and inclusion, VCE will need to continue finding ways to ensure that education is a two-way conversation between the VCE office and the communities it serves. Diversity can mean many things and VCE's programming will need to continue to evaluate and reevaluate its relevance and inclusion of citizens from all walks of life.

## Appendices

### Appendix A: Community Health Needs Assessment (2018), Carilion Clinic - Question 5

**5. What do you think are the five most important issues that affect health in our community? (Please check five)**

	Service Area		Roanoke City	
	#	%	#	%
Alcohol and illegal drug use	927	42.2%	484	40.0%
Overweight / obesity	766	34.8%	353	29.1%
Mental health problems	688	31.3%	357	29.5%
Access to healthy foods	651	29.6%	363	30.0%
Lack of exercise	494	22.5%	218	18.0%
Cancers	476	21.6%	238	19.7%
Stress	463	21.1%	254	21.0%
Poor eating habits	459	20.9%	239	19.7%
Diabetes	447	20.3%	267	22.0%
Access to affordable housing	439	20.0%	266	22.0%
Heart disease and stroke	377	17.1%	206	17.0%
Prescription drug abuse	376	17.1%	175	14.5%
Cell phone use / texting and driving / distracted driving	340	15.5%	174	14.4%
High blood pressure	336	15.3%	214	17.7%
Aging problems	324	14.7%	145	12.0%
Child abuse / neglect	301	13.7%	165	13.6%
Tobacco use / smoking	300	13.6%	148	12.2%
Dental problems	285	13.0%	169	14.0%
Domestic violence	273	12.4%	182	15.0%
Bullying	224	10.2%	121	10.0%
Environmental health (e.g. water quality, air quality, pesticides, etc.)	217	9.9%	114	9.4%
Neighborhood safety	143	6.5%	101	8.3%
Suicide	132	6.0%	73	6.0%
Not using seat belts / child safety seats / helmets	118	5.4%	69	5.7%
Not getting "shots" to prevent disease	107	4.9%	50	4.1%
Accidents in the home (ex. falls, burns, cuts)	104	4.7%	68	5.6%
HIV / AIDS	102	4.6%	78	6.4%
Gang activity	98	4.5%	69	5.7%
Unsafe sex	77	3.5%	50	4.1%
Teenage pregnancy	70	3.2%	44	3.6%
Homicide	66	3.0%	51	4.2%
Sexual assault	61	2.8%	43	3.6%
Lung disease	43	2.0%	25	2.1%
Infant death	19	0.9%	11	0.9%
Other	136	6.2%	93	7.7%
	Answered	2,199	1,211	
	Skipped	109	52	

## Additional Citations

Adkins, A. (2018, October 1). Roanoke again sets record for on-time graduation. *Roanoke Times*. Retrieved from [https://www.roanoke.com/news/education/roanoke-again-sets-record-for-on-time-graduation/article\\_0cc7ac90-e225-51dc-aac3-dbf48de50f65.html](https://www.roanoke.com/news/education/roanoke-again-sets-record-for-on-time-graduation/article_0cc7ac90-e225-51dc-aac3-dbf48de50f65.html)

Afsana, S. A. (2016). A Study of Mental Health and Psychological Well Being among Teachers and Lecturers. *International Journal of Indian Psychology*, 3(3), 8th ser. Retrieved from <http://oaji.net/articles/2016/1170-1464771745.pdf>

Braveman, P. (2017, May 24). What Shapes Health-Related Behaviors? Retrieved from <https://www.rwjf.org/en/library/research/2011/03/what-shapes-health-related-behaviors---.html>

Food Insecurity – 2016. (n.d.). Retrieved from <https://www.faswva.org/home/about-us/how-we-work/food-insecurity-2016/>

Fuller, L. (2017, October 10). Facts about Mental Illness in the United States. Retrieved from <https://www.originsrecovery.com/facts-mental-illness-united-states/>

Overview. (n.d.). Retrieved from <https://www.ers.usda.gov/topics/food-nutrition-assistance/food-security-in-the-us/>