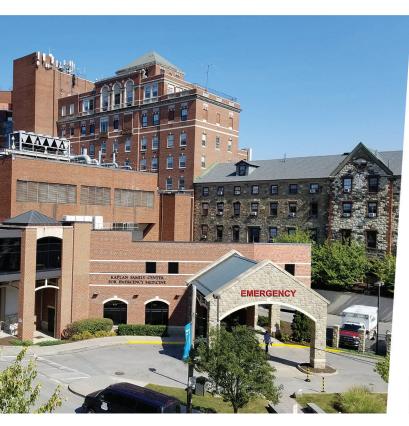
New York State Prevention Agenda Community Service Plan 2019-2021

Montefiore St. Luke's Cornwall **Office of Community Relations 70 Dubois Street** Newburgh, NY 12550

Submitted By: Kate Dabroski, Vice President, Marketing, **Public and Community Relations**

12/30/2019





Montefiore St. Luke's Cornwall

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Montefiore St. Luke's Cornwall

This document is submitted as the requirement for the 2019-2021 Community Service Plan through the New York State Department of Health and assesses the health needs for Orange County, New York, specifically for Montefiore St. Luke's Cornwall.

This report is supplemented with information provided by the Orange County Department of Health, the U.S. Census Bureau and Montefiore Health System. Data referenced throughout this report was compiled as part of the Mid-Hudson Regional Community Health Assessment, 2019-2021, which was written by HealtheConnections. The regional health assessment covers the seven counties included in the Mid-Hudson Region, which consist of Dutchess, Orange, Putnam, Rockland, Sullivan, Ulster, and Westchester Counties.

The Orange County Department of Health contact for this information is Jackie Lawler, Epidemiologist (jlawler@orangecountygov.com).

This report covers the entities of Montefiore St. Luke's Cornwall, with main campuses in Newburgh and Cornwall, along with additional outpatient sites in Fishkill, New York. The point of contact for this report Kate Dabroski, Vice President of Marketing, Public and Community Relations, at Montefiore St. Luke's Cornwall.

This report was completed in coordination with the Orange County Department of Health workplan.

Executive Summary:

This document outlines the New York State Prevention Agenda 2019-2021 Community Service Plan for Montefiore St. Luke's Cornwall (MSLC and will serve as the road map for the key focus areas in addressing the health needs of the community that MSLC is privileged to serve.

These priority areas were selected as a result of the Community Health Needs Assessment, completed in 2019. This process, which was inclusive of the Mid-Hudson Region Community Health Assessment, was part of MSLC's Primary Data Collection Collaborative that was formed in 2017 from the seven local health departments across the Mid-Hudson Region, with a goal of creating the first ever regional community health survey. These counties include Dutchess, Orange, Ulster, Putnam, Sullivan, Rockland and Westchester. There were 17 local hospitals who contributed funds for the Collaborative to contract with the Siena College Research Institute, to conduct a randomized digital dial community health survey. The survey captured a total of 5,372 responses and roughly 850 from Orange County specifically. In addition to the phone survey, several Provider Focus Groups were formed with Human Service providers throughout the region. Prior to the focus groups, a survey was sent to providers in each county in an effort to supply additional background regarding local factors that influence community health. The survey was inclusive of the populations that are served by the providers, issues that impact those communities, the barriers that exist in helping residents achieve better health and the interventions used to address the social determinants of health. A total of 285 surveys were completed by the service providers, with a total of 41 responses from Providers in Orange County.

The provider focus groups and community health survey identified that the top-rated issues affecting health in Orange County are:

- 1. Access to affordable, decent and safe housing
- 2. Access to affordable, reliable, personal and public transportation
- 3. Access to mental health providers

Additionally, the Mid-Hudson Region Community Health Survey and Provider Focus Groups revealed that the top three barriers in achieving better health in Orange County include:

- 1. Knowledge of existing resources
- Drug and/or alcohol use
- 3. Healthy literacy

In Orange County, Heart Disease and Cancer are the leading causes of death and leading causes of premature death (death before age 75) by a large margin. Obesity is a leading contributor to these top causes of death, as well as diabetes, stroke, and hypertension—all of which can lead to premature death. Over the past ten years, the rates of obesity have continually grown, as well as the subsequent morbidity of cardiovascular disease, prediabetes, and hypertension.

Sexually Transmitted Infections (STIs) are also significantly on the rise in Orange County. There has been a 75% increase in the average number of newly diagnosed HIV cases in Orange County from 17.2 per year (2011-2015) to 26.3 per year (2016-2018). Chlamydia rates among both males and females from 2014-2016 are higher in Orange County than rates in the Mid-Hudson Region, and have steadily increased or remained the same from 2011-2013 to 2014-2016. Additionally, Orange County had its first fetal demise in 2019 from congenital syphilis in over 25 years. MSLC participated in the first ever Orange County Health Summit in June 2019 (secondary data collection). This summit served as an active working session to review the data from the above-mentioned Provider focus groups, along with the Siena College Survey Data, and ultimately decide on the Priority Areas for the 2019-2021 Community Health Improvement and Community Service Plan.

The two Prevention Agenda Priorities that Orange County selected, inclusive of Montefiore St. Luke's Cornwall, are:

- Prevent Chronic Disease
- Prevent Communicable Disease

Several additional key stake holder meetings took place over the summer of 2019 to further discuss the priorities and the disparities. As a result, The Orange County Community Health Improvement Plan (CHIP was created as part of a long-term effort to address the public health problems based on the community wide health assessment. The Orange County Department of Health then created the first ever combined CHIP with Montefiore St. Luke's Cornwall, Bon Secours Community Hospital, Orange Regional Medical Center and St. Anthony Community Hospital.

To help address these two priority areas, focus groups led by the Orange County Department of Health, with input from all of the above-mentioned community hospitals in the County, will work collaboratively to address the health areas of focus. Members of the focus groups will meet quarterly to report on current updates and key data points.

For the Prevention of Chronic Disease, Montefiore St. Luke's Cornwall will focus on Preventative Care and Management as well as Healthy Eating and Food Insecurity. MSLC will focus on Preventative Care and Management with an effort to promote evidence-based care to prevent and manage chronic diseases including Cardiovascular disease, COPD, Diabetes, and prediabetes as well as asthma. The MSLC team already has many systems in place to address these areas. The MSLC Care Transitions Program uses the Coleman Model of Care, ensuring that they receive the proper follow up care when discharged from the hospital. Our team works closely to continue to manage the patients' needs in the community, ultimately preventing them from returning to the hospital for chronic illness. Currently, there are self-management courses available to patients in all of these areas. Key objectives outlined in the 2019-2021 Community Service Plan under this focus area include:

- Increase the percentage of adults with Cardiovascular Disease who have taken a course on self-management to
 learn how to learn how to manage their condition by 15% of baseline.
- Increase the percentage of adults with Chronic Obstructive Pulmonary Disease (COPD) who have taken a course
 on self-management to learn how to manage their condition by 15% of baseline.
- Increase the percentage of adults with diabetes who have taken a course on self-management to learn how to manage their condition by 15% of baseline.
- Increase the percentage of adults with pre-diabetes who have taken a course on self-management to learn how to manage their condition by 15% of baseline.
- Decrease the Emergency Department visits with a primary diagnosis of Asthma by 7%

The above objectives will be measured and tracked by the following:

- The number of patients enrolled in the MSLC CHF self-management course as compared to the 2019 baseline.
- The number of patients enrolled in the MSLC COPD self-management course as compared to the 2019 baseline.
- The number of patients enrolled in the MSLC diabetes self-management course as compared to the 2019 baseline.
- The number of patients enrolled in the MSLC pre-diabetes self-management course as compared to the 2019 baseline.
- The number of patients presenting to the Emergency Department with a primary diagnosis of Asthma.
- The number of patients provided with an Asthma Action Plan.

MSLC will partner with a variety of community resources to accomplish the goals outlined above including our own Cardiovascular Team, Emergency Department Staff, Nursing Leadership, the MSLC Care Transitions Team, The Montefiore Hudson Valley Collaborative, Hospital and Community Based Pharmacists, Registration Staff, The American Lung Association and the Orange County Department of Health.

Additionally, MSLC will focus on increasing cancer screening rates. MSLC will work collaboratively with the Orange County Health Department and several other community partners to increase cancer screening rates for breast, cervical and colorectal cancers, especially among disparate populations in the cities of Newburgh, Middletown and Port Jervis. The objective identified below and our ongoing workplan will be a collective effort among all involved. While many of the initiatives will not be solely occurring within Montefiore St. Luke's Cornwall campuses, we have an active seat at the table and will be contributing heavily. The collaborative objective outlined in the 2019-2021 Community Service Plan under this focus area includes: By December 31, 2021, increase the percentage of adults receiving breast cancer, cervical, and colorectal cancer screenings based on the most recent screening guidelines for Breast Cancer Screening by 5% from 74.5% to 78.2%; for Cervical Cancer Screening by 5% from 85.7% to 90% and for Colorectal Cancer Screening by 5% from 71% to 74.6%. (Data source: NYS Behavioral Risk Factor Surveillance Survey, 2016). The key interventions for this objective include:

- Use small media and health communications to build public awareness and demand through the following:
- Developing one consistent branded message across all entities to increase cancer screening awareness months
 for breast, cervical and colorectal cancers (October, January and March respectively);
- Work collaboratively to create poster designs for public health awareness campaign and messaging for breast,
 cervical and colorectal cancers;
- Evaluate how patients have learned about cancer screenings in 2019 through surveys (i.e. newspaper, mailings, flyers, word of mouth, social media, healthcare provider, other)

The above objectives will be measured and tracked by the following:

- The number and type of locations where posters were distributed
- The number of calls received about screening due to campaign
- The number of designs submitted for consideration for breast, cervical and colorectal cancer posters
- The number of completed surveys
- The percentages of how patients found cancer screenings by type

All progress will be reported on a quarterly basis to the Orange County Department of Health and annually to the New York State Department of Health.

MSLC will also work to address Healthy Eating and Food Insecurity. With a population of 31% below the poverty line, many MSLC patients are homeless with limited access to available resources to help lead a healthy lifestyle, and basic access to food sources is a significant challenge. In 2018, MSLC developed its own food pantry to help address this. MSLC aims to increase screening methods to include a drop down in the Meditech System (the current patient electronic health records program) to prompt providers to pose the question of food insecurity to patients. This data entry will then trigger referral to the MSLC Food Pantry, among other community resources. As a result, MSLC will collectively increase our outreach efforts to gather resources for our food pantry, which is currently happening twice per year. Throughout the course of the 2019-2021 Community Service Plan, MSLC will increase the number of food drives taking place to help increase donations. These donations come from hospital staff and community members. Providers will also be equipped with additional community resources to refer patients to. The objectives outlined under this focus area include:

- Improve screening methods to identify patients with food insecurity.
- To increase the number of patients identified with food insecurity and refer such patients to the MSLC Food Pantry and other community resources. This will be tracked by the number of patients screened and referred to the MSLC Food Pantry
- Increase the amount of MSLC food drives annually. This will be tracked by the volume of food drives that occur
 and are documented each year.

MSLC will partner with other community-based organizations in the City of Newburgh, Town of Newburgh, Cornwall, and New Windsor to increase the volume of donations and available resources. We will work with the Orange County Health Department to adopt policies and procedures to support active connection to SNAP and WIC agencies. These partners will include hospital employees, local businesses, patients and visitors of MSLC, the Orange County Health Department, and several of the local health department sub groups such as Healthy Orange. As a member of the Montefiore Health System, MSLC will also be working collaboratively with our collective partners within Montefiore Medicine to achieve all of the above.

For the Priority Area of Prevent Communicable Disease, Montefiore St. Luke's Cornwall will be working with community partners to reduce the annual rate of growth for Sexually Transmitted Infections. There has been a significant increase in STIs in Orange county and MSLC has seen this increase first hand in both the presentations to the Emergency Department as well as the Labor and Delivery Unit. The objectives under this focus area include:

- Collaborate with Local Health Department and other Community Partners in an effort to identify and decrease transmission of STIs.
- Educate provider staff with emphasis in ED and L&D, regarding appropriate screening and treatment of high-risk population. This Will be tracked by the number of provider sessions that occur at the hospital in partnership with the Orange County Health Department.
- With a main goal of Expand STI Testing to include HIV and RPR screening to ensure patients are not only tested, but also treated appropriately for chlamydia, gonorrhea, syphilis and HIV. This will be tracked by the following:
- Number of patients tested for chlamydia, gonorrhea, HIV and syphilis.
- Number of patients positive for chlamydia, gonorrhea, HIV and/or syphilis
- Number of patients appropriately treated for chlamydia, gonorrhea, HIV and/or syphilis

MSLC will partner with the Orange County Department of Health, Bon Secours Community Hospital, Cornerstone Family Healthcare, Orange Regional Medical Center, and our own Emergency Department Practitioners along with Labor and Delivery Staff at large along with other clinical disciplines as necessary to achieve these goals. The other hospitals mentioned above are also reporting similar data to the Orange County Department of Health through the quarterly focus groups to collectively work with MSLC to lower the rates of STIs in Orange County.

It's important to note that as a member of the Montefiore Health System, MSLC will also be working collaboratively with our collective partners within Montefiore Medicine to achieve all of the above.

Thank you for your consideration of the 2019-2021 Montefiore St. Luke's Cornwall Community Service Plan.

Community Health Needs Assessment:

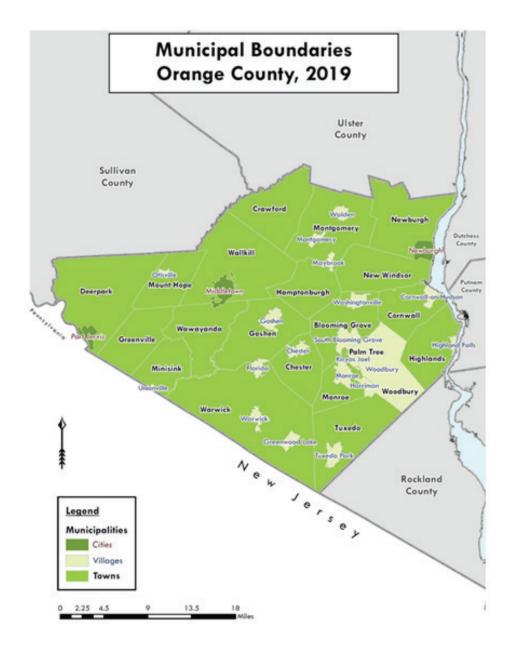
The Montefiore St. Luke's Cornwall Community Health Assessment was reviewed and approved by the MSLC Board of Trustees on Tuesday, November 26, 2019. The report will be made available to the public on December 30, 2019, and viewable on the hospital's website at www.MontefioreSLC.org/community/community-service-plan/

Organizational Background:

Montefiore St. Luke's Cornwall (MSLC) is a not-for-profit community hospital with campuses in Newburgh and Cornwall, NY, as well as several off-site facilities, that provide dedicated care to more than 250,000 patients per year.

MSLC is a 242-bed acute care hospital with a geographic coverage area that serves a population of approximately 400,000 people. As a safety net provider, MSLC serves a population that has been designated as a medically underserved area (MUA), specifically in the City of Newburgh.

MSLC's Newburgh campus is comprised of both inpatient and outpatient services including a Level III Trauma Center, Emergency Department, Intensive Care Unit, Cardiac Catheterization Laboratory, Birthing Center and Neonatal Intensive Care Unit, Physical Therapy as well as surgical services including Orthopedics, Urology and Men's Health procedures, Metabolic and Bariatric Surgery, and Oncology. The Cornwall campus has shifted to an entirely outpatient model in the last ten years, and includes the Littman Cancer Center, an Infusion Suite, Center for Pain Management, Center for Sleep Medicine, Center for Wound Care and Hyperbaric Medicine,



Laboratory, and Rehabilitative Services, inclusive of Physical, Occupational and Speech Therapies, along with Cardiac and Pulmonary Rehabilitation, and most recently a Center for Cognitive and Memory Services and a Driver Evaluation and Advisement Program.

Inpatient Discharges specific to Montefiore St. Luke's Cornwall:

The Top 20 inpatient discharges for Montefiore St. Luke's Cornwall's Newburgh campus in 2018 are shown below, with the highest percentage being Sepsis, liveborn infants according to place of birth and type of delivery, along with pneumonia, unspecified organism, and osteoarthritis of the knee. These discharges show the direct correlation between the health disparities and barriers that exist among the population that MSLC services and the types of conditions the hospital treats most frequently.

Table X. Top 20 inpatient discharges at St. Luke's Cornwall-Newburgh Hospital (name changed to Montefiore St. Luke's Cornwall in 2019), 2018

Label	Discharges	% of total
Other sepsis	905	8.3%
Liveborn infants according to place of birth and type of delivery	904	8.3%
Pneumonia, unspecified organism	370	3.4%
Osteoarthritis of knee	337	3.1%
Other chronic obstructive pulmonary disease	276	2.5%
Acute kidney failure	272	2.5%
Acute myocardial infarction	250	2.3%
Cellulitis and acute lymphangitis	208	1.9%
Type 2 diabetes mellitus	202	1.8%
Hypertensive heart disease	202	1.8%
Hypertensive heart and chronic kidney disease	162	1.5%
Osteoarthritis of hip	160	1.5%
Atrial fibrillation and flutter	152	1.4%
Cerebral infarction	151	1.4%
Fracture of femur	148	1.4%
Acute pancreatitis	134	1.2%
Other maternal diseases classifiable elsewhere but complicating pregnancy, childbirth and the puerperium	134	1.2%
Maternal care for abnormality of pelvic organs	131	1.2%
Other disorders of fluid, electrolyte and acid-base balance	124	1.1%
Other disorders of urinary system	121	1.1%
Other diagnoses	5,577	51.1%
	Other sepsis Liveborn infants according to place of birth and type of delivery Pneumonia, unspecified organism Osteoarthritis of knee Other chronic obstructive pulmonary disease Acute kidney failure Acute myocardial infarction Cellulitis and acute lymphangitis Type 2 diabetes mellitus Hypertensive heart disease Hypertensive heart and chronic kidney disease Osteoarthritis of hip Atrial fibrillation and flutter Cerebral infarction Fracture of femur Acute pancreatitis Other maternal diseases classifiable elsewhere but complicating pregnancy, childbirth and the puerperium Maternal care for abnormality of pelvic organs Other disorders of fluid, electrolyte and acid-base balance Other disorders of urinary system	Other sepsis Liveborn infants according to place of birth and type of delivery Pneumonia, unspecified organism Osteoarthritis of knee 337 Other chronic obstructive pulmonary disease Acute kidney failure Acute myocardial infarction Cellulitis and acute lymphangitis Type 2 diabetes mellitus Hypertensive heart disease Hypertensive heart and chronic kidney disease Osteoarthritis of hip Atrial fibrillation and flutter Cerebral infarction 151 Fracture of femur Acute pancreatitis Other maternal diseases classifiable elsewhere but complicating pregnancy, childbirth and the puerperium Maternal care for abnormality of pelvic organs 131 Other disorders of fluid, electrolyte and acid-base balance Other disorders of urinary system 121

Data source: Internal Montefiore Health System data, 2018

STATEMENT OF EXECUTIVE REVIEW:

Montefiore St. Luke's Cornwall has participated in an extensive Community Health Needs Assessment, which is outlined throughout this document. The CHNA includes data from the 2019 Mid-Hudson Regional Community Needs Assessment, which is inclusive of data from the Mid-Hudson Region Community Health Survey and Provider Focus Groups. The Mid-Hudson Regional Community Health Assessment 2019-2021 was written by HealtheConnections with contributions and input from many partners throughout the Mid-Hudson Region. Additionally, MSLC participated in the June 2019 Orange County Community Health Summit, and several focus groups were created as a result of the summit.

This document outlines the overview of the population MSLC serves, the primary health disparities, barriers to accessing care, and the key findings of the survey's MSLC has participated in.

The two priority areas that Montefiore St. Luke's Cornwall has identified as a result of the Community Health Needs Assessment are the following: **Prevent Chronic Disease** and **Prevent Communicable Disease**. These findings were used to help create the 2019-2021 Community Service Plan.

Date Report is Made Available to the Public:

This document will be made available to the public on December 30, 2019, via the Hospital's Website at www.MontefioreSLC.org/community/community-service-plan/

COMMUNITY HEALTH PROCESS AND METHODS:

DESCRIPTION OF THE COMMUNITY BEING ASSESSED:

The Mid-Hudson Region is comprised of seven counties including Dutchess, Orange, Putnam, Rockland, Sullivan, Ulster and Westchester. Orange County is roughly 40 miles north of New York city and resides between the Delaware River in the west and the Hudson River in the east. Orange County is bordered by both New Jersey and Pennsylvania on the southwest. Orange county is 839 square miles and is comprised of a suburban, rural, urban and farmland areas, which include three cities (Middletown, Newburgh and Port Jervis) that make up close to 18% of the population of the entire county. Specifically, Newburgh falls in Montefiore St. Luke's Cornwall's Primary Service Area and is a key focus throughout this entire document. Orange County also includes 20 towns and 19 villages, 19 school districts, and three colleges and universities—one of which resides in MSLC's Primary Service Area, in the heart of the city of Newburgh: Mount Saint Mary College.

The Mid-Hudson Regional Community Health Assessment indicates that although Orange County appears to be comprised of an affluent, suburban resident population with a median household income of close to \$13,000 more than the New York State average and a smaller percentage of individuals living below the poverty line, a smaller unemployment rate, and a higher percentage of high school graduates, the data is misleading and masks several disparities within Orange County as a whole. The urban portions of the county are burdened with several severe health inequities and socioeconomic factors, with one third of the population living below the poverty line in the county's three major cities of Newburgh, Middletown and Port Jervis. Newburgh is in MSLC's Primary Service Area.

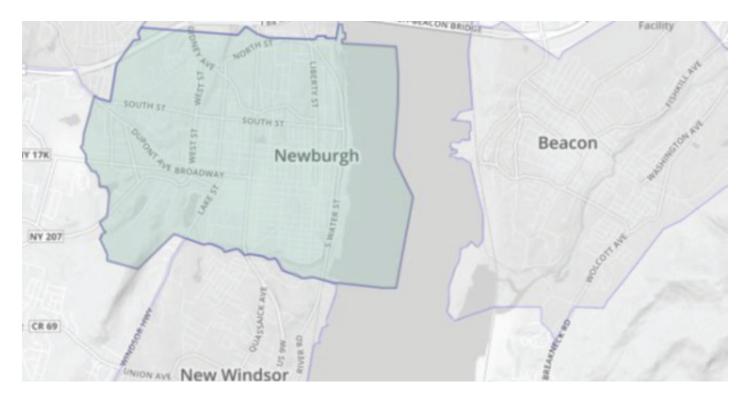
MSLC's Primary Service Area is comprised of 12 neighboring zip codes, with nine of the twelve zip codes residing in Orange County, two in Ulster County and one in Dutchess County.

MONTEFIORE ST. LUKE'S CORNWALL HOSPITAL

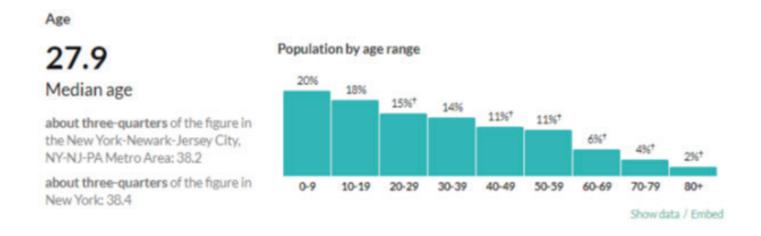
County	Zip-Code	Population	County	Zip-Code	Population
Dutchess	12508	19604	Orange	12549	11156
Orange	12518	6310	Orange	12550	54612
Orange	12520	2984	Orange	12586	12729
Orange	10928	4004	Ulster	12589	17,463
Ulster	12542	5,746	Orange	10992	9197
Orange	12553	26029	Orange	10996	6612

The City of Newburgh is the most densely populated portion of MSLC's Primary Service Area, with roughly 28,444, according to the American Community Survey 5-year estimates (2013-2017). This same survey indicates that there are 7,473.3 people per square mile in the City of Newburgh.

(Source: https://censusreporter.org/profiles/16000US3650034-newburgh-ny/)



Adults ranging from 35-64 years of age make up the majority of the population in Orange County.



The overall population of the Mid-Hudson Region was split fairly evenly between males and females according to the Mid-Hudson Regional Community Health Assessment, 2019-2021.

Population Stratified by Sex									
	N	la le	Fen	nale					
	N	%	N	%					
Dutchess	146,993	49.7	148,692	50.3					
Orange	189,437	50.1	188,737	49.9					
Putnam	49,485	49.8	49,979	50.2					
Rockland	159,227	49.0	165,800	51.0					
Sullivan	38,941	51.4	36,842	48.6					
Ulster	89,377	49.6	90,752	50.4					
Westchester	471,874	48.4	503,447	51.6					
Mid-Hudson	1,145,334	49.2	1,184,249	50.8					
NYS	9,604,111	48.5	10,194,117	51.5					
NYS excl NYC	5,524,204	49.2	5,713,952	50.8					

Source: U.S. Census Bureau, 2017 American Community Survey 5-year estimates

The majority of the population that comprises New York State as a whole, along with the Mid-Hudson Region and Orange County was Non-Hispanic White according to the 2019 Mid-Hudson Regional Community Needs Assessment.

	Non-Hispanic	Non-Hispanic White		Non-Hispanic Black		Non-Hispanic Asian		ic	Non-Hispanic Other*	
	N	%	N	%	N	%	N	%	N	%
Dutchess	213,506	72.2	28,360	9.6	10,989	3.7	34,662	11.7	8,168	2.7
Orange	247,267	65.4	36,590	9.7	9,728	2.6	74,643	19.7	9,946	2.5
Putnam	79,747	80.2	2,204	2.2	2,201	2.2	13,684	13.8	1,628	1.6
Rockland	205,500	63.2	37,408	11.5	19,570	6.0	56,251	17.3	6,298	1.9
Sullivan	54,910	72.5	5,826	7.7	1,222	1.6	11,697	15.4	2,128	2.8
Ulster	143,781	79.8	9,317	5.2	3,802	2.1	17,714	9.8	5,515	3.2
Westchester	530,156	54.4	131,769	13.5	57,004	5.8	234,081	24.0	22,311	2.2
Mid-Hudson	1,474,867	63.3	251,474	10.8	104,516	4.5	442,732	19.0	55,994	2.4
NYS	11,071,563	55.9	2,842,869	14.4	1,639,345	8.3	3,726,238	18.8	518,213	2.5
NYS excl NYC	8,324,404	74.1	956,979	8.5	450,941	4.0	1,234,942	11.0	271,090	2.4

^{*:} Non-Hispanic Other includes American Indian/Alaska Native, Native Hawaiian/Other Pacific Islander, some other race alone, and two or more races.

Source: U.S. Census Bureau, 2017 American Community Survey 5-year estimates

Furthermore, Orange County's population is 65.4% Non-Hispanic White, with the second largest group being Hispanic at 19.7%. However, in the City of Newburgh, the largest population broken down by race/ethnicity is Hispanic, at 51%.



^{*} Hispanic includes respondents of any race. Other categories are non-Hispanic.

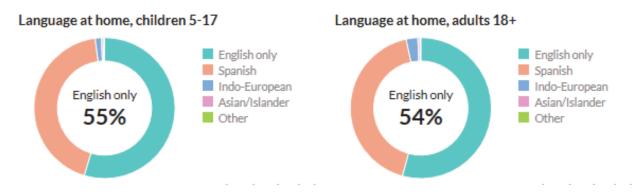
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Source: https://censusreporter.org/profiles/16000US3650034-newburgh-ny/

Population St	tratified by Spa	ken La	nguage									
	English		Language than Eng		h		Other Indo- European languages		Asian and Pacific Islander Ianguages		Other languages	
	N	%	N	%	N	%	N	%	N	%	N	%
Dutchess	237,682	84.3	44,145	15.7	23,292	8.3	11,312	4.0	6,121	2	3,420	1.2
Orange	266,172	75.3	87,175	24.7	48,089	13.6	31,129	8.8	5,032	1.4	2,925	8.0
Putnam	76,833	80.9	18,191	19.1	8,725	9.2	7,479	7.9	1,394	1.5	593	0.6
Rockland	185,140	61.6	115,169	38.4	40,495	13.5	58,243	19.4	11,489	3.8	4,942	1.6
Sullivan	61,125	85.5	10,406	14.5	6,323	8.8	3,501	4.9	450	0.6	132	0.2
Ulster	152,931	88.9	19,132	11.1	9,977	5.8	5,859	3.4	2,193	1.3	1,103	0.6
Westchester	613,330	66.7	306,398	33.3	182,282	19.8	76,129	8.3	34,056	3.7	13,931	1.5
Mid- Hudson	1,593,213	72.6	600,616	27.4	319,183	14.5	193,652	8.8	60,735	2.8	27,046	1.2
NYS	12,924,635	69.4	5,696,716	30.6	2,810,962	15.1	1,617,553	8.7	951,683	5.1	316,518	1.7
NYS excl NYC	8,840,416	83.2	1,781,221	16.8	859,539	8.1	586,208	5.5	242,818	2.3	92,656	0.9

Source: U.S. Census Bureau, 2017 American Community Survey 5-year estimates

In the City of Newburgh, more than half of the population speak only English at home. Of note, Spanish is the second most commonly spoken language at home.

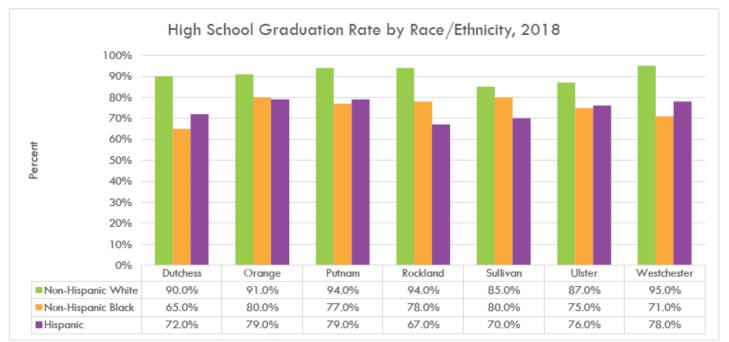


Of those ages 25 years or older, more than 240,447 residents in Orange County have attained an associate degree or higher. Across the Mid-Hudson Region, Westchester had the highest percentage (53.9%) and Sullivan County the lowest (34.7%). Only 39.7% of Orange County residents had an associate degree or higher.

Population Stratifie	d by Educational Att	ainment							
	Less than High School Graduate		High School G	raduate	Some colle no degre		Associate's degree or higher		
	N	%	N	%	N	%	N	%	
Dutchess	19,495	9.6	53,465	26.2	39,236	19.2	91,972	45.0	
Orange	24,494	10.2	71,195	29.6	49,182	20.5	95,576	39.7	
Putnam	5,076	7.2	19,539	27.8	12,032	17.1	33,726	48.0	
Rockland	26,017	12.7	45,439	22.2	33,875	16.6	99,316	48.6	
Sullivan	7,218	13.6	17,732	33.3	9,785	18.4	18,529	34.7	
Ulster	12,106	9.4	39,462	30.4	24,219	18.7	53,872	41.6	
Westchester	82,929	12.5	130,493	19.5	94,509	14.1	360,171	53.9	
Mid-Hudson	177,335	11.3	377,325	24.0	262,838	16.7	753,162	48.0	
NYS	1,895,439	13.9	3,591,287	26.3	2,169,152	15.9	6,004,931	44.0	
NYS excl NYC	767,997	10.0	2,154,037	28.0	1,339,368	17.4	3,429,459	44.6	

Source: U.S. Census Bureau, 2017 American Community Survey 5-year estimates

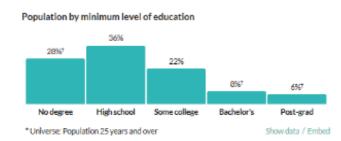
The *Mid-Hudson Region Community Health Assessment* 2019-2021 shows that across all counties in the region, White students had a higher graduation rate than Hispanic and Non-Hispanic Black students.



Source: NYS Department of Education, 2017-2018

https://data.nysed.gov/reportcard.php?instid=800000081568&year=2017&createreport=1&freelunch=1&gradrate=1

City of Newburgh educational attainment rates were far worse. Six percent of City of Newburgh residents have attained an associate degree, and roughly 36% of the population has achieved a high school or equivalent degree.



Source:https://data.census.gov/cedsci/profile?hidePreview=true&g=1600000US3650034

The 2019 Mid-Hudson Region Community Health Assessment indicates that 37.1% of Orange County Residents had an annual income of greater than \$100,000. The total households accounted for in this overall estimate was 126,640 in Orange county.

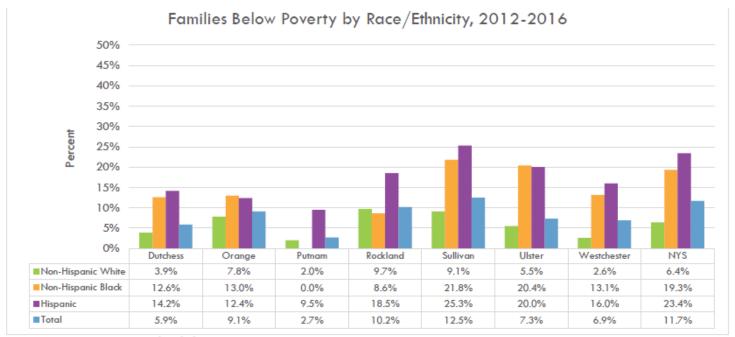
Total Households	
	Households
Dutchess	107,384
Orange	126,460
Putnam	34,316
Rockland	99,935
Sullivan	27,679
Ulster	69,662
Westchester	345,885
Mid-Hudson	811,321
NYS	7,302,710
NYS excl NYC	4,160,305

Source: U.S. Census Bureau, 2017 American Community Survey 5-year estimates

	<\$10,000		<\$10,000		\$10,000 \$24,99		\$25,000 \$49,99		\$50,000 \$74,99		\$75,00 \$99,9		>\$100,0	00
	N	%	N	%	N	%	N	%	N	%	N	%		
Dutchess	4,164	3.9	12,114	11.3	19,325	18.0	17,775	16.6	14,603	13.6	39,403	36.7		
Orange	5,981	4.7	14,904	11.8	22,560	17.8	19,693	15.6	16,470	13.0	46,852	37.1		
Putnam	734	2.1	2,588	7.5	4,385	12.8	4,936	14.4	4,601	13.4	17,072	49.8		
Rockland	3,841	3.8	11,329	11.4	15,062	15.1	13,270	13.3	11,497	11.5	44,936	45.0		
Sullivan	1,783	6.4	4,625	16.7	6,654	24.1	5,180	18.7	3,518	12.7	5,919	21.3		
Ulster	3,648	5.2	10,179	14.6	15,069	21.6	12,774	18.3	8,617	12.4	19,375	27.8		
Westchester	16,498	4.8	35,386	10.2	52,301	15.1	45,772	13.2	35,953	10.4	159,975	46.2		
Mid- Hudson	36,649	4.5	91,125	11.2	135,356	16.7	119,400	14.7	95,259	11.7	333,532	41.1		
NYS	516,085	7.1	1,055,677	14.4	1,440,269	19.8	1,160,508	15.9	865,640	11.9	2,264,531	31.1		
NYS excl NYC	224,247	5.4	549,074	13.2	832,350	20.0	690,525	16.6	523,705	12.6	1,340,404	32.2		

Source: U.S. Census Bureau, 2017 American Community Survey 5-year estimates

The Mid-Hudson Region Community Health Assessment reports that the Non-Hispanic Black population had the highest rate of families below the poverty line. Orange County as a whole had a 9.1% rate of families below the poverty line, which was the fourth highest rate in the Mid-Hudson Region, with Sullivan being the highest at 12.5%.



Source: U.S. Census Bureau, 2012-2016, American Community Survey, 5-year estimates https://www.health.ny.gov/statistics/community/minority/county/index.htm

In the City of Newburgh, only 14% of residents have an annual income of greater than \$100,000, with a median household income of \$36,922 and 31.2% of the population below the poverty line.



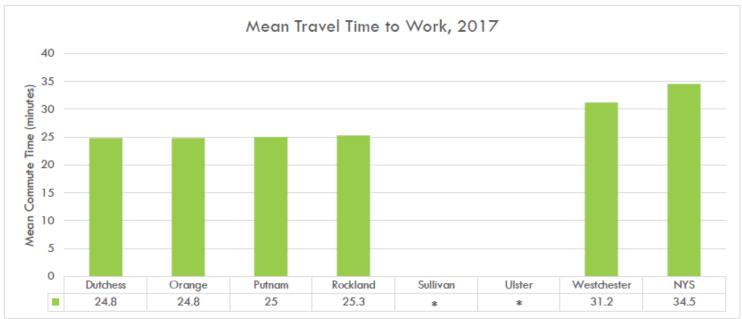
Source: https://data.census.gov/cedsci/profile?hidePreview=true&g=1600000US3650034

Employment plays a large role in one's health. The Mid-Hudson Region Community Health Assessment indicates that there is a 5.6% unemployment rate in Orange County.



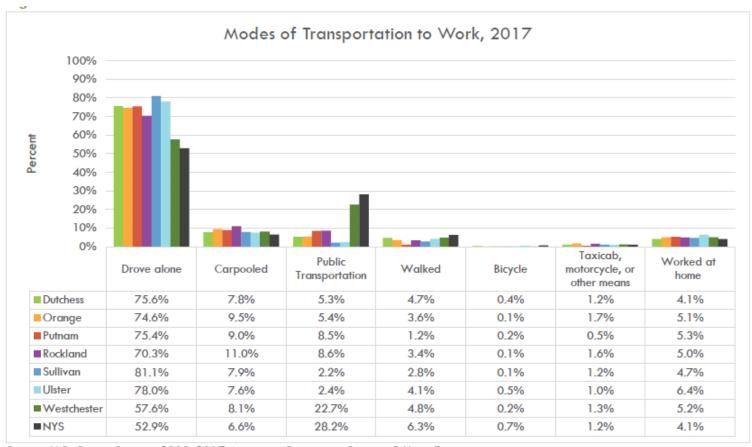
Source: U.S. Census Bureau, American Community Survey, 2013-2017, 5-year estimates https://factfinder.census.gov/faces/nav/isf/pages/index.xhtml

The U.S. Census Bureau reports that the City of Newburgh has a 57.5% employment rate, which is lower than the average across Orange County of 64.8% as referenced above.



*: Data for this geographic area cannot be displayed because the number of sample cases is too small. Source: U.S. Census Bureau, 2013-2017 American Community Survey, 5-Year Estimates https://factfinder.census.gov/faces/nav/isf/pages/index.xhtml

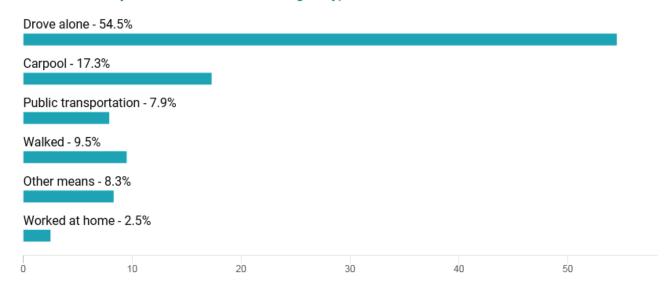
The most common mode of transportation to work across the county was by car.



Source: U.S. Census Bureau, 2013-2017 American Community Survey, 5-Year Estimates https://factfinder.census.gov/faces/nav/isf/pages/index.xhtml

The average commuting time to work in Orange County is 24.8 minutes, which is similar to the City of Newburgh. According to the U.S. Census Bureau, residents have an average commuting time of 26 minutes. The most common mode of transportation to work for City of Newburgh residents is also by car.



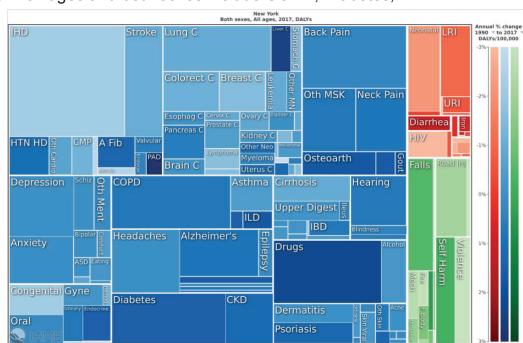


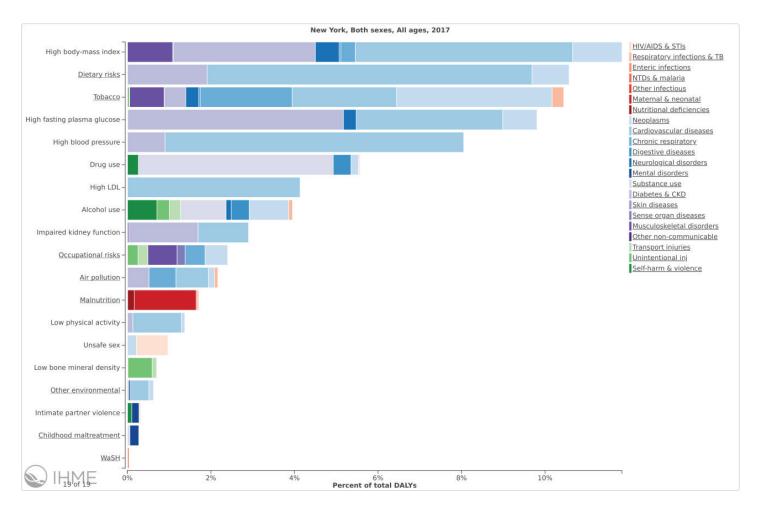
Disability:

The World Health Organization states that disabilities can affect three dimensions life: impairment to body structure or mental function; activity limitation, such as difficulty hearing, moving or problem solving; and participation restrictions in daily activities, such as working, engaging in social or recreational activities or accessing healthcare or preventative services. It's noted that adults with a disability commonly have a higher rate of chronic health conditions, including diabetes, heart disease and/or obesity. A disability-adjusted life year (DALY) is considered to be a summary measure of population health that combines data on premature mortality and disability to identify the leading causes of ill health. The causes of disability-adjusted life years in New York State in all ages and both sexes include COPD, Diabetes,

Depression, Stroke, Lung Cancer, Breast Cancer, Colorectal Cancer, Drugs, Falls, HIV and much more, according to the Orange County CHNA/CSP Data Dashboards provided by Montefiore Health System.

Risk factors for disability-adjusted life years in New York State include High Body Mass Index, Dietary Risks, Tobacco, High Fasting Plasma Glucose, High Blood Pressure, Drug Use, Alcohol Use, Malnutrition and many other factors (see below).





The list of measures includes:

- Poverty
- Health insurance status
- Regular PCP
- Fall hospitalizations
- Assault-related hospitalizations
- Adult obesity
- Child obesity
- Adult smoking
- Asthma ED visits
- Diabetes hospitalizations
- CRC screening
- CRC incidence*
- Breast cancer incidence* (Not included in New York State PA dashboard, but alternative sources exist)
- Child immunizations
- Flu immunizations
- HIV incidence
- Chlamydia
- Preterm births
- Breastfed in hospital
- Adolescent pregnancy
- Poor mental health
- Binge drinking
- Suicide rate

 Opioid burden rate*(Not included in New York State PA dashboard, but alternative sources exist)

The Mid-Hudson Regional Community Health Assessment references that in New York State, roughly one in four adults (more than 3.3 million people) are living with a disability.

The types of disabilities outlined in the Community Needs Assessment include:

- **Independent living disability** difficulty performing tasks or errands alone, such as visiting a doctor's office or shopping due to a physical, mental, or emotional condition
- Cognitive disability serious difficulty concentrating, remembering, or making decisions due to a physical, mental, or emotional condition
- Self-care disability difficulty handling tasks, such as dressing or bathing on one's own
- Mobility disability difficulty moving around physically, such as walking or climbing stairs
- Hearing disability deafness or serious difficulty hearing
- Vision disability blindness or serious difficulty seeing (even when wearing glasses)

The Mid-Hudson Region Community Health Assessment indicates that the highest rate of adults living with a self-care disability is 4.8%, and the second highest rate of adults living with any disability is 25.9%.

Table 19

	Adults Living with Any Disability	Independent Living Disability	Cognitive Disability	Self-care Disability	Mobility Disability	Hearing Disability	Vision Disability						
Dutchess	22.3%	6.5%	7.9%	4.0%	12.3%	3.2%	2.1%						
Orange	25.9%	7.0%	8.7%	4.8%	11.6%	6.6%	4.1%						
Putnam	19.9%	6.5%	8.6%	2.4%	10.0%	3.0%	1.8%						
Rockland	18.3%	5.1%	5.5%	4.0%	9.9%	2.6%	3.6%						
Sullivan	29.4%	9.8%	13.5%	3.3%	17.1%	7.7%	6.2%						
Ulster	20.7%	6.1%	9.7%	2.9%	10.8%	3.6%	2.7%						
Westchester	20.0%	5.4%	7.3%	3.4%	10.6%	3.8%	5.3%						
NYS	22.9%	3.9%	8.7%	3.5%	13.3%	3.9%	3.7%						

Source: NYSDOH Expanded Behavioral Risk Factor Surveillance System, 2018

https://www.health.ny.gov/statistics/prevention/injury_prevention/information_for_action/docs/2019-06_ifa_report.pdf

According to the U.S. Census Bureau, 12.5% of the population of the City of Newburgh is disabled.

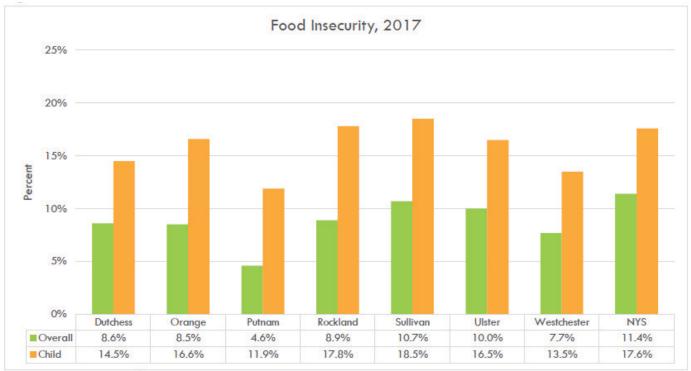




Access to healthy food largely impacts one's overall ability to lead a healthy lifestyle. Those who are faced with food insecurity often make the choice between food, medical care, housing and utilities. The Mid-Hudson Regional Community Health Assessment notes that other populations that are more vulnerable to food insecurity than the overall population include:

- Senior Populations
- Those living in rural communities
- Black Populations
- Hispanic Populations
- Those living in poverty

Orange County has an 8.5% overall rate of food insecurity, and 16.6% rate of food insecurity among children.



Source: Feeding America, 2019

https://public.tableau.com/profile/feeding.america.research#!/vizhome/2017StateWorkbook-

Public 15568266651950/CountyDetailDataPublic

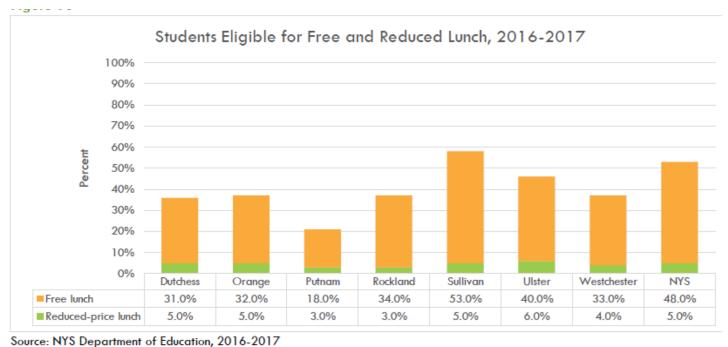
Orange County was also among the lowest density rate of grocery stores per population, at 28.7 per 10,000.



Source: U.S. Census Bureau, County Business Patterns, 2016 https://factfinder.census.gov/faces/nav/isf/pages/index.xhtml

Also, of note is that 5.0% of the population of Orange County has limited access to healthy foods. While specific data was not available in the same breakdown, these rates are believed to be far worse in the City of Newburgh, located within MSLC's Primary Service Area

As noted in the Mid-Hudson Region Community Health Assessment, the National School Lunch Program is a federal program that provides free, nutritionally balanced lunches to children each school day. While Sullivan County had the highest rate of students eligible for free and reduced lunch in 2016-2017, Orange County had 32% of students eligible for free lunch, and 5% eligible for reduced price lunch.

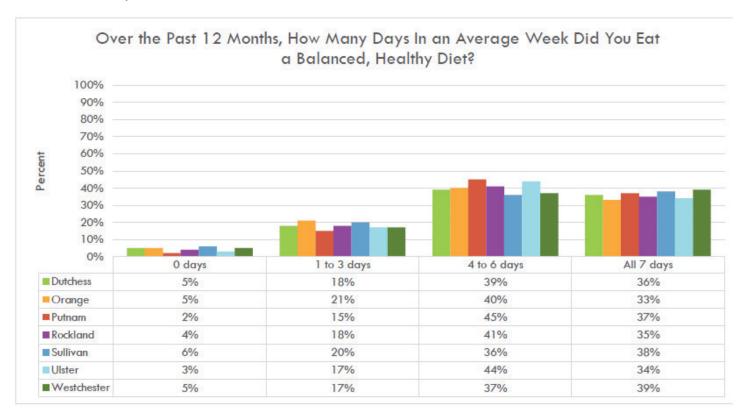


https://data.nysed.gov/reportcard.php?instid=800000081568&year=2017&createreport=1&freelunch=1

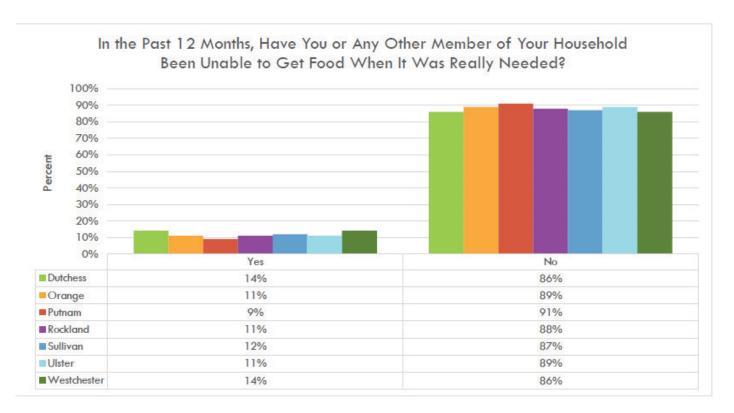
The Newburgh Enlarged City School District provides free breakfast and lunch to all students as part of a federally funded grant program. The district website indicates: Students in the Newburgh Enlarged City School District will begin the 2017-18 school year on the right track

with free nutritious meals in school. The Community Eligibility Provision (CEP) provides an opportunity for districts in high poverty areas to provide free breakfast and lunch to all students without the encumbrance of collecting and processing school meal applications for free and reduced-price meals. In addition, Community Eligibility allows families to reallocate the money previously used for the lunch program back into supporting their household.

The Mid-Hudson Region Community Health Survey revealed that Orange County had the lowest rate of respondents who reported eating a balanced healthy diet all 7 days in an average week over the past 12 months.



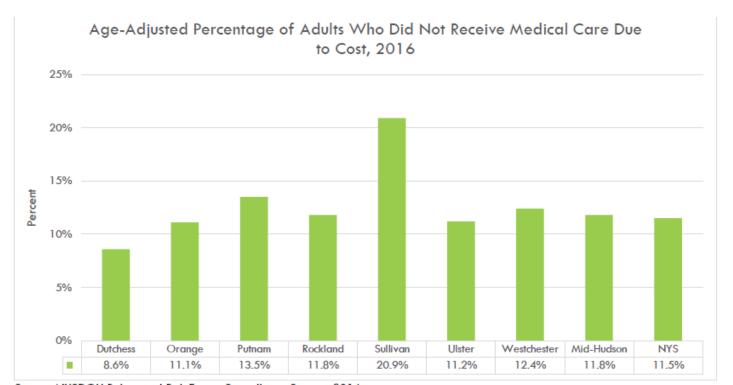
Additionally, 11% of Orange County respondents indicated being unable to get food when it was really needed.



Addressing food insecurity in the MSLC's Primary Service Area will be a key focus of the 2019-2021 Community Service Plan.

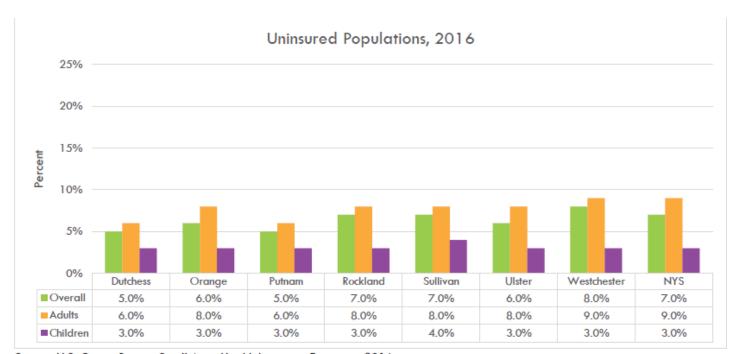
Access to healthcare providers is another social determinant identified in the Mid-Hudson Region, and is specifically a challenge in the City of Newburgh due to limited access to transportation and the cost of care/no insurance, among other items.

The Mid-Hudson Region Community Health Assessment notes that 11.1% of Orange County residents did not receive medical care due to cost in 2016. While Orange County may not be among the highest, the numbers are far higher in the City of Newburgh as compared to the county as a whole.



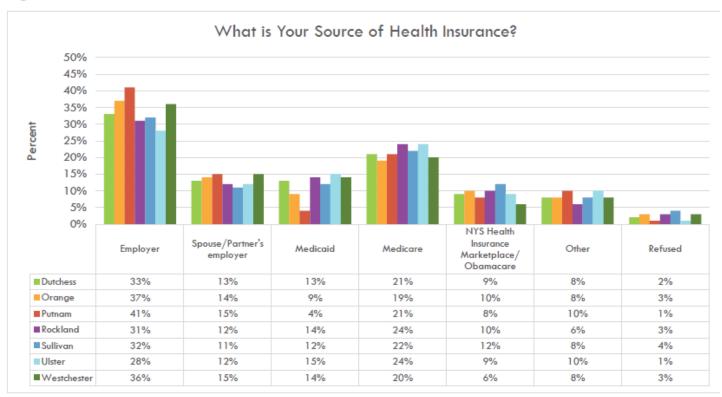
Source: NYSDOH Behavioral Risk Factor Surveillance System, 2016 https://health.data.ny.gov/Health/Behavioral-Risk-Factor-Surveillance-System-BRFSS-H/jsy7-eb4n/data#revert

Six percent of Orange County Residents overall were uninsured in 2016. This number is also believed to be far higher in MSLC's Primary Service Area, specifically the City of Newburgh population, but exact data was not available.



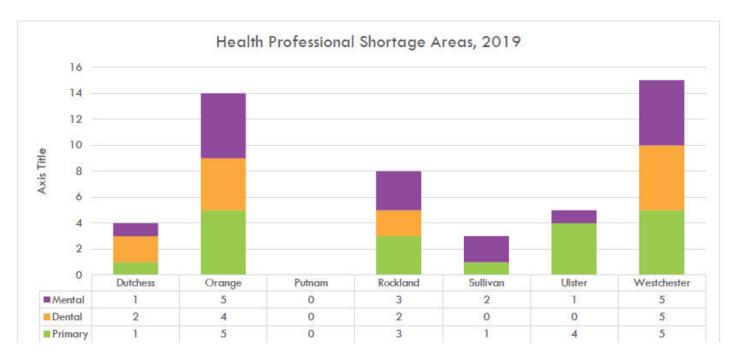
Source: U.S. Census Bureau Small Area Health Insurance Estimates, 2016 https://www.countyhealthrankings.org/app/new-york/2019/rankings/factors/overall

92% of respondents in the Mid-Hudson Region Community Health Survey reported having health insurance, and of those, 37% are getting their insurance through their employer. Of note, 9% of respondents in Orange County have Medicaid as their insurance, and 19% Medicare. MSLC's overall payer mix in 2018 is 77.8% government payer mix and 19% charity care.



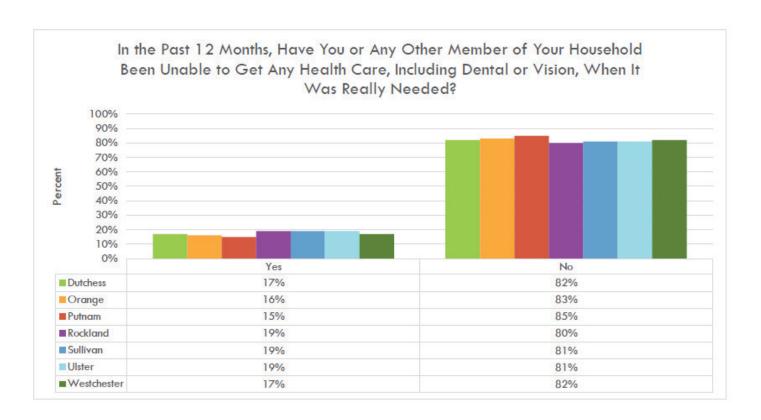
*Does not include respondents that answered "no" to question in Figure 72

The Mid-Hudson Region Community Health Assessment 2019-2021 notes that the health professional shortage rates are among the highest in Orange and Westchester Counties.

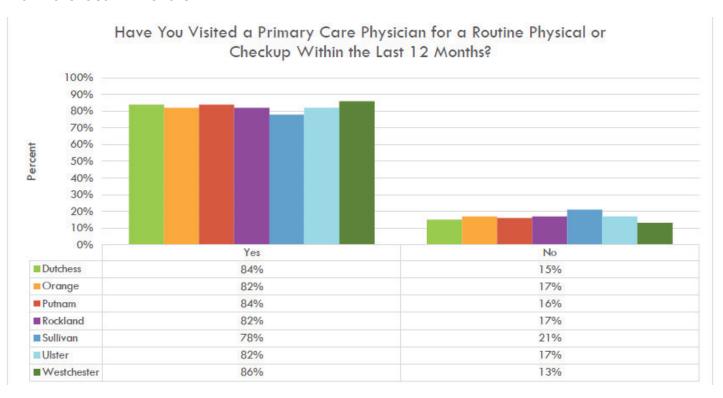


Access to the ratio of providers to population also has an impact on the residents of the Mid-Hudson Region, as noted in the areas of Mental Health Professionals, Dental Health Professionals and Primary Care providers.

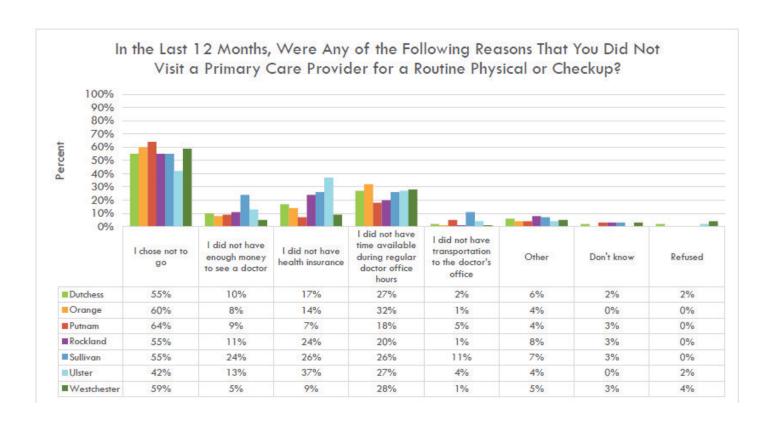
Orange County had the second lowest rate of respondents indicating that in the past 12 months, the respondent or a member of their household was unable to get any healthcare including Dental or Vision when it was really needed.



The results of the *Mid-Hudson Region Community Health Survey* reveal that 82% of Orange County residents report having visited a primary care physician for a routine physical or checkup within the last 12 months.



Furthermore, specific responses from the 850 Orange County residents as part of *Mid-Hudson Region Community Health Survey* indicates that of those who did not visit a primary care physician in the last 12 months, 14% responded the cause was they did not have health insurance.



Identification and discussion of health challenges

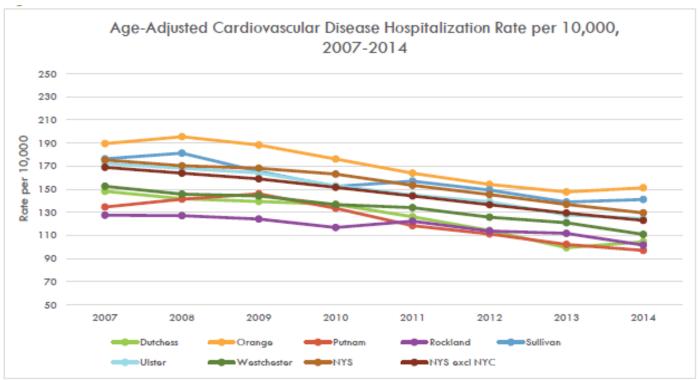
Health Indicators as outlined in *the Mid-Hudson Region Community Health Assessment 2019-2021* include Physical Activity, Nutrition, Mortality, Physical Health including Chronic Diseases such as Chronic Lower Respiratory diseases, asthma, cardiovascular disease, diabetes, obesity, cirrhosis of the liver, cancer (colorectal, lung and bronchus, prostate, breast, cervical), Infectious Diseases, Sexually Transmitted Infections, Tick Borne Diseases, Reproductive Health, Oral Health, and Behavioral Health.

According to the *Mid-Hudson Region Community Health Assessment 2019-2021*, in Orange County, Heart Disease and cancer are the leading causes of death and leading causes of premature death (death before age 75) by a large margin. Obesity is a leading contributor to these top causes of death, as well as diabetes, stroke, and hypertension, all of which can lead to premature death. According to 2016 BRFSS data, nearly 70% of Orange County adults are either overweight or obese. Data from 2016-2018 show that 36.8% of school-aged children and adolescents are overweight or obese. Over the past ten years, the rates of obesity have continually grown, as well as the subsequent morbidity of cardiovascular disease, prediabetes, and hypertension.

STI's are also on the rise in Orange County. There has been a 75% increase in the average number of newly diagnosed HIV cases in Orange County from 17.2 per year (2011-2015) to 26.3 per year (2016-2018). Chlamydia rates among both males and females from 2014-2016 are higher in Orange County than rates in the Mid-Hudson Region, and have steadily increased or remained the same from 2011-2013 to 2014-2016. Additionally, Orange County had its first fetal demise in 2019 from congenital syphilis in over 25 years.

Cardiovascular Disease:

While Cardiovascular Disease hospitalization rates have declined across the entire Mid-Hudson Region, from 2007-2014, Orange County had the highest rate at the time.



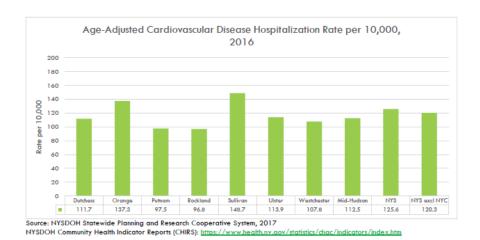
Note: Y-axis does not begin at zero in order to clearly display trend lines.

	Dutchess	Orange	Putnam	Rockland	Sullivan	Ulster	Westchester	NYS	NYS excl
2007	148.2	189.4	134.5	127.5	176.3	172.5	152.5	175.3	168.9
2008	141.7	195.4	141.3	127.1	181.2	168.1	145.7	170.2	163.8
2009	139.4	188.3	146.0	124.2	165.3	164.1	144.1	168.1	159.0
2010	136.8	176.1	133.5	116.9	152.4	152.9	136.7	163.0	151.6
2011	126.2	163.8	118.5	122.3	157.0	145.0	134.0	153.4	144.2
2012	114.3	154.2	111.2	113.8	149.2	139.1	125.8	145.3	136.6
2013	99.4	147.6	102.2	111.8	138.9	127.7	121.0	136.8	129.4
2014	104.5	151.2	97.0	101.6	141.1	124.5	110.9	129.5	123.0

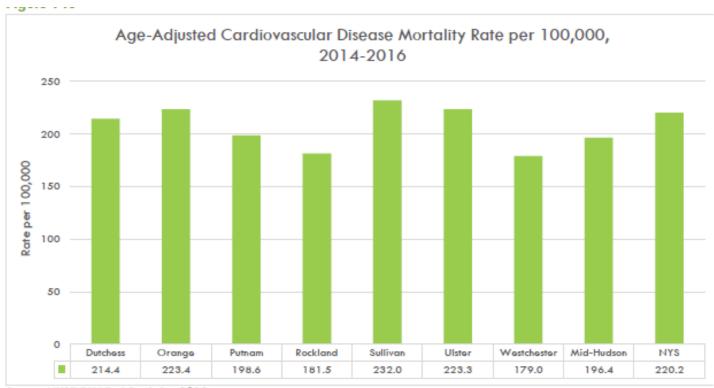
Source: NYSDOH Statewide Planning and Research Cooperative System, 2017

NYSDOH Community Health Indicator Reports (CHIRS): https://www.health.ny.gov/statistics/chac/indicators/index.htm

Orange County had the second highest rate of Age-Adjusted Cardiovascular Disease Hospitalization Rate per 10,000 in 2016, with Sullivan County being the highest.



The rate of Cardiovascular Disease in the Hudson Valley is among the highest in Orange County and even higher than the New York State average. Orange county was also among the highest for Age-Adjusted Cardiovascular Disease Mortality Rates. In Orange County, these rates are above both the Hudson Valley and New York State rates at 223.4 per 100,000 population for 2016.

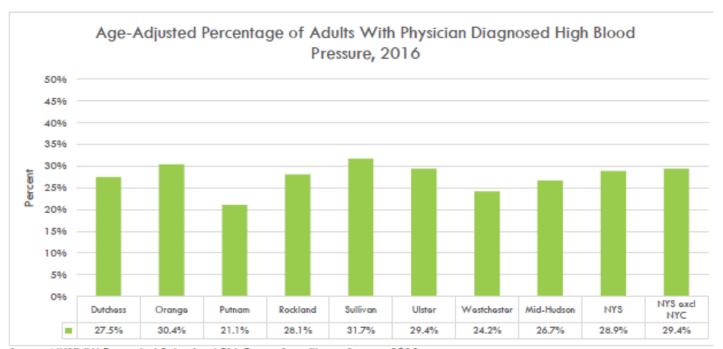


Source: NYSDOH Vital Statistics, 2018

NYSDOH Community Health Indicator Reports (CHIRS): https://www.health.nv.gov/statistics/chac/indicators/index.htm

The hypertension hospitalization rate in Orange County is also higher than the Hudson Valley and New York State rates. According to the Mid-Hudson Region Community Health Assessment, hypertension is among the risk factors for Cardiovascular Disease, indicating that Hypertension or high blood pressure occur when the force of blood against the arteries becomes high enough to cause diseases such as Cardiovascular Disease. Of the 1 in 3 adults in the United States who have hypertension, only about half have it under control. Hypertension can be controlled through checkups with the doctor regularly along with lifestyle changes.

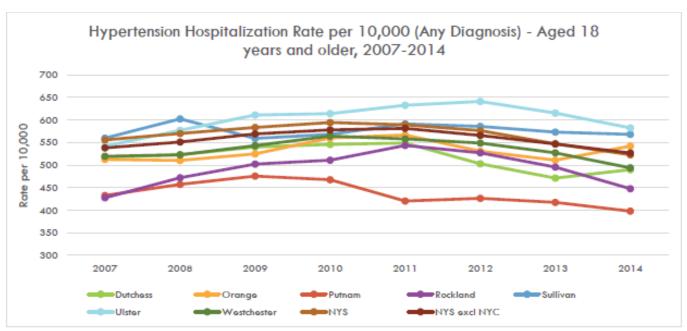
Orange County had the second highest rate of age-adjusted adults with physician diagnosed hypertension.



Source: NYSDOH Expanded Behavioral Risk Factor Surveillance System, 2018

NYSDOH Community Health Indicator Reports (CHIRS): https://www.health.nv.gov/statistics/chac/indicators/index.htm

While hospitalization rates for hypertension varied across the Mid-Hudson Region, Orange County along with many others experienced an increase in hypertension related hospitalizations.

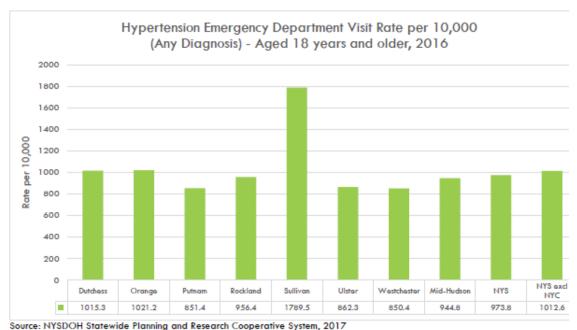


Note: Y-axis does not begin at zero in order to clearly display trend lines.

	Dutchess	Orange	Putnam	Rockland	Sullivan	Ulster	Westchester	NYS	NYS excl
2007	517.4	512.4	432.6	427.5	559.9	541.9	519.6	555.9	538.1
2008	522.9	510.4	457.3	471.9	602.6	577.0	523.0	570.2	551.3
2009	540.1	525.0	475.6	502.1	559.2	611.1	543.1	583.5	569.2
2010	546.0	560.2	467.5	510.8	568.3	614.2	564.4	594.5	578.2
2011	549.0	566.9	420.2	543.6	591.4	632.7	558.2	589.5	581.4
2012	502.9	530.9	426.2	527.1	585.7	641.2	548.7	576.6	565.7
2013	471.2	511.0	417.4	495.5	573.0	615.3	527.3	547.3	546.7
2014	489.9	542.3	397.9	447.8	568.2	582.5	493.9	523.0	526.9

Source: NYSDOH Statewide Planning and Research Cooperative System, 2017
NYSDOH Community Health Indicator Reports (CHIRS): https://www.health.ny.gov/statistics/chac/indicators/index.htm

Orange County was also among the highest for Hypertension related Emergency Department visits.



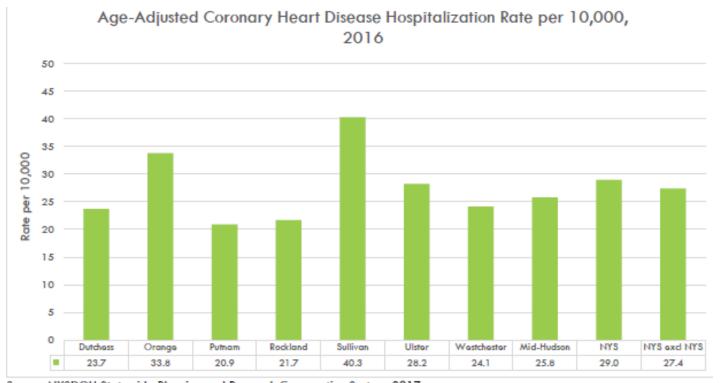
NYSDOH Community Health Indicator Reports (CHIRS): https://www.health.ny.gov/statistics/chac/indicators/index.htm

As noted earlier in this report, hypertension was among the top 10 inpatient discharges for Montefiore St. Luke's Cornwall in 2018 and will be included in our focus areas for the 2019-2021 Community Service Plan.

The *Mid-Hudson Region Community Health Assessment 2019-2021* states that there are three main contributing factors to Cardiovascular Disease. These factors include: Coronary Heart Disease, Cerebrovascular Disease, otherwise known as Stroke, and Congestive Heart Failure.

Coronary Heart Disease:

Coronary Heart Disease is the most common type of Cardiovascular Disease and is caused by a buildup of plaque in the arteries. Orange County had the second highest rate of Coronary Heart Disease hospitalization rates according to the *Mid-Hudson Region Community Health Assessment 2019-2021*, with 33.8 per 10,000 in 2016.

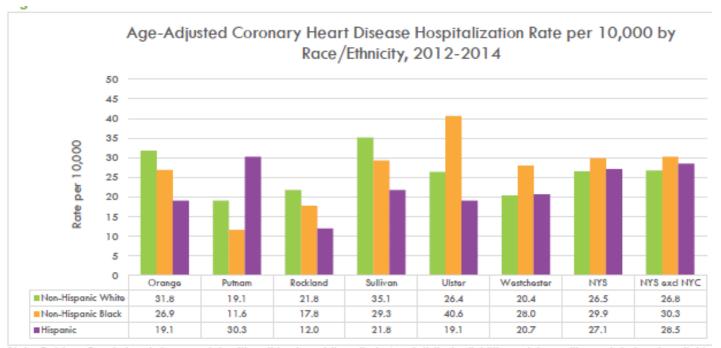


Source: NYSDOH Statewide Planning and Research Cooperative System, 2017

NYSDOH Community Health Indicator Reports (CHIRS): https://www.health.nv.gov/statistics/chac/indicators/index.htm

The complete blockage of arteries may lead to a heart attack. According to the *Mid-Hudson Region Community Health Assessment 2019-2021*, men aged 45 years and older, and women aged 55 years and older, are more likely to have heart attacks compared to other age groups.

The *Mid-Hudson Region Community Health Assessment 2019-2021* states that when stratifying this data by race/ethnicity, trends are not consistent through each county. For example, non-Hispanic White adults had higher CHD hospitalization rates compared to the other racial/ethnic groups in Orange, Rockland, and Sullivan Counties. However, in Ulster, Westchester, New York State, and New York State excluding New York City, non-Hispanic Black adults had higher CHD hospitalization rates.



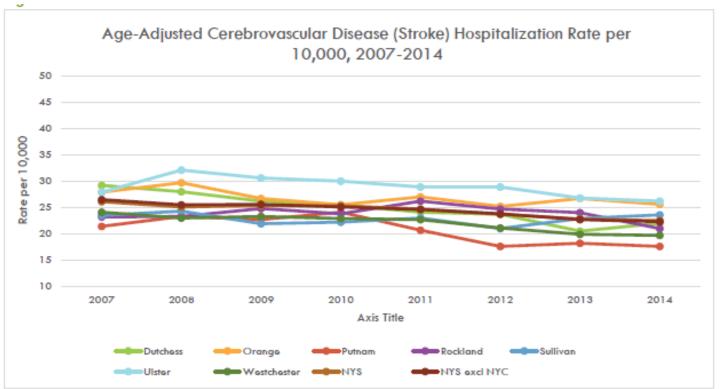
Note: Dutchess County is not shown as data either did not meet the criteria for statistical reliability or data quality, or data is not available. Source: NYSDOH Vital Statistics, 2018

NYSDOH County Health Indicators by Race/Ethnicity (CHIRE): https://www.health.ny.gov/statistics/community/minority/county/index.htm

Cerebrovascular Disease (Stroke):

The *Mid-Hudson Region Community Health Assessment 2019- 2021* states that there are three main types of stroke: ischemic stroke, hemorrhagic stroke and transient ischemic stroke. Ischemic stroke occurs when blood clots or plaques block the blood vessels to the brain, causing the brain to receive decreased oxygen. Almost 87% of strokes are ischemic strokes. A hemorrhagic stroke occurs when a blood vessel bursts inside the brain, and the blood building up in the tissues causes severe damage. The signs and symptoms of a stroke must be addressed quickly in order to treat with the best possible outcomes.

Data from 2016 indicates that Orange County had the highest hospitalization rate of all seven in the mid-Hudson Region.



Note: Y-axis does not begin at zero in order to clearly display trend lines.

	Dutchess	Orange	Putnam	Rockland	Sullivan	Ulster	Westchester	NYS	NYS excl
2007	29.2	27.9	21.4	23.2	23.5	27.9	24.1	26.1	26.5
2008	28.0	29.7	23.3	23.3	24.3	32.1	23.0	25.1	25.5
2009	26.2	26.7	22.7	24.8	21.9	30.6	23.3	25.4	25.6
2010	25.5	25.5	24.1	23.8	22.2	30.0	22.9	25.3	25.1
2011	24.1	27.0	20.7	26.2	23.0	28.9	22.7	24.7	24.6
2012	23.7	25.2	17.6	24.7	21.0	28.9	21.1	23.7	23.8
2013	20.5	26.7	18.2	24.0	22.9	26.8	19.9	22.8	22.7
2014	22.0	25.6	17.6	21.0	23.6	26.2	19.7	22.5	22.3

Source: NYSDOH Statewide Planning and Research Cooperative System, 2017

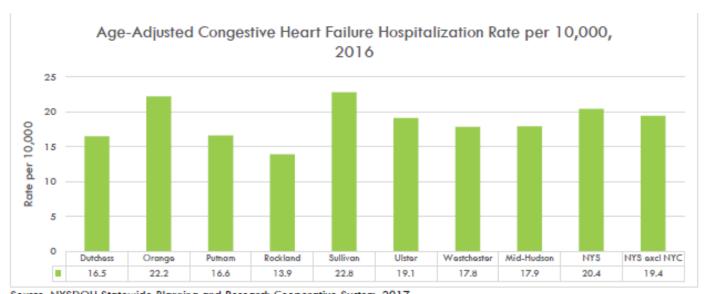
NYSDOH Community Health Indicator Reports (CHIRS): https://www.health.ny.gov/statistics/chac/indicators/index.htm

Montefiore St. Luke's Cornwall has put numerous systems into place to address this issue. In April 2006, Montefiore-St. Luke's Cornwall was designated as a New York State Stroke Center and provides high quality, cost effective stroke care to over 300 patients per year. The MSLC Stroke Team is comprised of an interdisciplinary team that utilizes a comprehensive approach using the American Heart Association/American Stroke Association Guidelines for the Early Management of Acute Ischemic Stroke.

MSLC is part of the Montefiore Health System and has access to the cutting-edge advancements in stroke care through collaboration with the Moses campus of the Montefiore Health System, a designated Joint Commission Certified Comprehensive Stroke Center, and Albert Einstein College of Medicine. Additionally, MSLC has received the American Heart Association/American Stroke Association's Get With The Guidelines-Stroke Gold Plus Achievement Award for the tenth consecutive year. Of note, the MSLC Stroke readmission rate within 30 days has improved from 10.6% in 2018 to 4.2% in 2019.

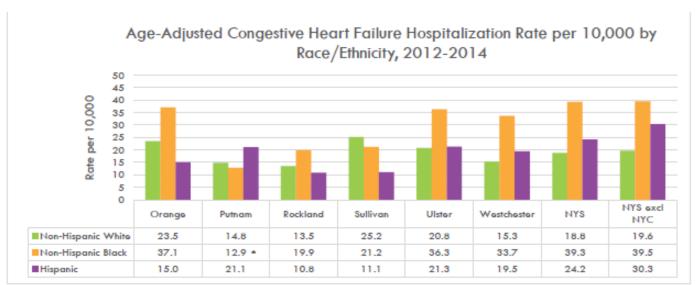
Congestive Heart Failure:

Congestive Heart Failure (CHF) occurs when fluid builds up in the lungs, upper or lower extremities or the GI Tract. This causes the heart to be unable to pump enough blood to meet the body's needs. The Mid-Hudson Region Community Health Assessment indicates that Orange County was among the highest for CHF Hospitalization rates.



Source: NYSDOH Statewide Planning and Research Cooperative System, 2017
NYSDOH Community Health Indicator Reports (CHIRS): https://www.health.ny.gov/statistics/chac/indicators/index.htm

The highest rates of CHF Hospitalizations in Orange County were among the Non-Hispanic Black population.



^{*:} The rate is unstable.

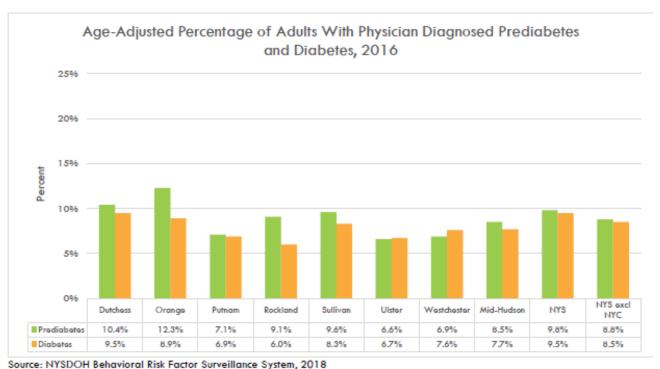
Note: Dutchess County is not shown as data either did not meet the criteria for statistical reliability or data quality, or data is not available. Source: NYSDOH Vital Statistics, 2018

NYSDOH County Health Indicators by Race/Ethnicity (CHIRE): https://www.health.ny.gov/statistics/community/minority/county/index.htm

The *Mid-Hudson Region Community Health Assessment* states that obesity was the 7th leading cause of death in the United States. Diabetes is classified in two forms: Type 1, which is insulin dependent diabetes mellitus, and Type 2, which is non-insulin dependent diabetes mellitus. Prediabetes is diagnosed when one's blood sugar level is higher than normal and is a risk factor of developing diabetes. According to the NYSDOH, 15-30% of the population in New York State

with prediabetes will develop type 2 diabetes within five years, if they do not change their lifestyle behaviors.

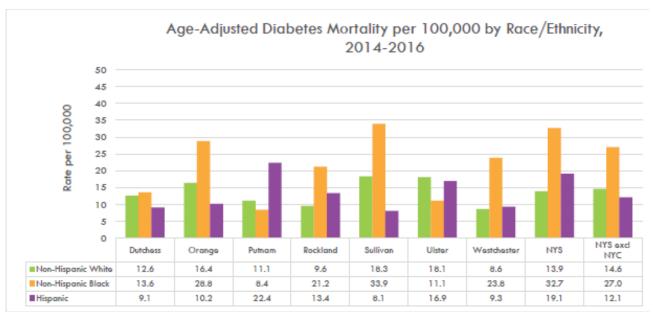
According to the *Mid-Hudson Region Community Health Assessment 2019-2021*, Orange County had the highest percentage of the population diagnosed with prediabetes, at 12.3%.



NYSDOH Community Health Indicator Reports (CHIRS): https://www.health.ny.gov/statistics/chac/indicators/index.htm

Risk factors include obesity/being overweight, genetics, an unhealthy diet, negative health behaviors and decreased physical activity.

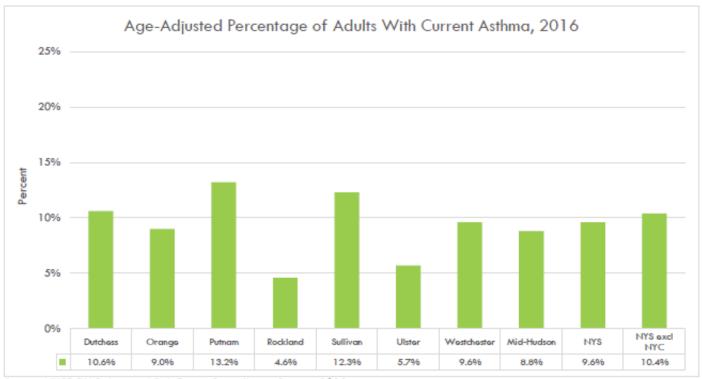
According to the *Mid-Hudson Region Community Health Assessment 2019-2021*, when stratifying data by race/ethnicity, diabetes mortality rates were highest among the Non-Hispanic Black population in New York State, as well as New York State excluding New York City, and most of the counties in the Mid-Hudson Region.



Source: NYSDOH Vital Statistics, 2018

NYSDOH County Health Indicators by Race/Ethnicity (CHIRE): https://www.health.ny.gov/statistics/community/minority/county/index.htm

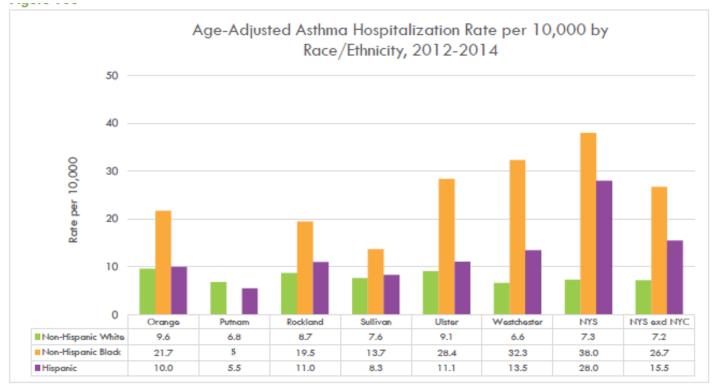
Asthma is another key health challenge across the Mid-Hudson region and has remained a focus of Montefiore St. Luke's Cornwall for the last four years. While Orange County was not among the highest percentage of age adjusted adults with current asthma in 2016, MSLC has partnered with the Orange County Department of Health to address this challenge specifically in the hospital's Primary Service Area.



Source: NYSDOH Behavioral Risk Factor Surveillance System, 2018

NYSDOH Community Health Indicator Reports (CHIRS): https://www.health.ny.gov/statistics/chac/indicators/index.htm

According to the *Mid-Hudson Region Community Health Assessment*, Non-Hispanic Black adults had higher rates of asthma hospitalization compared to Non-Hispanic White and Hispanic Adults.

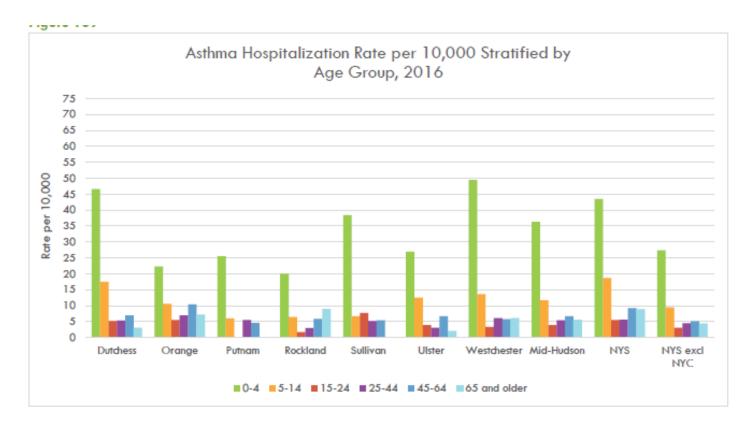


s: Data are suppressed. The data do not meet the criteria for confidentiality.

Note: Dutchess County is not shown as data either did not meet the criteria for statistical reliability or data quality, or data is not available. Source: NYSDOH Statewide Planning and Research Cooperative System, 2016

NYSDOH County Health Indicators by Race/Ethnicity (CHIRE): https://www.health.ny.gov/statistics/community/minority/county/index.htm

Of the 65 and older population, Orange County had the second highest rate of Asthma related hospitalizations.



	0-4	5-14	15-24	25-44	45-64	65 and older
Dutchess	46.6	17.5	5.2	5.3	7.0	3.1
Orange	22.3	10.6	5.5	7.0	10.4	7.2
Putnam	25.5	6.0*	s	5.5	4.6	s
Rockland	20.0	6.5	1.7*	3.0	5.9	9
Sullivan	38.4	6.7*	7.7*	5.2*	5.4	s
Ulster	26.9	12.5	3.9*	3.1	6.7	2.1*
Westchester	49.5	13.6	3.3	6.1	5.8	6.1
Mid-Hudson	36.3	11.7	3.9	5.4	6.7	5.6
NYS excl NYC	27.4	9.5	3.1	4.5	5.1	4.4
NYS	43.5	18.7	5.5	5.6	9.2	8.9

^{*:} Fewer than 10 events in the numerator, therefore the rate is unstable.

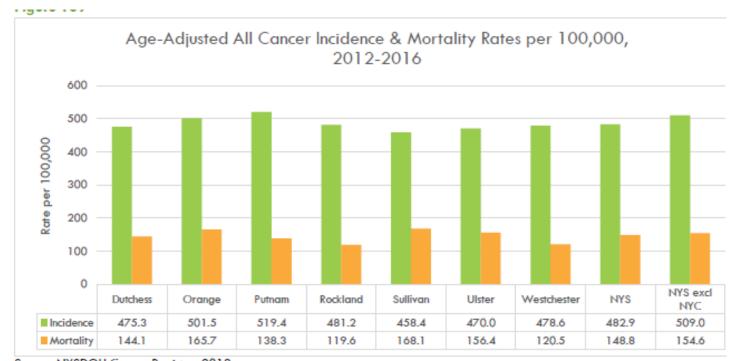
Source: NYSDOH Statewide Planning and Research Cooperative System, 2017

NYSDOH Community Health Indicator Reports (CHIRS): https://www.health.ny.aov/statistics/chac/indicators/index.htm

Cancer:

The *Mid-Hudson Region Community Health Assessment 2019-2021* reports that cancer is one of the leading causes of death across all seven counties in the Mid-Hudson Region. Orange County had the third highest age adjusted all cancer incidence and mortality rates per 100,000 from 2012-2016.

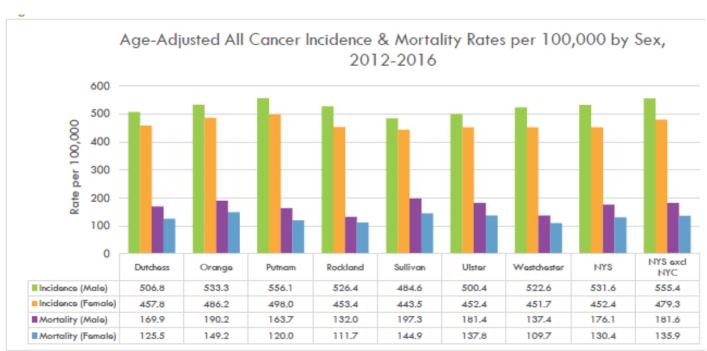
s: Data do not meet reporting criteria.



Source: NYSDOH Cancer Registry, 2018

https://www.health.ny.gov/statistics/cancer/registry/vol1.htm

Orange County also had the second highest rate of all cancer incidence and mortality rates, with a higher rate of males in both incidence and mortality.

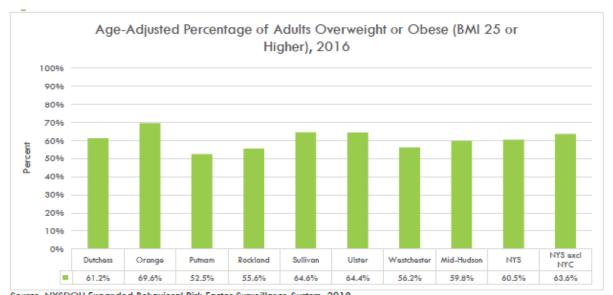


Source: NYSDOH Cancer Registry, 2018

https://www.health.nv.aov/statistics/cancer/reaistry/vol1.htm

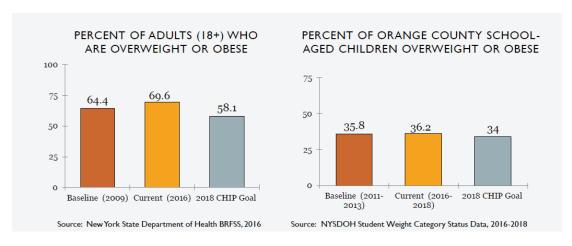
Obesity:

The *Mid-Hudson Region Community Health Assessment 2019-2021* notes that nearly 70% of Orange County adults are overweight or obese and 26.8% of school aged children and adults are overweight or obese. Of all seven counties in the region, Orange County had the highest percentage of adults who are overweight or obese.

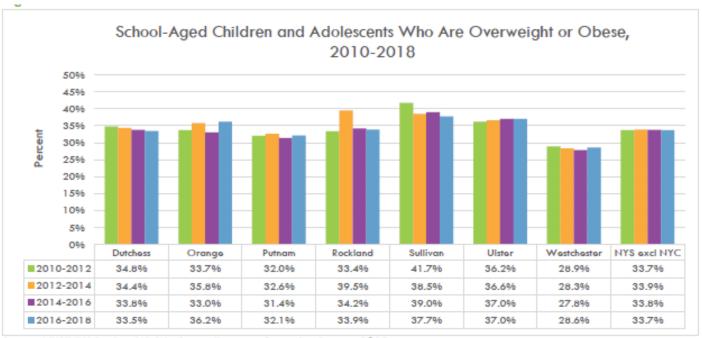


Source: NYSDOH Expanded Behavioral Risk Factor Surveillance System, 2018
NYSDOH Community Health Indicator Reports (CHIRS): https://www.health.ny.gov/statistics/chac/indicators/index.htm

These rates have been on a steady incline throughout the last ten years, as well as the incidence of morbidity of Cardiovascular Disease, prediabetes and hypertension, and will be a key area of focus for MSLC's 2019-2021 Community Service Plan.



The *Mid-Hudson Region Community Health Assessment 2019-2021* shows that Sullivan County had the highest rate of obesity among elementary, middle and high school students when compared to the Mid-Hudson Region, but Orange County rates are still among the highest in the region.



Source: NYSDOH Student Weight Status Category Reporting System, 2019

NYSDOH Community Health Indicator Reports (CHIRS): https://www.health.ny.gov/statistics/chac/indicators/index.htm

Sexually Transmitted Infections:

According to the Mid-Hudson Region Community Health Assessment, HIV/AIDS infections continue to be a substantial public health issue in New York State and the U.S. as a whole. HIV is a preventable disease, and people who are tested and learn they are HIV-positive can make changes to significantly reduce the risk of transmitting it to their sexual or drug-using partners. It is estimated that 91% of new HIV infections in the U.S. are transmitted from people who are not diagnosed or who are diagnosed, but not in care.

Healthy People 2020 set a target to reduce the number of new HIV diagnoses in the U.S. from 43,806 to 32,855 per year. Westchester and Sullivan Counties had the highest case rates (10.9 and 10.5), while Putnam had the lowest (1.5). The Mid-Hudson Region's rate of newly diagnosed HIV infections was lower than the rate for New York State, which was 16.0 per 100,000 population, including New York City.

It's important to note however that here has been a 75% increase in the average number of newly diagnosed HIV cases in Orange County from 17.2 per year (2011-2015) to 26.3 per year (2016-2018)

- •Orange County's chlamydia rates stratified by age are higher than the Hudson Valley rates and have significantly worsened or remained the same from 2011-2013 to 2014-2016.
- •Chlamydia rates among both males and females from 2014-2016 are higher in Orange County than the Hudson Valley rates.

Sources: NYSDOH Communicable Disease Electronic Surveillance System, May 2019 and NYSDOH Community Health Indicator Reports, 2014-2016

Chlamydia is described as a common STI that infects those of all genders, and while it can be treated easily, if untreated, can cause major

reportable STIs in Orange County, 2016-2018 1800 1632 1542 1600 1410 1400 1200 1000 800 600 400 224 292 258 200 43 67 73

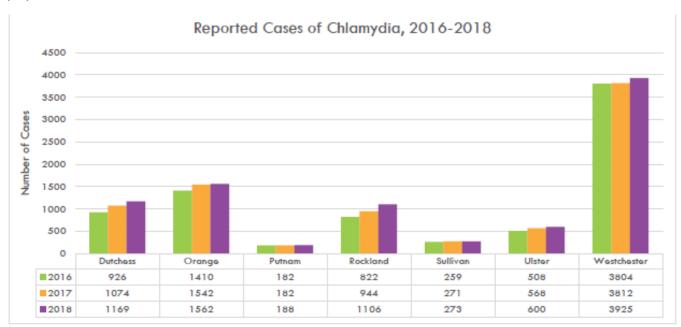
■2016 ■2017 ■2018 (Provisional)

Number of Cases of commonly

damage to one's reproductive system. The highest rate of chlamydia in Orange County is among females ages 20-24 years and 15-19 years of age at 2806.8 and 2045.7 per 100,000 population.

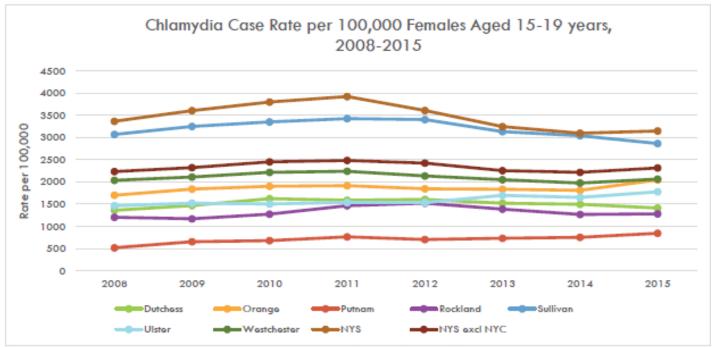
0

Chlamydia



Note: 2018 data provided by the LHDs.

Source: NYSDOH Communicable Disease Annual Reports https://health.ny.gov/statistics/diseases/communicable/ Syphillis



Note: Three-year averages for counties and single-year estimates for NYS and NYS excl NYC are graphed above.

			Single-Year						
	Dutchess	Orange	Putnam	Rockland	Sullivan	Ulster	Westchester	NYS	NYS excl NYC
2008	1361.1	1699.8	517.7	1204.9	3068.2	1464.5	2036.8	3365.2	2234.2
2009	1469.8	1837.1	654.8	1170.2	3249.4	1521.1	2111.3	3605.7	2320.1
2010	1623.3	1902.5	679.8	1275.5	3352.3	1503.7	2216.3	3798.5	2452.4
2011	1586.4	1916.6	762.5	1463.3	3425.2	1539.8	2238.9	3922.3	2482.6
2012	1606.9	1844.2	703.1	1521.6	3404.7	1533.9	2134.1	3607.3	2423.6
2013	1522.0	1834.5	729.9	1386.0	3131.3	1695.8	2049.1	3246.7	2253.8
2014	1497.7	1808.6	752.1	1265.6	3042.2	1652.9	1974.4	3096.5	2215.5
2015	1412.7	2045.7	843.8	1283.1	2864.2	1777.4	2065.3	3146.3	2312.9

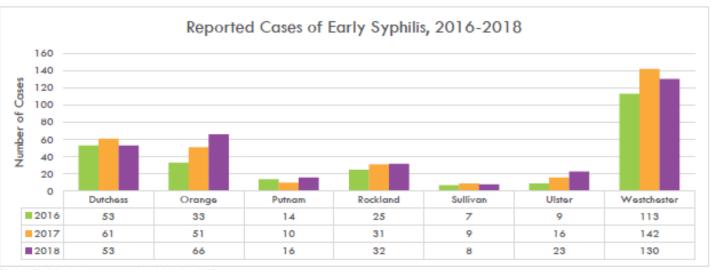
Note: Three-year averages for counties and single-year estimates for NYS and NYS excl NYC were used.

Source: NYSDOH Bureau of Sexual Health and Epidemiology, 2018

NYSDOH Community Health Indicator Reports (CHIRS): https://www.health.ny.gov/statistics/chac/indicators/index.htm

According to the New York State Department of Health Communicable Disease Electronic Surveillance System, as of May 2019, the rate of primary and secondary syphilis among females has increased 169% in the last 5 years in New York State.

Orange County had its first fetal demise from congenital syphilis in over 25 years in 2019.



Note: 2018 data was provided by the LHDs.

Source: NYSDOH Communicable Disease Annual Reports https://health.ny.aov/statistics/diseases/communicable/

The 2019-2021 Regional Health Assessment Provider Level Focus Groups also revealed additional issues impacting Orange County specifically include:

Smoking Rates:

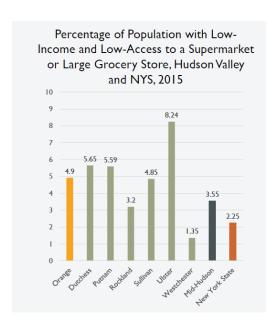
- Although overall adult smoking rates decreased from 2013 to 2016—
 - The percentage of adult smokers with a disability is 25.2%
 - The percentage of adult smokers with an income <\$25,000 is 26.2%
- Both of these subgroups have smoking rates at nearly twice the county rate

Source: New York State Department of Health BRFSS 2016- Orange County Youth Development Survey, 2017.

Access to Supermarkets or a Grocery Store:

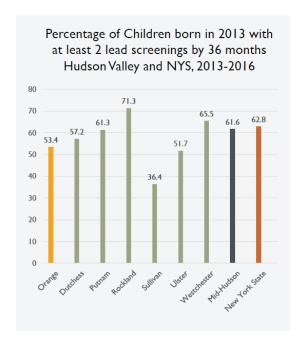
- Limited access to supermarkets or other sources of healthy and affordable food may make it harder to eat a healthy diet
- Defined as a low-income census tract with at least 500 people, or 33 percent of the population, living more than 1 mile (urban areas) or more than 10 miles (rural areas) from the nearest supermarket, supercenter, or large grocery store
- Orange County has a higher percentage of residents (4.9%) fitting the criteria outlined above than the Hudson Valley rate and New York State overall

Source: United States Department of Agriculture Food Environment Atlas, 2015



Lead Screenings:

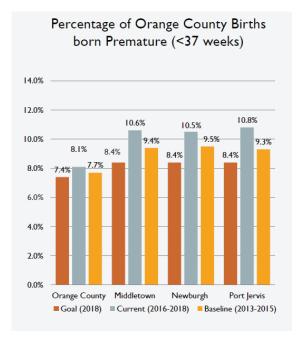
- No safe blood lead level in children has been identified and lead exposure can affect nearly every system in the body
- Lead exposure often occurs with no obvious symptoms and often goes unrecognized
- Two lead screenings by 2 years of age should be part of routine pediatric care
- Orange County is only testing approximately half of all children (53.4%) that need to be tested which is worse than the Hudson Valley and NYS percentages of 61.6% and 62.8% respectively



Premature Births:

- Prematurity is the largest contributor to infant death and leading cause of long-term neurological disabilities in children
- Overall, county rates are better than in the three cities
- Use real-time birth certificate data to view trends over time
- Black women in Orange County have the highest prematurity rates in the County at 11.1%, compared to all women at 8.1% (2016-2018)

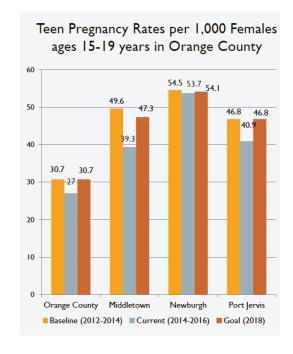
Source: Orange County Birth Certificate Database, as of February 2019



Teen Pregnancy:

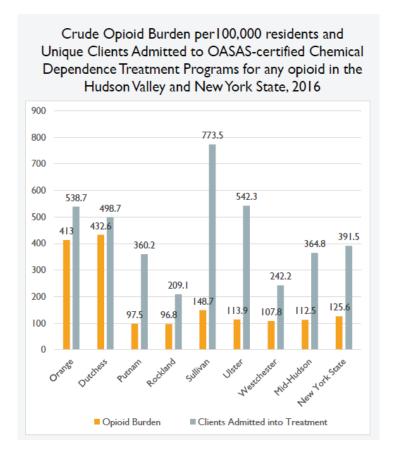
- Orange County teen pregnancy rates are at historical lows
- Overall County rate of 27 per 1,000 is lower than the NYS average of 29.8 per 1,000 females
- Teen pregnancy rates in each of the three cities have declined since 2012
- However, rates in Newburgh are still twice the county average at 53.7 per 1,000 females

Source: New York State Perinatal Profile, 2014-2016



Opioid Burden:

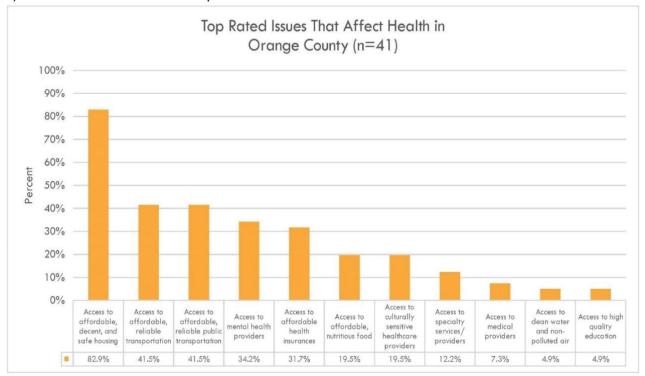
- Opioid burden includes outpatient ED visits and hospital discharges for non-fatal opioid overdose, abuse, dependence, and unspecified use, and opioid overdose deaths
- Orange County has one of the highest burdens attributed to opioids in the Hudson Valley
- Overall opioid burden is over 1.5 times the NYS rate
- One of the highest rates in the Hudson Valley for persons in treatment programs for any opioid use (including heroin) and just above the NYS rate



SUMMARY OF KEY FINDINGS:

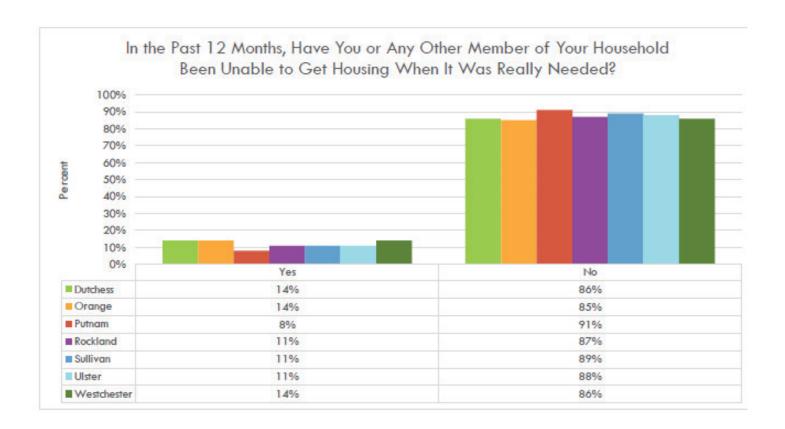
According to the *Mid-Hudson Region Community Health Assessment 2019-2021*, Provider Focus Groups, the top-rated issues that affect health in Orange county are the following:

- 1) Access to affordable, decent, and safe housing
- 2) Access to affordable, reliable, personal, and public transportation
- 3) Access to mental health providers



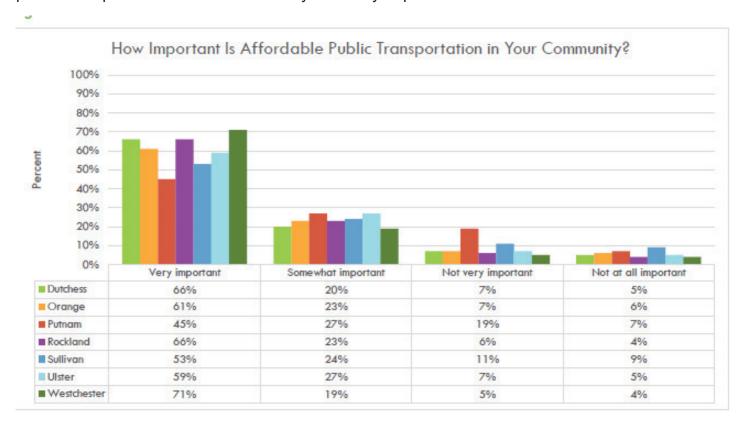
Safe Housing:

Access to housing was among the top issues identified in the Mid-Hudson Region Community Health Survey across all seven counties. Of Orange County residents, 14% responded that they were unable to get housing when it was really needed, which was among the highest of all seven counties (and the same for Dutchess and Westchester).



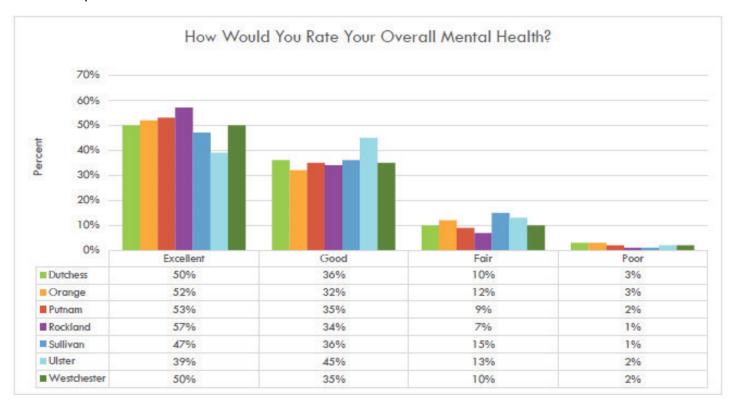
Transportation:

The vast majority (61%) of Orange County respondents indicated that access to affordable public transportation in their community was very important.

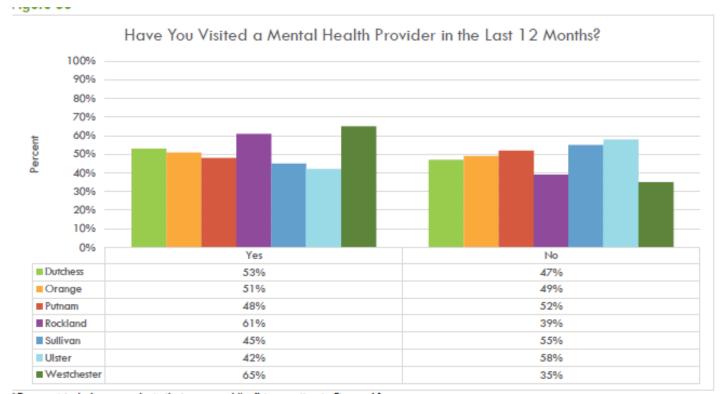


Mental Health: 54

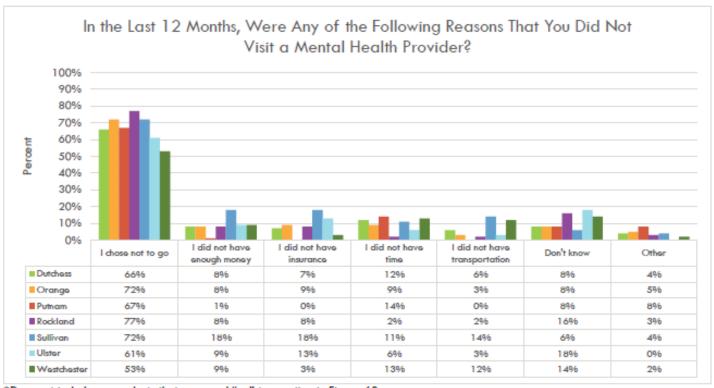
Of the respondents of the *Mid-Hudson Community Health Survey 2019-2021*, 52% of residents in Orange County rated their overall Mental Health as excellent, and 3% rated their mental health as poor.



Furthermore, when asked the question of have you visited a mental health provider in the last 12 months, 51% of Orange County respondents indicated yes.

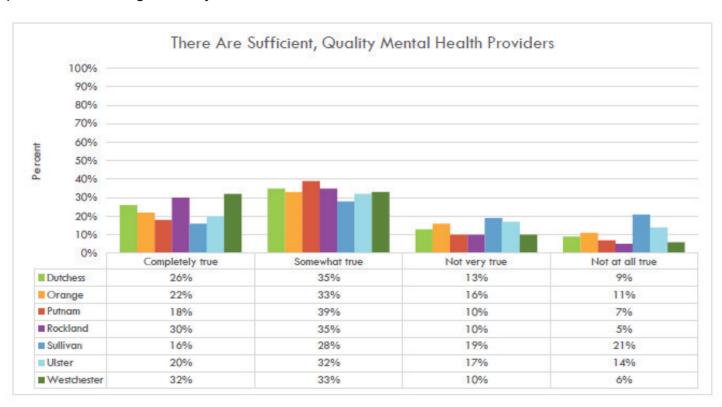


Does not include respondents that answered "no" to question in Figure 61



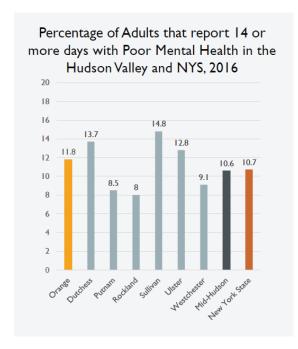
^{*}Does not include respondents that answered "no" to question in Figure 63

Only 22% of respondents indicated that there is a sufficient amount of quality mental health providers in Orange County.



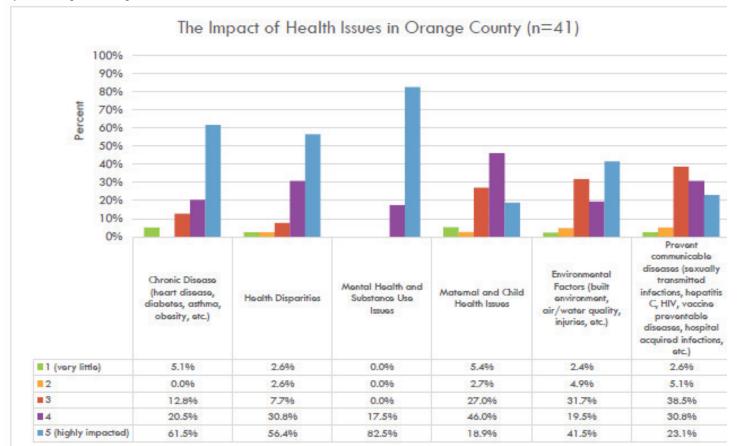
The New York State Department of Health BRFSS, 2016 Data indicates that:

- Self-rated health is a commonly used measure of overall well-being
- Survey question asked residents to qualify their mental health: "Thinking about your mental health, which includes stress, depression, and problems with emotions, for how many days during the past 30 days was your mental health not good?"
- Nearly 12% of Orange County residents reported poor mental health 14 or more days, which is slightly above the HV and NYS percentages



Also of note, the top three barriers in achieving better health in Orange county include:

- 1) Knowledge of existing resources
- 2) Drug and/or alcohol use
- 3) Healthy literacy



The overall impact of health issues in Orange County include the following:

• Chronic Disease (heart disease, diabetes, asthma, obesity, etc.)

- Health disparities
- Mental Health and Substance Abuse Issues
- Maternal and Child Health Issues
- Environmental Factors (built environment, air/water quality, injuries, etc.)
- Prevent communicable diseases (sexually transmitted infections, Hepatitis C, HIV, vaccine preventable diseases, hospital acquired infections, etc.)

The Mid-Hudson Region Community Health Assessment, 2019-2021, and specifically the Mid-Hudson Region Community Health Survey and Provider Focus Groups results indicated that the leading causes of death and premature death (before age 75) in Orange County are heart disease and cancer, with obesity being the leading contributor to these top causes.

The above data also revealed that Orange County has worse than New York State averages (or getting worse since the last assessment) in the following health areas:

- Overdose deaths due to opioid and heroin use
- Premature births among Non-Hispanic Black women and Hispanic women
- Preventable adult hospitalizations
- Youth-reported alcohol and electronic vaping product use
- Unintended pregnancy among Non-Hispanic Black women and Hispanic women

Furthermore, the survey's indicated the following Emerging issues:

- Sexually Transmitted Infections including chlamydia, syphilis, and HIV
- Opioid burden, including hospitalizations, overdoses and deaths
- Youth reported electronic vaping product use
- Prediabetes among adults.

Primary Data Collection:

Montefiore St. Luke's Cornwall's primary data source was the Mid-Hudson Region Community Health Assessment 2019-2021, which includes a total of 5,372 residents across the Mid-Hudson Region, which breaks down to approximately 767 responses per county. The survey was crafted with questions that would collect information regarding the varying priorities and initiatives put forth by the New York State Department of Health. Among these were The Prevention Agenda, The Eight Domains of Livability, and incorporating healthy aging into Health Across all Policies.

Each of the seven counties were divided into two specific regions chosen by the Local Health Departments and then half of the surveys from each county were collected in each region. The Collaborative then retained SCRI to conduct a digital dial survey by phone at random. The telephone surveys were conducted between April and September 2018 and included both landline and cell phone numbers to reach a variety of respondents. The results were weighted by age, gender, race and region according to the U.S. Census 2010. A sample of the Survey questions is provided in Appendix A.

In addition to the Mid-Hudson Regional Community Health Survey, several focus groups were created to gain the insights of the underrepresented populations in the community, including those who are seniors, low income, veterans, LGBTQ members, those experiencing homelessness, and residents with a mental health diagnosis. In an effort to ensure that the needs of the underrepresented were addressed, 12 focus groups, with members of the providers who serve these populations formed a collaborative with Human Service providers throughout the region. Prior to the focus groups, a survey was sent to providers in each county in an effort to supply additional background regarding local factors that influence community health. The survey was inclusive of the populations that are served by the providers, issues that impact the communities the providers serve, barriers that exist in helping residents achieve better health and the interventions used to address the social determinants of health. A total of 285 surveys were completed by the service providers, with varying answers in each county. The differences were then discussed at length in each of the focus groups. A sample of the interview form is provided in appendix B.

In Orange County specifically, a total of 41 responses were collected from providers that serve a variety of populations. According to the Mid-Hudson Regional Community Health Assessment, The Orange County Department of Health, joined by HealtheConnections, conducted a focus group at the Joint Membership of Health and Community Agencies (JMHCA), with a focus on providing the residents of Orange County with a comprehensive platform for health and wellness. Several agencies were represented in this meeting, and the discussion was centered around the survey questions that were distributed prior to the focus group.

The providers involved in the focus groups serve a diverse group of clients including children and adults with disabilities, those with substance abuse disorders, and low-income individuals. The types of residents that these providers serve is shown in Appendix C. According to the Mid-Hudson Regional Community Health Assessment, the top three issues that these providers felt affected the health in their communities, when considering the Mid-Hudson Region as a whole, were access to affordable, decent and safe housing, access to mental health providers and access to affordable, reliable transportation. The top three barriers that focus group members felt prevented residents from achieving better health in their community were knowledge of existing resources, health literacy and drug and/or alcohol use.

Also, of note, the additional data sources used to compile the Mid-Hudson Region Community Health Assessment included the following secondary sources. Montefiore St. Luke's Cornwall used these sources to help support our findings.

The additional data sources that HealtheConnections utilized to create the overall Mid-Hudson Region Community Health Assessment included the following:

American Community Survey (ACS): A survey conducted nationally by the U.S. Census Bureau to gather information about the social and economic need of communities. Secondary source.

Behavioral Risk Factor Surveillance System (BRFSS): An annual national phone survey coordinated and funded by the Centers for Disease Control and Prevention (CDC) and conducted by each State's health department. Data includes health related behaviors, health conditions, and use of health services. Secondary source.

Comprehensive Housing Affordability Strategy Data (CHAS): Custom tabulations of ACS data about housing problems and housing needs from the U.S. Census Bureau sent to the U.S. Department of Housing and Urban Development (HUD). HUD and local governments use this data to plan how to distribute their funds. Secondary source.

County Business Patterns: An annual series from the U.S. Census Bureau which provides economic data by industry, such as number of establishments, employment during a certain week, and annual payroll. Secondary source.

County Health Rankings & Roadmaps: A collaboration between the Robert Wood Johnson Foundation and the University of Wisconsin Population Health Institute. County Health Rankings & Roadmaps pulls from a variety of sources to measure vital health factors in counties across the U.S.. Secondary source.

HRSA Data Warehouse: A website run by the Health Resources and Services Administration (HRSA) which provides maps, data, reports, and dashboards about HRSA's health care programs, including health Professional Shortage Areas, Health Resource Files, and Medically Underserved Populations. Secondary source.

Healthy People 2020: A collaborative process that reflects input from a diverse group of individuals and organizations. Healthy People2020 includes 10-year national objectives for improving the health of all Americans. Healthy People has established benchmarks and monitored progress over time. Secondary source.

Map the Meal Gap: A county level analysis of food insecurity conducted by Feeding America using sources, such as the ACS, the Bureau of Labor Statistics, and the U.S. Department of Agriculture (USDA). Secondary source.

Measure of America: A project of the Social Science Research Council that issues reports, briefs, and interactive data visualizations to provide an understanding of well-being and opportunity in America. Secondary source.

National Environmental Public Health Tracking Network: A data hub provided by the CDC which brings together health and environmental data. Secondary source.

New York State Board of Elections: Established as a bipartisan agency of New York State to administer and enforce all laws relating to elections within the State. Data tracked by the board includes election results and enrollment statistics for New York State. Secondary source

New York State Communicable Disease Annual Reports: Documents are released annually from NYSDOH containing mandated reports of suspected or confirmed communicable diseases. Secondary source.

New York State Bureau of Sexual Health and Epidemiology: A special projects unit responsible for conducting Sexually Transmitted Infection (STI) surveillance activities related to screening, disease morbidity, and HIV/STI Partner Services disease intervention activities. Secondary source.

New York State Cancer Registry: A registry which collects, processes, and reports information about New Yorkers diagnosed with cancer from all physicians, dentists, laboratories, and other health care providers, who are required to report all cancers to the NYSDOH. Secondary source.

New York State Department of Health Rabies Laboratory: A system that contains monthly reports of the number of animals tested for rabies, as well as the number that tested positive for rabies in every New York State county. Secondary source.

New York State Division of Criminal Justice: A criminal justice support agency which provides resources and services that inform decision-making and improve the quality of the criminal justice system. Secondary source

New York State Education Department (NYSED): NYSED publicly reports educational data submitted by educational institutions on its website data.nysed.gov. Secondary source

New York State HIV Surveillance System: An HIV surveillance system conducted by the AIDS Institute Bureau of HIV/AIDS Epidemiology that facilitates and monitors HIV-related laboratory and clinician reporting in New York State. Secondary source

New York State Hospital-Acquired Infection Program: A program developed to provide data on select hospital-acquired infections (HAI) that hospitals are required to report by law to the Department of Health. This law was created to provide the public with fair, accurate, and reliable HAI data to compare hospital infection rates and support quality improvement and infection prevention activity in hospitals. Secondary source

New York State Immunization Information System: A system that provides a complete, accurate, secure, real-time immunization medical record that is easily accessible and promotes public health by fully immunizing all individuals of appropriate age and risk. All health care providers are required to report all immunizations administered to persons less than 19 years of age, along with the person's immunization histories, to the New York State Department of Health. Secondary source

New York Statewide Planning and Research Cooperative System (SPARCS): A comprehensive allpayer data reporting system established as a result of cooperation between the health care industry and the government. The system currently collects patient level data on patient characteristics, diagnoses and treatments, services, and charges for each hospital inpatient and outpatient visit. Secondary source New York State Department of Transportation: A branch of the New York State government responsible for administering programs related to the maintenance, coordination, and development of transportation infrastructure. Secondary source

New York State Student Weight Status Category Reporting System: A system that collects weight status category data on children and adolescents attending public schools in New York State outside of New York City. Secondary source

Safe Drinking Water Information System: An information hub from the Environmental Protection Agency (EPA) containing data about public water systems and violations of the EPA's drinking water regulations, as reported to the EPA from the states. Secondary source

Small Area Health Insurance Estimates (SAHIE): A program of the U.S. Census Bureau which estimates health insurance coverage for all states and counties nationally. Secondary source

United for ALICE: Reports which use a standardized methodology that assesses cost of living and financial hardship on a county level calculated by United Way of Northern New Jersey. Secondary source

Upstate New York Poison Center: A call center and research organization which provides poison emergency telephone management, poison information resources, public education, professional education, research and data collection, and toxicosurveillance in real time. Its coverage area includes all New York State counties except Westchester, New York City, and Long Island. Secondary source 24

USDA Food Environment Atlas: An atlas from the USDA which assembles data regarding food environment factors, such as food choices, health and well-being, and community characteristics. Secondary source

Vital Statistics of New York State: A registry of all births, marriages, divorces/dissolutions of marriage, deaths, induced termination of pregnancy/abortions, and fetal deaths that have occurred in New York State outside of New York City. It is maintained by the New York State Bureau of Vital Records, a branch of the NYSDOH. Secondary source

The Mid-Hudson Region Community Health Assessment 2019-2021 can be found at the following link: https://www.orangecountygov.com/180/Community-Health-Assessments--

Secondary Data Collection

To further assess the broad interests of the community, following the Regional Assessment, Montefiore St. Luke's Cornwall participated in the Orange County Health Summit on June 4, 2019. This summit included more than 100 community partners including hospitals, health care providers, community members, community health care providers, and those involved in academia. This summit was an active working session, to review the data from the above-mentioned Provider focus groups, along with the Siena College Survey Data and ultimately decide on the Priority Areas for the 2019-2021 Community Health Improvement and Community Service Plan.

- Arms Acres
- Access: Supports for Living
- Alcohol and Drug Abuse Council of Orange County
- American Heart Association
- American Lung Association
- Action Towards Independence Inc.
- Bon Secours Community Hospital
- Catholic Charities of Orange, Sullivan and Ulster Counties
- Chester Union Free School District
- City of Middletown
- Community advocates
- Cornell Cooperative Extension
- Cornerstone Family Healthcare
- Crystal Run Village Inc.
- Eat Smart New York
- Enlarged Middletown City School District
- Greater Hudson Valley Health System-Orange Regional Medical Center
- Habitat for Humanity of Greater Newburgh
- HealtheConnections
- Honor Emergency Housing Group
- Horizon Family Medical Group
- Hudson River Healthcare

- Hudson Valley Community Services
- Independent Living
- Keller Army Community Hospital
- Liberty Management
- Maternal Infant Services Network
- Mental Health Association of Orange County
- Montefiore St. Luke's Cornwall Hospital
- NAMI, Orange County NY
- Newburgh Seventh Day Adventist Church
- New York State Senator Meztger's Office
- Office for Persons with Developmental Disabilities Orange County Office of Community Development
- Orange County Department of Mental Health
- Orange County Department of Planning
- Orange County Department of Social Services
- Orange County Office for the Aging
- Orange County Youth Bureau
- Orange-Ulster BOCES
- Planned Parenthood of the Hudson Valley
- RECAP
- Rehabilitation Support Services
- Rockland County Department of Health
- Safe Homes Orange County
- St. Anthony Community Hospital
- SUNY Orange
- Touro College of Osteopathic Medicine
- Tri County Community Partnership

Each participant of the summit was provided with an in-depth overview of the data collected to aid in the selection of the two priority areas.

The Orange County Department of Health Data Review Guide was provided to all attendees, which outlined the 140 most current data indicators available, and then compared against the New York State Department of Health Prevention Agenda Areas specifically for Orange County and the state at large. Additionally, a summary of the data collected from the Mid-Hudson Regional Community Health Survey was presented to all attendees. Furthermore, all summit participants were provided with data from the Mid-Hudson Region provider survey, which included information from Human Service providers throughout the region regarding the barriers they saw regarding health for the underrepresented population in the Community Survey mentioned above. These questions pertained to residents who were among the aging population, veterans, low income, experiencing homelessness, the LGBTQ community and those with a substance use disorder or mental health diagnosis.

All summit attendees were also given a summary of the prioritization across the Mid-Hudson Region, which utilized the Hanlon Method. According to the Orange county Department of Health Improvement Plan- the Hanlon Method can be defined as "a technique created by J.J Hanlon to prioritize health problems. The trusted Hanlon Method minimizes personal bias and objectively prioritizes health problems based on baseline data and numerical values. This method guides the decision-making process for selecting health priorities using both the size of the problem and the seriousness of the problem."

The Orange County Health Summit completed the following tasks:

- In-depth review of the most up to date data on all prevention agenda areas
- Provided results from the modified Hanlon Method prioritization
- Full review of the most current community mobilization efforts to best identify the barriers in accessing care in the City of Newburgh (and MSLC's Primary Service Area)
- A vote from all participants on the two Prevention Agenda Priorities for the 2019-2021 Community Health Improvement Plan
- A review of the impacts of the social determinants of health, specifically on health outcomes
- Open discussion on assets and barriers of the selected priority areas.

Montefiore St. Luke's Cornwall, along with all other Orange County Health Summit participants signed up to participate in and contribute to strategic planning efforts throughout the course of the 2019-2021 Community Health Improvement Plan. Of the identified focus areas, each includes a workgroup that is led collaboratively between the Orange County Department of Health and hospital staff. The purpose of this to ensure that the strategies outlined in the plan are being executed properly. Each workgroup will report status updates on an annual basis, at what will become a yearly summit.

All of the above was used to create the Orange County Health Improvement Plan 2019-2021, which will support the county wide efforts along with participating hospitals (inclusive of Montefiore St. Luke's Cornwall), and specifically the 2019-2021 Community Service Plan. The Orange County Health Improvement Plan was distributed to Montefiore St. Luke's Cornwall and participating community health partners on November 4, 2019 and is available via this link: https://www.orangecountygov.com/DocumentCenter/View/14537/Orange-County-Community-Health-Improvement-Plan-2019-2021

The rationale behind using this source to help create the Montefiore St. Luke's Cornwall Community Service Plan was that our efforts moving forward would be best accomplished if we are working in partnership with our fellow community health partners to create a cohesive approach to tackling the greatest health challenges and priority areas as identified from our primary and secondary data collection sources.

While the above mentioned primary and secondary data collections were extremely helpful in identifying the overall health challenges, barriers and disparities in Orange County as compared to the rest of the Mid-Hudson Region and New York state as a whole, the survey results are misleading and mask several of the disparities that exist in the urban areas of Orange County.

As noted in the Mid-Hudson Region Community Health Assessment: At first glance, Orange County appears to be an affluent suburban community that enjoys a median household income above the New York State average (\$75,146 vs. \$62,765, respectively); a smaller percentage of individuals living below the poverty line (12.2% vs. 15.1% respectively); a smaller unemployment rate (5.6% vs. 6.6%, respectively); and boasts a higher percentage of high school graduates as compared to New York State (89.6% and 86.1%, respectively). However, aggregate county data are misleading and masks the disparities within the County. The urban areas of Orange County are characterized by severe socioeconomic and health inequities, with one-third of the population living below the poverty line and residing in the three major cities (Newburgh, Middletown, and Port Jervis).

Special Considerations include that a further drill down of the data is not yet available. SUNY Albany has partnered with the Orange County Department of Health to provide zip code level data based on the findings of the community health surveys, but this breakdown will not be available until March of 2020. This has created a barrier in MSLC's ability to further analyze the results specific to the hospital's Primary Service Area.

Montefiore St. Luke's Cornwall is working closely with its parent, Montefiore Health System, along with the Orange County Department of Health to best identify and continue to address the consistent health disparities in MSLC's Primary Service Areas.

As a result of all of the above data collections, the New York State Prevention Agenda Health Improvement Plan for 2019 established five Prevention Agenda Priority areas:

- Prevent chronic diseases
- Promote a healthy and safe environment
- · Promote healthy women, infants and children
- Promote well-being and prevent mental substance use disorders
- Prevent communicable diseases

Orange County, and Montefiore St. Luke's Cornwall has selected the following two priority areas

- 1. Prevent Chronic Disease
- 2. Prevent Communicable Disease

SUMMARY OF ASSETS:

In order to develop this document, Montefiore St. Luke's Cornwall has partnered with many community organizations as well as the Orange County Health Department.

Siena College Survey/Mid-Hudson Region Community Health Survey

The Community Needs Assessment originated from a collaborative that was formed in 2017 from the seven local health departments across the Mid-Hudson Region, with a goal of creating the first ever regional community health survey. These counties include Dutchess, Orange, Ulster, Putnam, Sullivan, Rockland and Westchester. There were 17 local hospitals who contributed funds for the Collaborative to contract with the Siena College Research Institute, to conduct a randomized digital dial community health survey, which would supplement the Regional Community Health Assessment.

Involved personnel:

The above-mentioned Collaborative Consists of the following hospitals and health systems:

- Bon Secours Charity Health System, a member of the Westchester Medical Center Health Network
- Good Samaritan Hospital
- Bon Secours Community Hospital
- St. Anthony Community Hospital
- Dutchess County Department of Behavioral & Community Health
- Catskill Regional Medical Center, a member of the Greater Hudson Valley Health System

- HealthAlliance Hospitals, members of the Westchester Medical Center Health Network
- Nuvance Health:
 - Northern Dutchess Hospital
 - Vassar Brothers Medical Center
 - Putnam Hospital Center
- Montefiore Health System
- Montefiore Hudson Valley Collaborative
- Montefiore Nyack Hospital
- Montefiore St. Luke's Cornwall
- Orange County Department of Health
- Orange Regional Medical Center, a member of the Greater Hudson Valley Health System
- Putnam County Department of Health
- Rockland County Department of Health
- St. Joseph's Medical Center
- Sullivan County Public Health Services
- Ulster County Department of Health and Mental Health
- Westchester County Department of Health

Service Area for Community Health Assessment and Community Health Improvement Plan:

Orange County

Participating Local Health Department: Orange County Department of Health Participating Hospitals: Bon Secours Community Hospital, Montefiore St. Luke's Hospital, Orange Regional Medical Center, and St. Anthony Community Hospital

Orange County Department of Health:

Jackie Lawler, Epidemiologist

845.615.3884

ilawler@orangecountygov.com

Bon Secours Community Hospital and St. Anthony Community Hospital:

Barbara Demundo, System Director, Community Engagement

845.368.5545

Barbara_Demundo@bshsi.org

Montefiore St. Luke's Cornwall:

Kate Dabroski, Vice President, Marketing, Public and Community Relations 845.784.3850

kdabroski@montefioreslc.org

Orange Regional Medical Center:

Amanda Langseder, Director of Community Health 845.794.3300 ext. 2187

alangseder@ghvhs.org

This Survey was titled the Mid-Hudson Region Community Health Survey. A total of 5,372 residents across the Mid-Hudson Region were surveyed, which breaks down to approximately 767 responses per county. The survey was crafted with questions that would collect information regarding the varying priorities and initiatives put forth by the New York State Department of Health. Among these were The Prevention Agenda, The Eight Domains of Livability, and incorporating healthy aging into Health Across all Policies.

Each of the seven counties were divided into two specific regions chosen by the Local Health Departments and then half of the surveys from each county were collected in each region. The Collaborative then retained SCRI to conduct a digital dial survey by phone at random. The telephone surveys were conducted between April and September 2018 and included both landline and cell phone numbers to reach a variety of respondents. The results were weighted by age, gender, race and region according to the U.S. Census 2010

Provider Focus Groups

In addition to the Mid-Hudson Regional Community Health Survey, several focus groups were created to gain the insights of the underrepresented populations in the community, including those who are seniors, low income, veterans, LGBTQ members, those experiencing homelessness, and residents with a mental health diagnosis. In an effort to ensure that the needs of the underrepresented were addressed, 12 focus groups, with members of the providers who serve these populations formed a collaborative with Human Service providers throughout the region. Prior to the focus groups, a survey was sent to providers in each county in an effort to supply additional background regarding local factors that influence community health. The survey was inclusive of the populations that are served by the providers, issues that impact the communities the providers serve, barriers that exist in helping residents achieve better health and the interventions used to address the social determinants of health. A total of 285 surveys were completed by the service providers, with varying answers in each county. The differences were then discussed at length in each of the focus groups

In Orange County specifically, a total of 41 responses were collected from providers that serve a variety of populations. According to the Mid-Hudson Regional Community Health Assessment, The Orange County Department of Health, joined by HealtheConnections, conducted a focus group at the Joint Membership of Health and Community Agencies (JMHCA), with a focus on providing the residents of Orange County with a comprehensive platform for health and wellness. Several agencies were represented in this meeting, and the discussion was centered around the survey questions that were distributed prior to the focus group.

The providers involved in the focus groups serve a diverse group of clients including children and adults with disabilities, those with substance abuse disorders, and low-income individuals. The types of residents that these providers serve is shown in Appendix C. According to the Mid-Hudson Regional Community Health Assessment, the top three issues that these providers felt affected the health in their communities, when considering the Mid-Hudson Region as a whole, were access to affordable, decent and safe housing, access to mental health providers, and access to affordable, reliable transportation. The top three barriers that focus group members felt prevented residents from achieving better health in their community were knowledge of existing resources, health literacy and drug and/or alcohol use.

To further assess the broad interests of the community, following the Regional Assessment, Montefiore St. Luke's Cornwall participated in the Orange County Health Summit on June 4, 2019. This summit included more than 50 community partners including hospitals, health care providers, community members, community health care providers, and those involved in academia.

The full list of participants includes:

Arms Acres

- Access: Supports for Living
- Alcohol and Drug Abuse Council of Orange County
- American Heart Association
- American Lung Association
- Action Towards Independence Inc.
- Bon Secours Community Hospital
- Catholic Charities of Orange, Sullivan and Ulster Counties
- Chester Union Free School District
- City of Middletown
- Community advocates
- Cornell Cooperative Extension
- Cornerstone Family Healthcare
- Crystal Run Village Inc.
- Eat Smart New York
- Enlarged Middletown City School District
- Greater Hudson Valley Health System-Orange Regional Medical Center
- Habitat for Humanity of Greater Newburgh
- HealtheConnections
- Honor Emergency Housing Group
- Horizon Family Medical Group
- Hudson River Healthcare
- Hudson Valley Community Services
- Independent Living
- Keller Army Community Hospital
- Liberty Management
- Maternal Infant Services Network
- Mental Health Association of Orange County
- Montefiore St. Luke's Cornwall Hospital
- NAMI, Orange County NY
- Newburgh Seventh Day Adventist Church
- New York State Senator Meztger's Office
- Office for Persons with Developmental Disabilities
- Orange County Office of Community Development
- Orange County Department of Mental Health
- Orange County Department of Planning
- Orange County Department of Social Services
- · Orange County Office for the Aging
- Orange County Youth Bureau
- Orange-Ulster BOCES
- Planned Parenthood of the Hudson Valley
- RECAP
- Rehabilitation Support Services
- Rockland County Department of Health
- Safe Homes Orange County
- St. Anthony Community Hospital
- SUNY Orange
- Touro College of Osteopathic Medicine
- Tri County Community Partnership

The Orange County Community Health Improvement Plan was then created to serve as the roadmap for Montefiore St. Luke's Cornwall and fellow community partners to follow. Those of us participating in the Orange County CHIP include:

Chronic Disease

Focus Area 1: Healthy Eating and Food Security

Meg Oakes, Orange County Department of Health 845-360-6681 moakes@orangecountygov.com

Barbara Demundo, St. Anthony Community Hospital 845-368-5545

Barbara Demundo@bshsi.org

Kate Dabroski, Montefiore St. Luke's Cornwall 845-784-3850 kdabroski@montefioreslc.org

Focus Area 2: Physical Activity

Lauren Buda, Orange County Department of Health 845-360-6683 lbuda@orangecountygov.com

Jessica Ridgeway, Orange County Department of Planning 845-615-3853 jridgeway@orangecountygov.com

Focus Area 3: Tobacco Prevention

Danielle Moser, Orange County Department of Health 845-360-6689 dmoser@orangecountygov.com

Amanda Langseder, Orange Regional Medical Center 845-794-3300 ext. 2187 alangseder@ghvhs.org

Focus Area 4: Preventative Care and Management

Jackie Lawler, Orange County Department of Health 845-615-3884 <u>jlawler@orangecountygov.com</u>

Danielle Moser, Orange County Department of Health 845-360-6689 dmoser@orangecountygov.com

Communicable Disease

Focus Area 2: HIV

Kaitlin Cafferky, Orange County Department of Health 845-360-6541

kcafferky@orangecountygov.com

Focus Area 3: Sexually Transmitted Infections

Kaitlin Cafferky, Orange County Department of Health 845-360-6541

kcafferky@orangecountygov.com

Jackie Lawler, Orange County Department of Health 845-615-3884

jlawler@orangecountygov.com

Kate Dabroski, Montefiore St. Luke's Cornwall Hospital 845-784-3850

kdabroski@montefioreslc.org

Community Health Improvement Plan/ Community Service Plan

Implementation Strategy Report:

The significant needs to be addressed by Montefiore St. Luke's Cornwall, focusing on Orange County and specifically the hospital's Primary Service Area inclusive of the City of Newburgh, are broken down in the following two Priority Areas:

Priority Area 1: Prevent Chronic Disease:

Montefiore St. Luke's Cornwall will focus on preventative care and management with an effort to promote evidence-based care to prevent and manage chronic diseases including Cardiovascular disease, COPD, Diabetes and prediabetes as well as asthma. The MSLC team already has many systems in place to address these areas.

Focus Area 4: Preventative Care and Management

Goal 4.3: Promote evidence-based care to prevent and manage chronic diseases including asthma, cardiovascular disease, diabetes and prediabetes.

The MSLC Care Transitions Program uses the Coleman Model of Care, ensuring that they receive the proper follow up care when discharged from the hospital. Our team works closely to continue to manage the patients' needs in the community, ultimately preventing them from returning to the hospital for chronic illness.

Congestive Heart Failure: In late 2018, Montefiore St. Luke's Cornwall developed the Congestive Heart Failure Clinic. The MSLC Congestive Heart Failure Clinic assists patients with lifestyle management tools, health education, support and coaching to prevent and manage the disease. The goal of this clinic is to educate patients on self-management skills and strategies, giving them a better understanding of their chronic disease, triggers and symptom management to stay healthy and avoid preventable hospital admissions. Our team of health care professionals provides patients and their family members with all the necessary tools and information to help maintain one's best level of health. Benefits of the CHF Clinic will assure that our team works closely with your physician, providing updates and collaborating to decide on the best course of action to help you maintain health. Each patient's clinic visits are for a 5-week period and provide weekly health screening, as well as a personalized care plan. The MSLC CHF team includes MSLC Care Transition Nurses, Pharmacist, Nutritionist, Cardiac Rehab/PT Staff, and Social Workers. The most important part of this clinic is teaching patients how to participate in their care. For those with CHF, patients need to assist the health care team in preventing their CHF symptoms from worsening. In the first 12 months of the clinic, MSLC has seen 37 patients in the clinic, and 27 of those patients have graduated from the course. MSLC will work to increase these numbers in an effort to reduce the number of patients ultimately readmitted to the hospital due to CHF related symptoms and complications.

Objective 1: By December 31, 2021, increase the percentage of adults with Cardiovascular Disease who have taken a course on self-management to learn how to learn how to manage their condition by 15% of baseline. (2019 Baseline = 37 patients)

Intervention 1: Increase the number of patients referred to the MSLC Congestive Heart Failure Self-Management Course by raising awareness and educating hospital discharge planners and cardiologists. The 5-week course meets every Wednesday on MSLC's Newburgh campus. At the end of each enrollee's 5th week they graduate from the class. The class is taught by MSLC Care Transitions, Pharmacy, Dietary, and Physical Therapy staff.

Family of Measure 1: The number of patients enrolled in the MSLC CHF self-management course as compared to the 2019 baseline.

Chronic Obstructive Pulmonary Disease: In 2019, Montefiore St. Luke's Cornwall developed the COPD Academy. The COPD Academy was created when MSLC realized, through a high readmission rate for patients with COPD, that patients may not be receiving all necessary resources post-discharge. The intent of the academy is to provide education to patients and their caregivers, do a full medication reconciliation, and utilize care transition resources to address any shortfalls. The MSLC COPD Academy meets every Wednesday at 10 a.m. and a multidisciplinary team works with each patient to discuss medication management, food and nutrition along with physical activity. Attendance to date has been smaller than we'd like even with extensive marketing and outreach efforts, and this will be a key focus moving forward. As part of the 2019-2021 Community Service Plan, Montefiore St. Luke's Cornwall will work to increase the percentage of adults enrolled in our "COPD Academy" to increase the number of patients able to manage their condition.

Objective 2: By December 31, 2021, increase the percentage of adults with Chronic Obstructive Pulmonary Disease (COPD) who have taken a course on self-management to learn how to manage their condition by 15% of baseline (2019 Baseline = 7 patients).

Intervention 2: Increase the number of patients referred to the MSLC COPD Clinic, by raising awareness and educating hospital discharge planners and pulmonologist. This course is two weeks long and meets every Wednesday. Education will be done by the Director of Case Management, and the MSLC Care Transition team. The class includes respiratory, nursing, care transitions and pharmacy staff.

Family of Measure 2: The number of patients enrolled in the MSLC COPD self-management course as compared to the 2019 baseline.

Diabetes: As part of its ongoing effort to provide disease prevention and population health programs to the residents of the Hudson Valley, Montefiore St. Luke's Cornwall offers an ongoing Center for Disease Control Diabetes Prevention Program. People at least 18-years-old who have a Body Mass Index equal to or greater than 24, have no previous Type 1 or Type 2 diabetes diagnosis, and meet certain other risk factor requirements may be eligible to enroll in the program. The year-long curriculum includes information about eating healthy while still enjoying certain foods, adding physical activity to an already busy schedule, dealing with stress, coping with challenges and making good choices even after straying from the prescribed plan. The diabetes management program offered by Montefiore St. Luke's Cornwall staff empowers patients to understand and live with the disease. While careful monitoring and certain adjustments are necessary, many diabetics lead fun and active lifestyles.

The team approach helps patients understand all the factors that go into managing the day-to-day realities of living with diabetes. The program is recognized by the American Diabetes Association and is covered by most health insurance plans. Additional information about the eight-hour Diabetes Self-Management Education class, can be found at https://bit.ly/SLCHDiabetesSelfMgmt. Montefiore St. Luke's Cornwall will continue to increase outreach efforts to boost enrollment in this class. Important statistics of note include that MSLC more than doubled the number of patients enrolled in American Diabetes Association-certified Diabetes Self-Management Program from 2017-18 (30 in 2017; 74 in 2018). As part of the 2019-2021 Community Service Plan, MSLC will work to increase the number of patients referred to the Diabetes Self-Management course.

Objective 3: By December 31, 2021, increase the percentage of adults with diabetes who have taken a course on self-management to learn how to manage their condition by 15% of baseline. (2019 Baseline = 101 patients).

Intervention 3: Increase the number of patients referred to the MSLC Diabetes Self-Management Course, by raising awareness with hospital discharge planners, nursing and endocrinologists. The course is a total of 8 hours and taught by two certified diabetes educators.

Family of Measure 3: The number of patients enrolled in the MSLC diabetes self-management course as compared to the 2019 baseline.

Projected Year 1 Intervention: Increase the number of patients enrolled in the MSLC Diabetes self-management course by 5% as compared to the 2019 baseline.

Pre-Diabetes:

In 2019, MSLC developed the Pre-Diabetes education program, which is a Center for Disease Control regulated Diabetes prevention program geared toward those who are:

- Are at least 18 years old AND
- Are overweight (Body Mass Index ≥ 24 or ≥ 22 if of Asian descent) AND
- Have no previous diagnosis of Type 1 or Type 2 Diabetes AND
- Have a blood test result in the prediabetes range with the past year OR
- Be previously diagnosed with gestational diabetes OR
- Have a positive screening score on the American Diabetes Association
- Type 2 Diabetes Risk Test or on a claims-based risk test.

This program meets weekly and with a certified diabetes educator by appointment. MSLC will work to increase the percentage of those enrolled in the pre-diabetes self-management course. (2019 Baseline = 11 patients)

Objective 4: By December 31, 2021, increase the percentage of adults with pre-diabetes who have taken a course on self-management to learn how to manage their condition by 15% of baseline.

Intervention 4: Increase the number of patients referred to the MSLC pre-diabetes Self-Management Course, by raising awareness and educating hospital discharge planners, nursing staff and endocrinologists. The course is a total of xx hours. The course is taught by two certified diabetes educators.

Family of Measure 4: The number of patients enrolled in the MSLC pre-diabetes self-management course as compared to the 2019 baseline.

Asthma: In 2015, St. Luke's Cornwall began working with the American Lung Association and Healthy Neighborhoods (which is part of the Orange County Department of Health) to address the high rates of Asthma identified in Orange County and specifically at Montefiore St. Luke's Cornwall. We created the Asthma Coalition inclusive of Respiratory Therapy, Case Management, Nursing and Emergency Department staff. Additionally, the hospital, through grant funding supplied by the American Lung Association was able to send these teams to become Certified Asthma Educators. MSLC continues to work closely with the American Lung Association. At the inception of the asthma program the team identified a cohort of 53 patients who had presented to the Emergency Department for two or more asthma related visits in the prior year. Every time that these patients presented, the MSLC Emergency Department team would give an asthma action plan and educate the patients to improve self-management of the disease. Through the efforts of the team there was a reduction of this cohort by 78%. This show-cased that the MSLC team could use this roadmap to continue to reduce Emergency Department visits with a primary diagnosis of asthma. Throughout the course of the 2019-2021 Community Service Plan, Montefiore St. Luke's Cornwall will work to continue to increase the number of patients receiving an Asthma Action Plan to improve the overall number of patient's ability to self-manage the disease, and ultimately result in a continued reduced rate of Emergency Department visits with a primary diagnosis of Asthma.

Objective 5: By December 31, 2021, decrease the Emergency Department visits with a primary diagnosis of Asthma by 7%.

Intervention 5: Increase the number of patients receiving an Asthma Action Plan, to improve the patient's self-management of the disease.

Family of Measure 5: The number of patients presenting to the Emergency Department with a primary diagnosis of Asthma.

Projected Year 1 Interventions: In 2019, MSLC will work to increase the number of patients enrolled in the CHF self-Management Course, COPD self-Management Course, Diabetes self-management course, and prediabetes self-management course by 5%. Additionally, the MSLC team will focus on decreasing the number of Emergency Department Visits with a primary diagnosis of Asthma by 3% of the baseline.

Projected Year 2 Interventions: In 2020, MSLC will work to increase the number of patients enrolled in the CHF self-Management Course, COPD self-Management Course, Diabetes self-management course, and prediabetes self-management course by 10%. Additionally, the MSLC team will focus on decreasing the number of Emergency Department Visits with a primary diagnosis of Asthma by 5%.

Projected year 3 Intervention: In 2021, MSLC will work to increase the number of patients enrolled in the CHF self-Management Course, COPD self-Management Course, Diabetes self-management course, and prediabetes self-management course by 15%. Additionally, the MSLC team will focus on decreasing the number of Emergency Department Visits with a primary diagnosis of Asthma by 7%.

Partner Roles and Resources: MSLC will partner with a variety of community resources to accomplish the goals outlined above including our own Cardiovascular Team, Emergency Department Staff, Nursing Leadership, the MSLC Care Transitions Team, The Montefiore Hudson Valley Collaborative, Hospital and Community Based Pharmacists, Registration Staff, The American Lung Association and the Orange County Department of Health

Goal 4.1: Increase Cancer Screening Rates: MSLC will work collaboratively with the Orange County Health Department and several other community partners to increase cancer screening rates for breast, cervical and colorectal cancers, especially among disparate populations in the cities of Newburgh, Middletown and Port Jervis. The objective identified below and our ongoing workplan will be a collective effort among all involved. While many of the initiatives will not be solely occurring within Montefiore St. Luke's Cornwall campuses, we have an active seat at the table and will be contributing heavily.

Collaborative Objective: By December 31, 2021, increase the percentage of adults receiving breast cancer, cervical, and colorectal cancer screenings based on the most recent screening guidelines for Breast Cancer Screening by 5% from 74.5% to 78.2%; for Cervical Cancer Screening by 5% from 85.7% to 90% and for Colorectal Cancer Screening by 5% from 71% to 74.6%. (Data source: NYS Behavioral Risk Factor Surveillance Survey, 2016)

Intervention 1: Use small media and health communications to build public awareness and demand through the following:

- Developing one consistent branded message across all entities to increase cancer screening awareness months for breast, cervical and colorectal cancers (October, January and March respectively);
- Work collaboratively to create poster designs for public health awareness campaign and messaging for breast, cervical and colorectal cancers;
- Evaluate how patients have learned about cancer screenings in 2019 through surveys (i.e. newspaper, mailings, flyers, word of mouth, social media, healthcare provider, other)

Family of Measures:

- Number and type of locations where posters were distributed
- Number of calls received about screening due to campaign
- Number of designs submitted for consideration for breast, cervical and colorectal cancer posters
- Number of completed surveys
- Percentages of how patients found cancer screenings by type

Projected Year 1 Intervention: By October 2019, create the infrastructure for a shared calendar for the collaborative to share events for Breast, Cervical and Colorectal Cancer awareness. By December 2019, develop one consistent branded message for breast and cervical cancer awareness posters. *This was completed for Breast Cancer in October and distributed throughout the MSLC communication channels.

Projected Year 2 Intervention: By January 2020, determine percentages of how patients found cancer screenings by type. By March 2020, develop one consistent branded message for colorectal cancer awareness posters. By December 2020, complete one full year of awareness campaigns as a collaborative in January, March and October.

Projected Year 3 Intervention: Continue utilizing the same consistent Orange County Cancer Screening Collaborative branded message for each awareness campaign.

Intervention 2: Link patients with primary care and ensure access to health insurance to reduce barriers to cancer screenings through the following:

- Surveying patients from other healthcare facility-sponsored events to establish a baseline of patients with health insurance and whether they have a primary care provider (PCP)
- Utilizing in-house urgent care facilities (where applicable) to make referrals to primary care
- Primary care provider outreach to the community

Family of Measures:

- Number of survey participants
- Percentage of patients with a Primary Care Provider
- · Percentage of patients with health insurance
- Number/Percentage of patients referred to primary care
- Number and type of events where providers were in the community
- Number of attendees at each event

Projected Year 1 Intervention: By December 2019, determine a proxy baseline of residents with a primary care provider and health insurance for targeted population.

Projected Year 2 Intervention: By January 2020, determine baseline of primary care provider outreach events. By December 2020, increase the number of primary care provider outreach events collectively by Orange County Cancer Screening Collaborative participants by 5%.

Projected Year 3 Intervention: By January 2021, determine baseline of urgent care referrals to primary care. By December 2021, increase the percentage of urgent care referrals made to primary care (where applicable). Percentages to be determined in January 2021.

All progress will be reported on a quarterly basis to the Orange County Department of Health and annually to the New York State Department of Health.

Focus Area 1: Healthy Eating and Food Security

Goal 1.1 Increase access to healthy and affordable foods and beverages

With a population of 31% below the poverty line, many MSLC patients are homeless with limited access to available resources to help lead a healthy lifestyle. In 2019, the MSLC Case Management Department has referred 156 patients (annualized baseline number) to the food pantry that exists within our Newburgh campus. This food pantry was created as the result of a high volume of patients presenting to the ED complaining of abdominal pain among other issues associated with hunger. Led by our ED and Case Management Department, the MSLC food pantry was created, and aims to send those with food insecurity home with non-perishable foods and other hygiene items to help bridge the gap until their next encounter with other community resources. MSLC aims to increase our screening methods to include a drop down in the Meditech System (the current patient electronic health records program) to prompt providers to pose the question of food insecurity to patients. This data entry will then trigger referral to the MSLC Food Pantry. As a result, MSLC will be collectively increase our outreach efforts to collect for our food pantry, which is currently happening twice per year. Throughout the course of the 2019-2021 Community Service Plan, MSLC will increase the number of food drives taking place to help increase donations. These donations come from hospital staff and community members. Providers will also be equipped with additional community resources to refer patients to.

Of note, in 2019, NBC News 4 out of New York City visited Montefiore St. Luke's Cornwall to highlight the hospital's food pantry and the service provided to the community to address Food Insecurity. The news clip can be viewed here: https://www.nbcnewyork.com/on-air/as-seen-on/NY-Hospital-Stocks-Shelves-to-Help-Fight-Hunger_New-York-508456772.html

Objective 1: Improve screening methods to identify patients with food insecurity.

Intervention 1: Create an electronic screening question that will trigger case management to address need.

Family of Measure 1: The creation of the electronic screening tool in MSLC's Meditech system. Projected Year 1 Intervention: Complete the creation of the electronic screening by December 31, 2019.

Objective 2: To increase the number of patients identified with food insecurity, and refer such patients to the MSLC Food Pantry and other community resources

2019 annualized Baseline is 156 patients.

Intervention 2: Connect identified patients to the MSLC Food Pantry and Community Resources

Family of Measure 2: Increase the number of patients screened and referred to MSLC Food Pantry and other resources.

Objective 3: In anticipation of greater utilization of MSLC Food Pantry, increase the quantity of available food resources.

Intervention 3: Increase the availability of food in the MSLC food Pantry.

Family of Measure 3: Increase the amount of MSLC Food Drives annually.

Projected Year 1 Intervention: In 2019, MSLC has added a food security question to the Meditech screen, completing the creation of an electronic screening tool by December 31, 2019. Additionally, increase the number of patients screened and referred to MSLC Food Pantry and other resources by 10% of 2019 baseline of 156 patients. MSLC will also Increase the number of MSLC Food Drives from annually to biannually—we held one in April 2019 and another is underway through the months of November-December.

Projected Year 2 Intervention: In 2020, MSLC will aim to increase the number of patients screened and referred to MSLC Food Pantry and other resources by 15% of 2019 baseline of 156 patients annualized. This will be done through the use of the electronic screening tool and further outreach to community partners. MSLC will also add a third food drive to our list of initiatives to increase the supply available to our patients.

Projected Year 3 Intervention: In 2021, MSLC will aim to Increase the number of patients screened and referred to MSLC Food Pantry and other resources by 20% of 2019 baseline of 156 patients annualized. This will be done through the use of the electronic screening tool and further outreach to community partners. MSLC will also move to quarterly food drives to increase the supply available to our patients.

Partner Roles and Resources: MSLC will partner with other community-based organizations in the City of Newburgh, Town of Newburgh, Cornwall and New Windsor to increase the volume of donations and available resources. We will work with the Orange County Health Department to adopt policies and procedures to support active connection to SNAP and WIC agencies. These partners will include hospital employees, local business, patients and visitors of MSLC, the Orange County Health Department, and several of the local health department sub groups such as Healthy Orange.

Its important to note that as a member of the Montefiore Health System, MSLC will also be working collaborative with our collective partners within Montefiore Medicine to achieve all of the above.

PRIORITY AREA 2: Prevent Communicable Disease:

Montefiore St. Luke's Cornwall will be working with community partners to reduce the annual rate of growth for Sexually Transmitted Infections. There has been a significant increase in STIs in Orange county and MSLC has seen this increase first hand in both the presentations to the Emergency Department as well as the Labor and Delivery Unit.

Focus Area 3: Sexually Transmitted Infections (STIs)

Goal 3.1: Reduce the annual rate of growth for STIs

Objective 1: Collaborate with Local Health Department and other Community Partners in efforts to identify and decrease transmission of STIs.

Intervention 1: Partner with the Local Health Department to provide in-person education to local hospital emergency departments and Labor and Delivery Staff about the recommended guidelines on screening and treatment for STIs.

Family of Measure 1: Number or Provider education sessions at the Hospital.

Projected Year 1 Intervention: Meet with community partners to develop a plan to measure data and setup educational meetings with clinicians.

Objective 2: Educate provider staff with emphasis in ED and L & D, regarding appropriate screening and treatment of high-risk population.

Intervention 2: Expand STI Testing to include HIV and RPR screening to ensure patients are not only tested, but also treated appropriately for chlamydia, gonorrhea, syphilis and HIV.

Family of Measures:

- Number of patients tested for chlamydia, gonorrhea, HIV and syphilis.
- Number of patients positive for chlamydia, gonorrhea, HIV and/or syphilis
- Number of patients appropriately treated for chlamydia, gonorrhea, HIV and/or syphilis

Projected Year 1 Intervention: In Year 1, MSLC will focus on implementing new lab testing to further enhance the speed at which results are provided back to patients, which is often in the ED. In 2019, MSLC is also screening for HIV, Gonorrhea, Syphilis, and Chlamydia, often with a less than 2-hour turnaround time.

- Implementation of new lab testing methodology resulting in rapid turnaround results.
- Current testing for STIs in progress including screening for HIV, Gonorrhea, Syphilis, Chlamydia by Emergency Department Provider Staff.

Projected Year 2 Intervention: In year 2, MSLC will focus on increasing the compliance of appropriate screening and testing for the at-risk population, along with treatment of those who test positive for STIs by 20%. Additionally, we will continue the discussion between our community partners, including the Orange County Department of Health to address any ongoing areas of improvement.

1. Increase compliance for appropriate screening and testing of at-risk groups by 20%.

Baseline number of patients screened for syphilis: 1154 (RPR) screenings and 738 Cord Blood RPR tests

Baseline number of patients screened for Gonorrhea/Chlamydia: 436

2019 MSLC Data is Baseline.

2. Increase number of patients treated appropriately for positive STI's by 20% (Baseline numbers are from MSLC 2019 ED and Inpatient Data)

Baseline for Syphilis: 67% of patients in the ED and 100% of patients Inpatient were treated appropriately.

2019 Baseline for Chlamydia: 70% in the ED and 66% inpatient were treated appropriately

2019 Baseline for Gonorrhea: 80% in the ED and 100% inpatient were treated appropriately.

3. Continue collaboration with community partners to discuss areas of opportunity for improvement of the program.

Projected Year 3 Intervention: In year 3, MSLC will focus on increasing the compliance of appropriate screening and testing for the at-risk population, along with treatment of those who test positive for STI's by 30%. Additionally, we will continue the discussion between our community partners, including the Orange County Department of Health to address any ongoing areas of improvement.

- 1. Increase compliance for appropriate screening and testing of at-risk groups by 30%.
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MSLC will partner with the Orange County Department of Health, Bon Secours Community Hospital, Cornerstone Family Healthcare, Orange Regional Medical Center, and our own Emergency Department Practitioners along with Labor and Delivery Staff at Large along with other clinical disciplines as necessary to achieve these goals. The other hospitals mentioned above are also reporting similar data to the Orange County Department of Health in the setting of focus groups to collectively work with MSLC to lower the rates of STIs in Orange County.

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The excel grid is attached to this document.

Thank you for your time and consideration in reviewing Montefiore St. Luke's Cornwall's Community Service Plan.