

MONTHLY CASE REPORT FOR EXTERNAL USE

MONTH OF: SEPTEMBER 20TH, 2021 - OCTOBER 18TH, 2021

Key Takeaways	2
1.0 COVID-19 SNAP SHOT	4
1.1 Total Tests and Percent Positivity by Modality in Richmond and Henrico	4
1.2 Confirmed & Probable Cases, Hospitalizations & Fatalities by County	4
1.3 Current COVID-19 Richmond Catchment Area Hospitalizations	5
2.0 COVID-19 TESTING ENCOUNTERS AND POSITIVITY	6
2.1 Testing Summary	6
2.2 Number of PCR Tests Relative to Statewide Testing Goal	6
3.0 COVID-19 CASES	7
3.1 Summary of Cases	7
3.2 Case Reports Trends By Date (Source-VDH Website)	8
3.3 Cases by Age Group by County	10
3.4 Cases and Population Proportions by Race and Ethnicity by County	12
4.0 COVID-19 HOSPITALIZATIONS & FATALITIES	14
4.1 Summary of Hospitalizations & Fatalities	14
4.2 Hospitalizations & Fatalities by Sex, Race, and Age by County	14
4.3 COVID-19 Hospitalization, ICU, and Ventilator Utilization (VHASS)	15
5.0 VACCINATION	16
5.1 Vaccine Summary	16
5.2 Percentage of Vaccination Goals Reached by Population	16
5.3 Vaccinations by Locality as of October 19th, 2021	17
5.4 Vaccine Distribution by Age Group over Time	18
5.5 Vaccine Distribution by Race/Ethnicity over Time	20
5.6 Census Tract Maps of Vaccine Uptake	22
Cumulative COVID-19 Cases and Lowest Percent Vaccinated by Census Tract -- Oct 18th, 2021	23
Social Vulnerability Rank and Lowest Percentage Vaccinated by Census Tract in -- Oct 18th, 2021	24

Key Takeaways

Cases

Following increases during the month of August, and despite brief plateaus during the first half of September, cases in both districts have shown an overall decrease over the past few weeks. Community transmission is considered **High** according to the [CDC Covid Data Tracker](#).

7-day total case rate per 100,00		
District	This Week	4 weeks ago
Henrico	142.37	239.41
Richmond	135.83	306.38

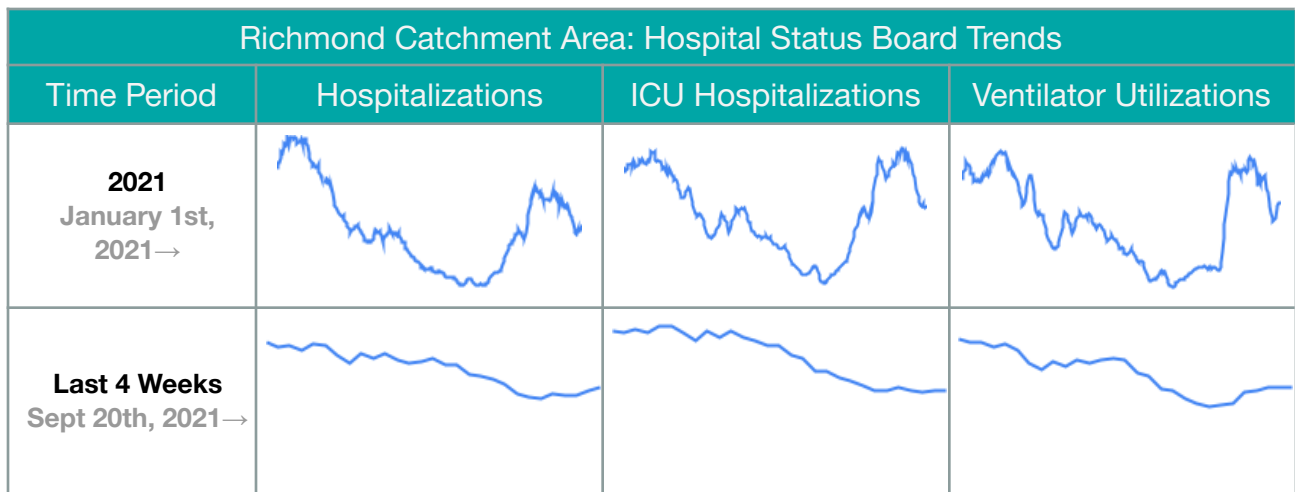
Richmond & Henrico		
Demographic	Cumulative Highest	Last 4 Weeks Highest
Age	20-29 Year Olds 80+	0-20 Year Olds
Sex	Female	Female
Race	Black	Black

Hospitalizations & Fatalities

After upticks in August and early September, **hospitalizations** have begun to decrease throughout the month of October within both counties (based on VEDSS data, which is subject to lags in data reporting)

Minor upticks in **fatalities** in Richmond throughout August and September, but deaths in Henrico have remained relatively low and stable. *Hospitalizations & Deaths by subgroup (sex, age, and race) are reported on a monthly basis. Data may be impacted by a lag in reporting.*

Cumulative Demographic Trends				
Demographic Measure	Hospitalizations		Fatalities	
	Richmond	Henrico	Richmond	Henrico
Age	61 (0-98)	67 (0-104)	76 (3-98)	80 (18-106)
Sex	Female	Female	Females	Female
Race	Black	Black	Black	White



- **9 out of 11 hospitals in the Richmond Catchment Area are operating at a 'Normal' clinical status. 2 are operating at "full" status*

Vaccinations

Richmond and Henrico Health Districts are in Phase 2 of vaccination; anyone 12 or older is eligible to receive a vaccine. Health Department events/providers appear to be administering the largest percentage of vaccines to Richmond and Henrico residents, compared with other providers.

Local Vaccination Stats & Regional Comparison		
Location	≥ 1 Dose	Complete
Richmond & Henrico	61.0%	55.8%
Region	61.9%	56.9%

Vaccination Demographic Trends		
Demographic	Richmond	Henrico
Age Groups	65+	30+
Sex	Female	
Race	Asian/Pacific Islander & Latino	

In both Richmond and Henrico, older age groups have consistently been vaccinated at a higher rate than younger age groups. Vaccination rates are still lowest among African Americans. The Vaccination Section includes an estimated breakdown of vaccination uptake by race and age subgroups.

1.0 COVID-19 SNAP SHOT

1.1 Total Tests and Percent Positivity by Modality in Richmond and Henrico

Total tests by testing modality and the associated 7-day average in percent positivity are summarized in the table below. Data is from the [VDH public dashboard](#) on October 19, 2021.

	Richmond		Henrico	
	Tests	Positivity	Tests	Positivity
PCR*	319,134	4.3%	494,607	5.2%
Antigen	81,995	5.0%	159,366	5.5%
Total (PCR, antigen, and antibody)	406,286	4.7%	664,905	5.6%

**All testing metrics included in previous reports have been based on PCR tests*

1.2 Confirmed & Probable Cases, Hospitalizations & Fatalities by County

CASE STATUS	RICHMOND CITY	HENRICO COUNTY	VIRGINIA
New cases this month	1534	2034	71742
New cases this week (October 18)	121	241	12263
All cases	23458	33701	907882
Confirmed cases	18397	23737	675975
Hospitalizations	900	1185	35829
Deaths	285	627	11346
Probable cases	5061	9964	231907
Hospitalizations	24	53	2136
Deaths	48	76	2140
Case rate per 100,000	10179.8	10187.2	10636.5

Population totals are based on 2019 data from the National Center for Health Statistics (NCHS). Please note- this is a change from some previous reports which used aggregated Census data regarding population by age group.

*Case rate refers to the number of cases per 100,000 people in the population. Calculation: ((Confirmed Cases + Probable Cases)/Population Estimate)*100,000*

1.3 Current COVID-19 Richmond Catchment Area Hospitalizations

The following section utilizes data from the Virginia Healthcare Alerting & Status System (VHASS) COVID-19 Hospital Status Board. This data reflects the following hospitals in the Richmond Catchment Area (Chesterfield County, Hanover County, Henrico, & Richmond): VCU Health System, Retreat Doctors', Bon Secours Community, CWJ Chippenham, CWJ Johnson Willis, VA Medical Center, Bon Secours St. Mary's, Henrico Doctors, and Parham Doctors, Bon Secours St. Francis, and Memorial Regional Medical Center.

	TOTAL IN USE FOR COVID-19	CURRENTLY AVAILABLE
Confirmed Hospitalizations	216	80
Pending Hospitalizations	23	
Confirmed - ICU	49	25
Pending - ICU	6	
Confirmed - Ventilators	194	269
Pending - Ventilators	*	

Within these 11 hospitals that comprise the Richmond catchment area, there are currently 80 total available hospital beds, 25 available adult ICU beds, and 269 available ventilators. Based on the VHASS hospital dashboard on October 19th, 2021, 9 hospitals in the Richmond Catchment area are operating at normal clinical status. Both CJW Johnston Willis and Parham Doctors Hospital are operating at full clinical status.

**A clinical status of "normal" indicates that hospital clinical resources are operating within normal conditions. A clinical status of "full" indicates that hospital clinical resources are exceeded and acceptable care cannot be provided to additional patients. Diversion or Community surge response is required.*

2.0 COVID-19 TESTING ENCOUNTERS AND POSITIVITY

2.1 Testing Summary

PCR percent positivity in Richmond has decreased to 4.3% from 11.3%, with the highest values found in zip codes 23223, 23225, and 23222. Percent positivity also decreased in Henrico 5.2% from 7.8%, with the highest values found in zip codes 23150 and 23075. The number of PCR tests administered across providers has also risen notably in Henrico in the last two months, compared to the preceding three months. Testing has increased in Richmond, particularly in 23226. 23220 and 23219 in Richmond, and 23230 and 23227 in Henrico had the highest testing rate per ZCTA population, consistent with the last 6 months.

2.2 Number of PCR Tests Relative to Statewide Testing Goal

The counts below are based on the total number of testing encounters provided by the Virginia Department of Health for Richmond and Henrico. **It is important to note that the number of testing encounters is different from the number of people tested, as some individuals may be tested more than once.**

MONTH	TOTAL PCR TESTS/MONTH	
	Richmond	Henrico
October 2021	12,709	13,995
September 2021	24,905	28,612
August 2021	22,383	24,943
July 2021	11,206	13,790
June 2021	9,370	12,128
May 2021	11,891	13,959
April 2021	16,944	20,132
March 2021	22,231	27,164

The testing date was not reported for 483 PCR testing encounters in Richmond and not reported for 909 PCR testing encounters in Henrico, inclusive of all PCR tests since January 2020.

3.0 COVID-19 CASES

3.1 Summary of Cases

Following increases during the month of August, cases in both districts have appeared to plateau during the first half of September and then decrease over the past few weeks. In Richmond, the current 7-day total case rate is 135.83 new cases per 100,000 population, down from a value of 306.38 four weeks ago. In Henrico the 7-day total case rate is currently 142.37 new cases per 100,000 population, down from a value of 239.41 four weeks ago. Additionally, in both Richmond and Henrico, the level of community transmission is considered **High** according to the [CDC Covid Data Tracker](#).

Female individuals in both Richmond and Henrico comprise a higher proportion of cases compared to male individuals, both in the last month and cumulatively.

In Richmond, 20-29 year olds continue to have the highest case rate by age group overall, but over the last four weeks, individuals aged 0-9 and 10-19 have shown the highest case rates by age group. Meanwhile, in Henrico, individuals over the age of 80 years show the highest cumulative case rate, whereas over the past four weeks, the highest case rates can also be observed in individuals aged 0-9 and 10-19.

Regarding race and ethnicity, in Richmond, the highest proportion of cases is still among Black individuals, again both cumulatively and in the last 4 weeks. In Henrico, cumulatively White individuals comprise the highest case burden, but the case burden among Black individuals has been highest over the last four weeks.

3.2 Case Reports Trends By Date (Source-VDH Website)

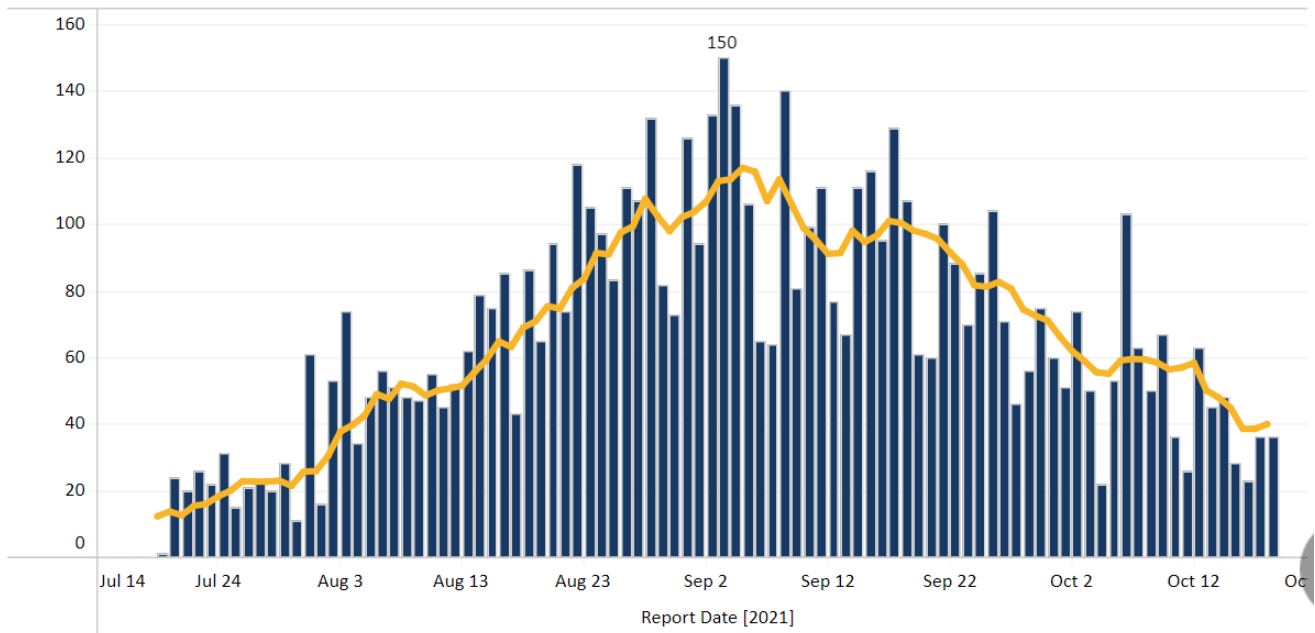
NOTE: Data quality control efforts over the last few weeks have led to the retroactive district reassignment of previously reported cases, sometimes leading to "negative" cases on a given day in Richmond or Henrico when the number of cases move to another district is greater than the combination of cases moved to Richmond or Henrico along with the new cases reported on that day.

Number of New Cases Reported^	7-Day Average Number of Daily New Cases Reported	7-Day Average Number of New Daily Cases Reported, Rate per 100,000 Population	Total Number of New Cases per 100,000 Population within last 14 days
36	40	17.4	295.9

Report Date Daily Cases Counts for past 90 Days
Richmond City

Select Date Range (Affects Bar Chart)

Past 90 Days



- In Richmond, from the middle of July through late August, daily new cases generally increased.
- The number of daily new cases reported from late August to September spiked significantly, with some fluctuations.
- Starting in September, however, cases began to decrease throughout the month of October.
- All data is subject to lags in reporting.

Number of New Cases
Reported^

32

7-Day Average Number of
Daily New Cases Reported

64

7-Day Average Number of
New Daily Cases Reported,
Rate per 100,000 Population

19.4

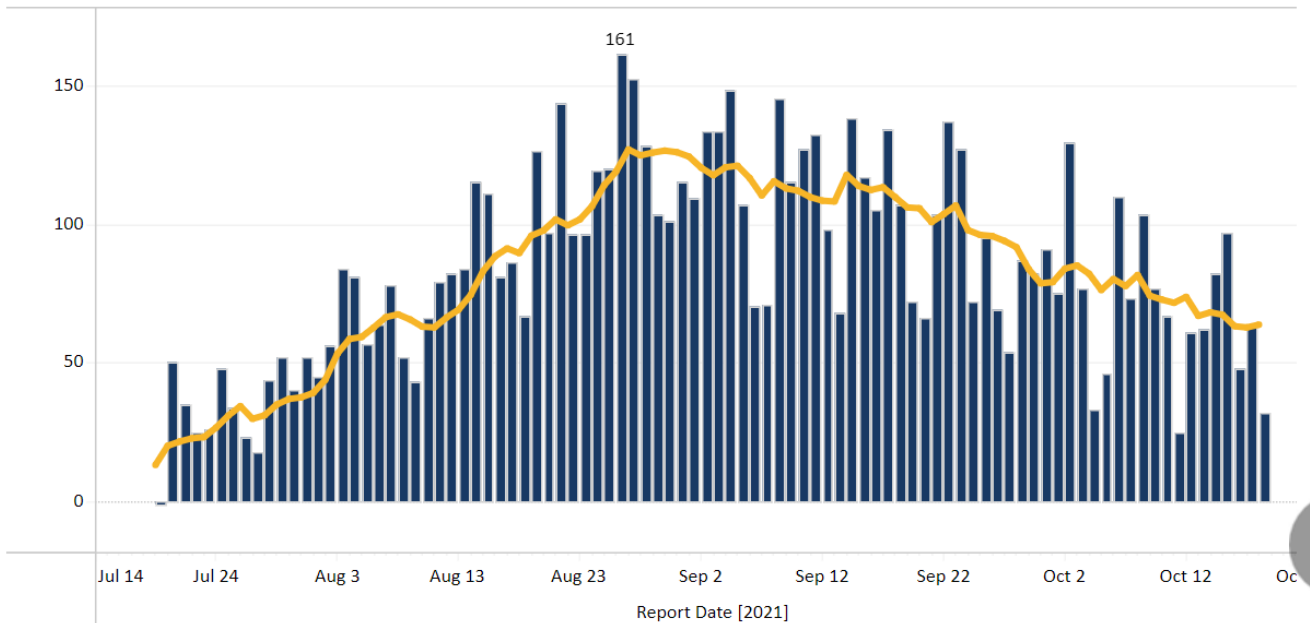
Total Number of New Cases
per 100,000 Population
within last 14 days

287.6

Report Date Daily Cases Counts for past 90 Days
Henrico

Select Date Range (Affects Bar Chart)

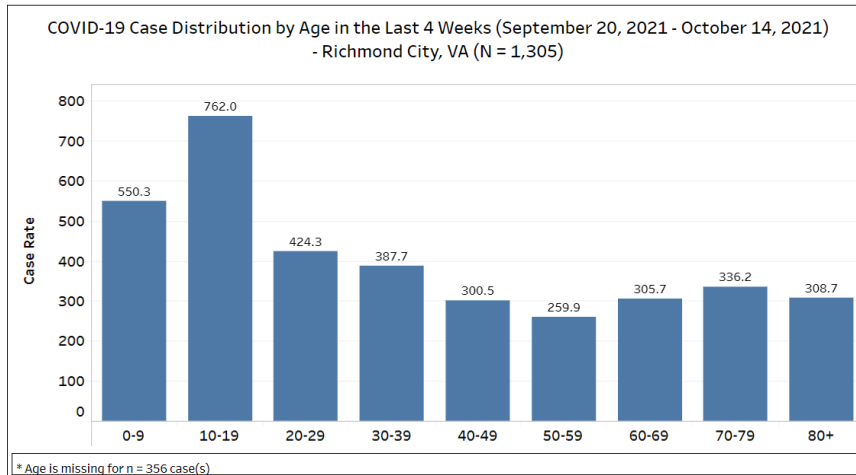
Past 90 Days



- In Henrico, the number of new cases reported per day has also been fluctuating due to recent efforts to reallocate older cases to appropriate localities.
- From the middle of July through late August, daily new cases generally increased. During the last week of August into September, cases began to decrease. During the month of October cases continued to decrease/plateau.
- All data is subject to lags in reporting.

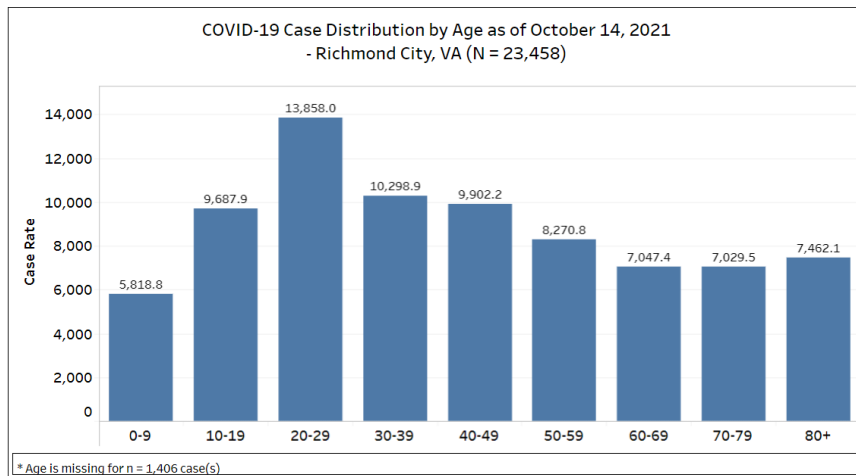
3.3 Cases by Age Group by County

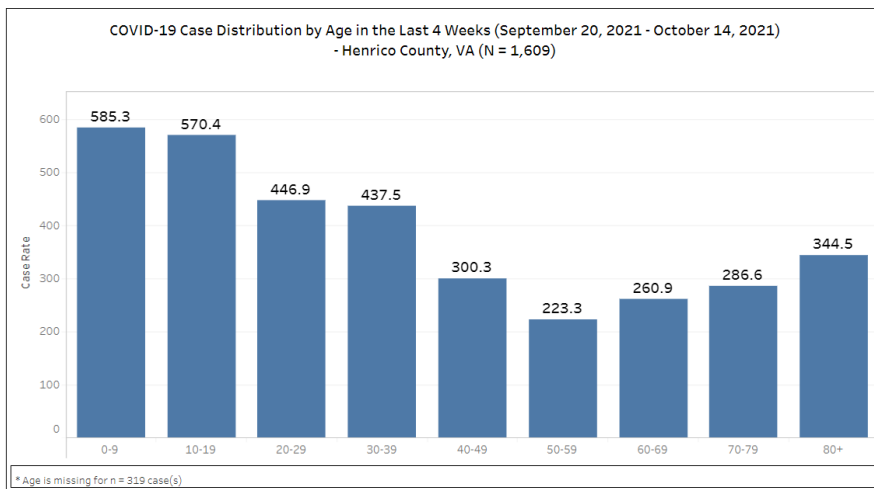
Population totals are based on 2019 data from the National Center for Health Statistics (NCHS).



In Richmond City, individuals aged 10-19 have the highest case rates in the last four weeks, followed by individuals aged 0-9. Individuals aged 20-29 have the highest case rate cumulatively.

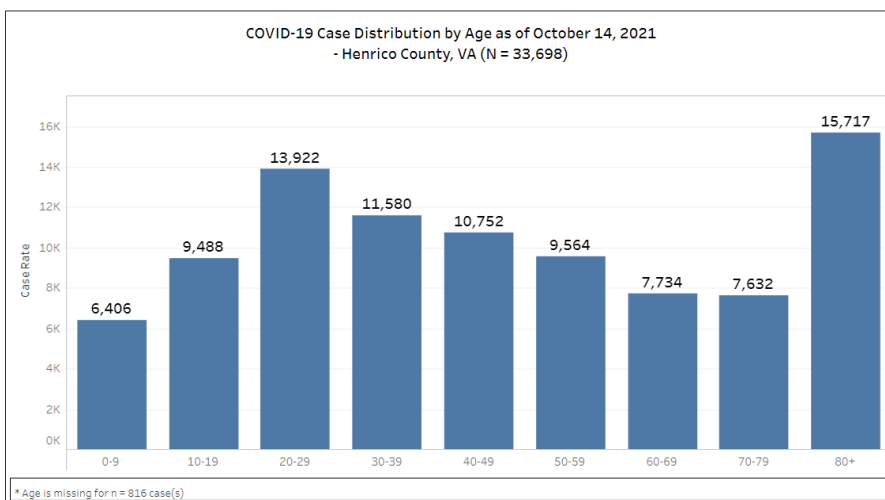
Case burdens for individuals 50 and over are notably down in the last four weeks compared to cumulatively.





In Henrico, case rates over the past four weeks show a high frequency of cases occurring in individuals aged 0-9, followed by those aged 10-19 and 20-29, whereas cumulative case rates indicate a large burden being placed on individuals aged 80 and over and those aged 20-29.

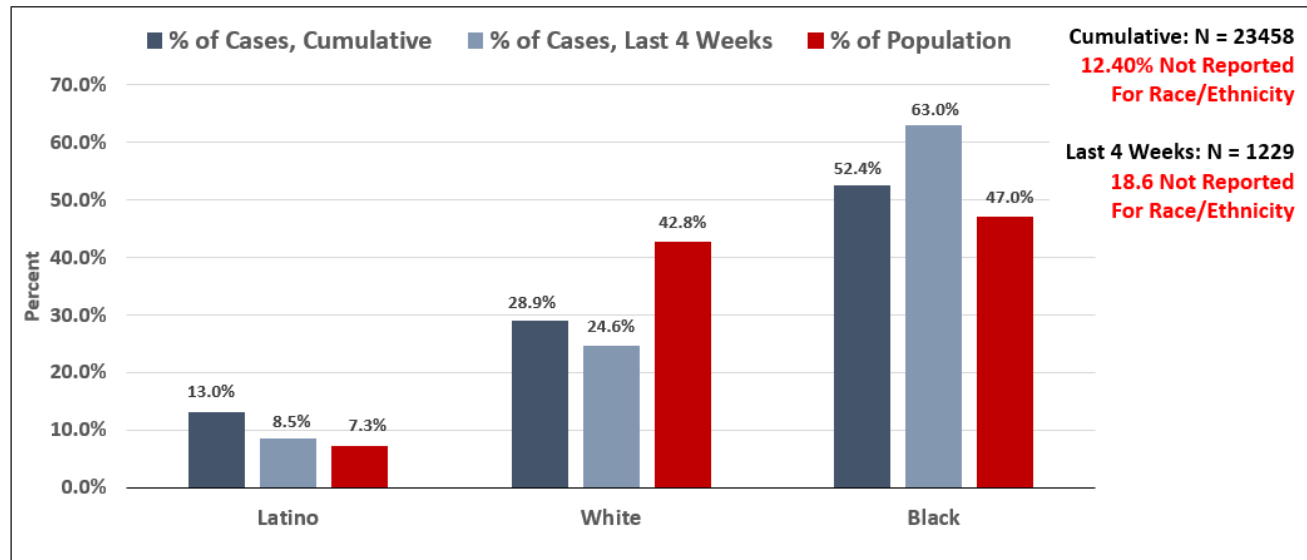
Case rates are down for older age groups (60 and over), with a notable drop for individuals 70 to 79.



3.4 Cases and Population Proportions by Race and Ethnicity by County

UPDATE: Population estimates for race and ethnicity subgroups have been changed for this report from the U.S. Census Bureau's American Community Survey (ACS) 2019 5-year estimates to the National Center for Health Statistics (NCHS) 2019 estimates to align with estimates used by other VDH metrics. This change also involves new race and ethnicity categories: Latino or Hispanic, Non-Hispanic White, Black or African-American, Asian or Pacific Islander, and Native American.

COVID-19 Case Distribution by Race and Ethnicity in the Last 4 Weeks (September 21, 2021 - October 17, 2021)- and Cumulatively through October 17, 2021 Richmond City, VA



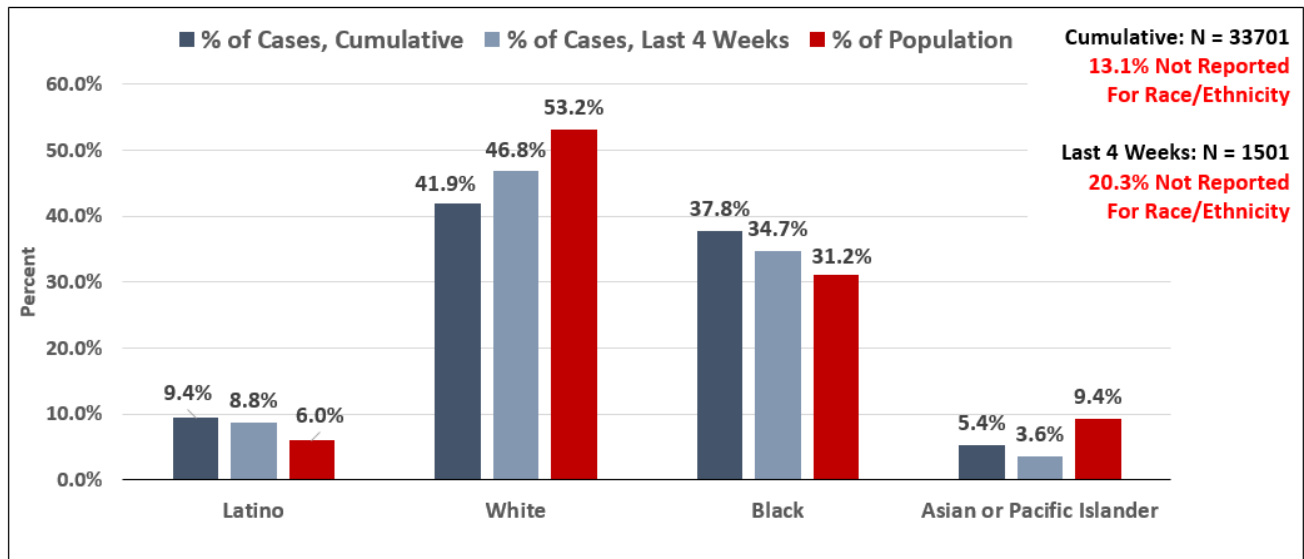
* NCHS population estimates are not available for Two or More Races (235 total cases) or Other Race (394 total cases) and thus they are absent from the plots.

* Missing and Unknown Ethnicities were assumed to be of Non-Hispanic ethnicity.

* Cases among individuals identifying as Asian or Pacific Islander or Native American are suppressed (counts < 5)

- In Richmond, the case burden for Black individuals over the last 4 weeks (63.0%) is disproportionately high relative to their population percentage (47%), while the case burden for White individuals is disproportionately low (24.6%) relative to their population percentage (42.8%).

**COVID-19 Case Distribution by Race and Ethnicity in the Last 4 Weeks (September 14, 2021 - October 17, 2021)-
and Cumulatively through October 17, 2021– Henrico County, VA**



* NCHS population estimates are not available for Two or More Races (375 total cases) or Other Race (849 total cases) and thus they are absent from the plots.

* Missing and Unknown Ethnicities were assumed to be of Non-Hispanic ethnicity.

* Cases among individuals identifying as Native American are suppressed (counts < 5)

- In Henrico in the last four weeks, the case burden for Black individuals (34.7%) is higher than the proportion of the population (31.2%). Meanwhile, the case burdens for White individuals (46.8%) and Asian or Pacific Islander individuals (3.6%) are relatively low compared to their proportions of the population (53.2% and 9.4%, respectively).

4.0 COVID-19 HOSPITALIZATIONS & FATALITIES

4.1 Summary of Hospitalizations & Fatalities

After increasing through the later part of the summer, hospitalizations have begun to decrease within both districts in October (based on VEDSS data, which is subject to lags in data reporting). See [VDH Dashboard](#) for additional trend data.

Regarding hospitalization demographics, cumulative hospitalizations are highest among females and Black individuals in both districts. The median age of hospitalization has not changed since last month and is still 61 in Richmond and 67 in Henrico.

Minor upticks in deaths based on date of death can be noted in Richmond throughout August and September, but deaths in Henrico have remained relatively low and stable. Cumulatively, deaths are highest among male individuals and Black individuals in Richmond and highest among female individuals and White individuals in Henrico. The median age of death has remained consistent over the past month at 76 for Richmond and 80 for Henrico.

4.2 Hospitalizations & Fatalities by Sex, Race, and Age by County

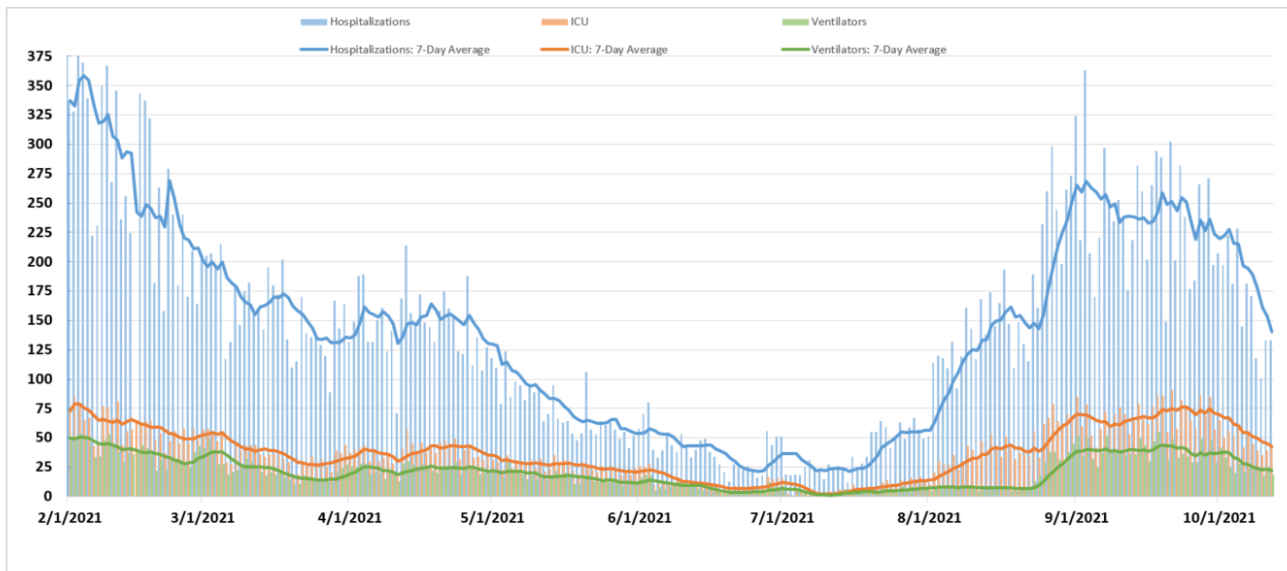
The minimum age ranges correspond to ages in months, which have been converted to years.

Confirmed and Probable		Hospitalizations		Fatalities	
		Richmond (n=924)	Henrico (n=1238)	Richmond (n=333)	Henrico (n=703)
Gender	Male	48% (439)	48% (593)	50% (165)	45% (317)
	Female	52% (485)	52% (645)	50% (168)	55% (386)
	Missing/Unknown				
Age	Median (range)	61 (0-98)	67 (0-104)	61 (0-98)	67 (0-104)
Race/Ethnicity	White	14% (129)	41% (506)	29% (95)	56% (391)
	Black	67% (620)	45% (553)	64% (212)	37% (261)
	Latino	15% (142)	7% (86)	6% (20)	4% (25)
	Asian or Pacific Islander	1% (9)	3% (36)	*	2% (17)
	Other Race	1% (9)	3% (40)	0% (0)	*
	Two or more races	*	1% (11)	0% (0)	0% (0)
	Not reported	1% (10)	*	*	1% (6)

** Counts under 5 are suppressed*

4.3 COVID-19 Hospitalization, ICU, and Ventilator Utilization (VHASS)

Total Daily COVID-19 Hospitalizations, ICU Hospitalizations, and Ventilator Utilizations
February 1, 2021 – October 18th, 2021
Richmond Catchment Area



*Sum Of Daily Counts Displayed in Above Metric - Hospitalizations: 36,675 of 99,852 ALL TIME, ICU Hospitalizations: 9,580 of 22,975 Ventilator Utilizations: 5,407 of 12,519

- Hospitalizations, ICU Hospitalizations, and Ventilator Utilizations in the Richmond Catchment area saw downward trends over the course of September and October. This decrease appears to be leveling off. All data is subject to lags in reporting.

5.0 VACCINATION

5.1 Vaccine Summary

As of October 19th, 61.9% of the region's population has received at least one dose of the vaccine and 56.9% of the region's population has been fully vaccinated. Approximately 61.0% of the combined Richmond and Henrico population has received at least one dose and 55.8% of the two districts' combined population has been fully vaccinated. Cumulatively, local health departments have administered the largest percentage of vaccines to Richmond and Henrico residents, compared with other providers. Over the last four weeks, however, pharmacies have delivered the majority of vaccines.

The majority of vaccine recipients in both districts have been female. In both Richmond and Henrico, older age groups have consistently been vaccinated at a higher rate than younger age groups. This section includes an estimated breakdown of vaccination uptake by race, sex, and age subgroups.

5.2 Percentage of Vaccination Goals Reached by Population

		POPULATION	PEOPLE WITH AT LEAST ONE DOSE	PEOPLE FULLY VACCINATED
Richmond	12-17	11,150	6,187 (55.5%)	5,313 (47.7%)
	18+	190,750	118,684 (62.2%)	108,068 (56.7%)
	65+	31,809	24,602 (77.3%)	22,846 (71.8%)
Henrico	12-17	25,954	18,418 (71%)	16,427 (63.3%)
	18+	256,660	199,370 (77.7%)	183,837 (71.6%)
	65+	52,720	47,238 (89.6%)	44,343 (84.1%)

Population totals are based on 2019 data from the National Center for Health Statistics (NCHS). Please note - this is a change from previous reports which used Census data to estimate population by age group.

5.3 Vaccinations by Locality as of October 19th, 2021

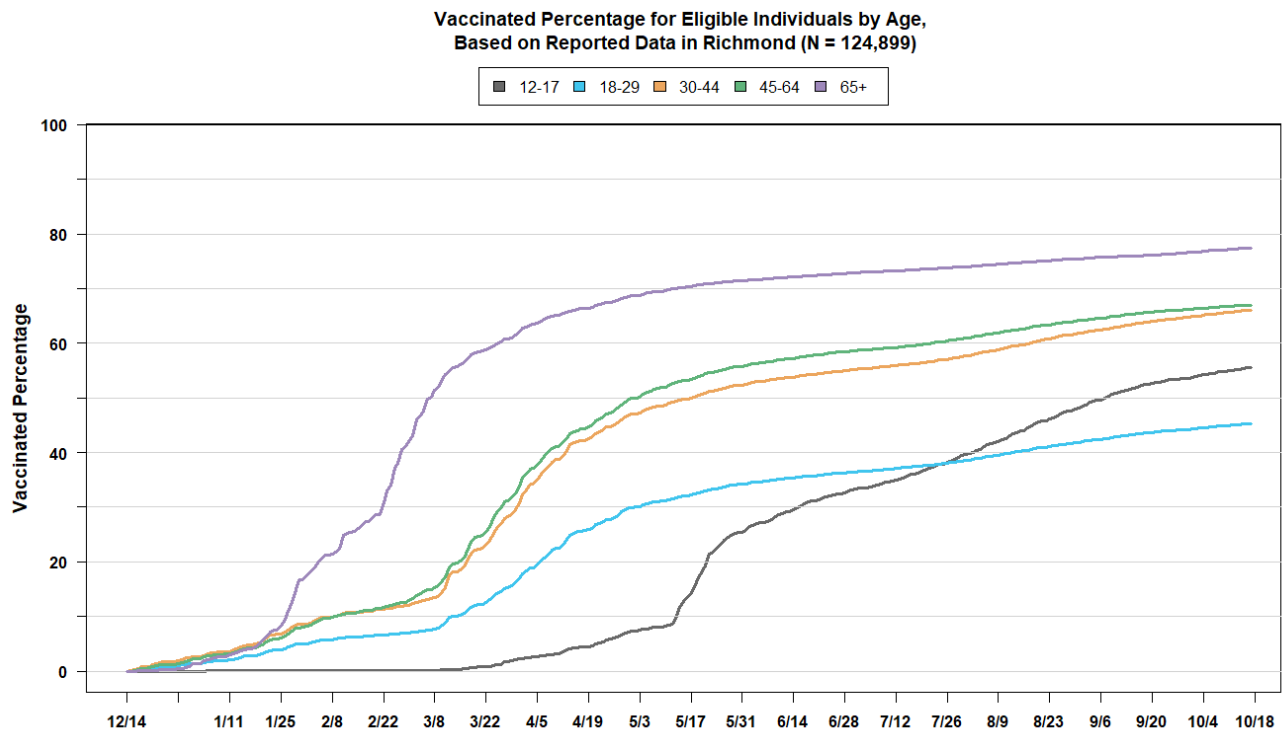
HEALTH DISTRICT	LOCALITY	TOTAL POPULATION	PEOPLE WITH AT LEAST ONE DOSE	PEOPLE FULLY VACCINATED
Chesterfield	Chesterfield	352,802	221,592	202,663
	Colonial Heights	17,370	9,771	8,618
	Powhatan	29,652	16,238	14,975
Chickahominy	Charles City	6,963	4,258	4,035
	Goochland	23,753	16,745	15,900
	Hanover	107,766	70,481	66,568
	New Kent	23,091	13,317	12,469
Henrico	Henrico	330,818	217,673	200,113
Richmond	Richmond City	230,436	124,807	113,280
Total		1,122,651	694,882	638,621

Population totals are based on 2019 data from the National Center for Health Statistics (NCHS).

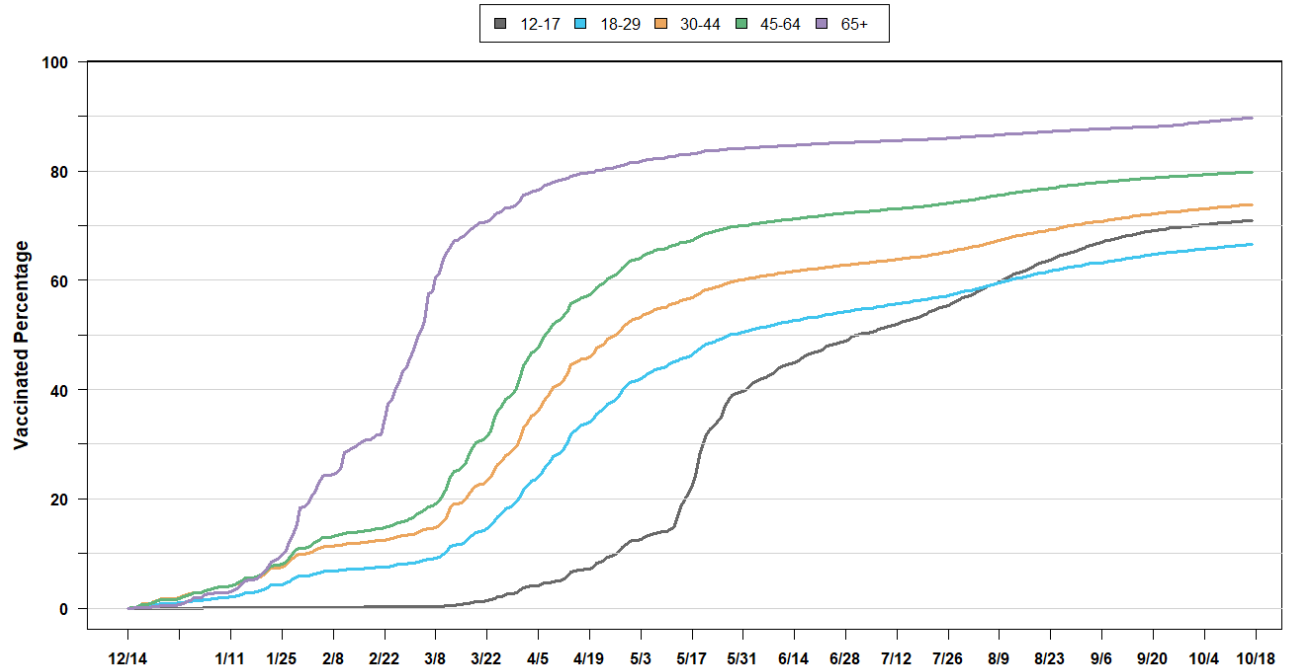
5.4 Vaccine Distribution by Age Group over Time

The following charts track vaccination rates by age group over time since vaccinations first began in mid-December.

- Individuals 65 and over in Richmond, 45 and over in Henrico, and 65 and over in Henrico represent the three highest vaccination rates, with rates near or over 80%.
- In most cases, older age groups within a locality have achieved higher vaccination rates than younger age groups in the same locality.
- Henrico age groups have achieved higher vaccination rates than their corresponding Richmond age groups and many younger age groups in Henrico have achieved higher rates than older age groups in Richmond.
- After later access to vaccination, individuals 12 to 17 have seen a notable increase in vaccination rates while individuals 18 to 29 have slowed in their rate of new vaccinations (outside a minor increased rate in August), leading to the younger age group surpassing the older one in both Richmond and in Henrico.
- All data is subject to lags in reporting, particularly in recent weeks.



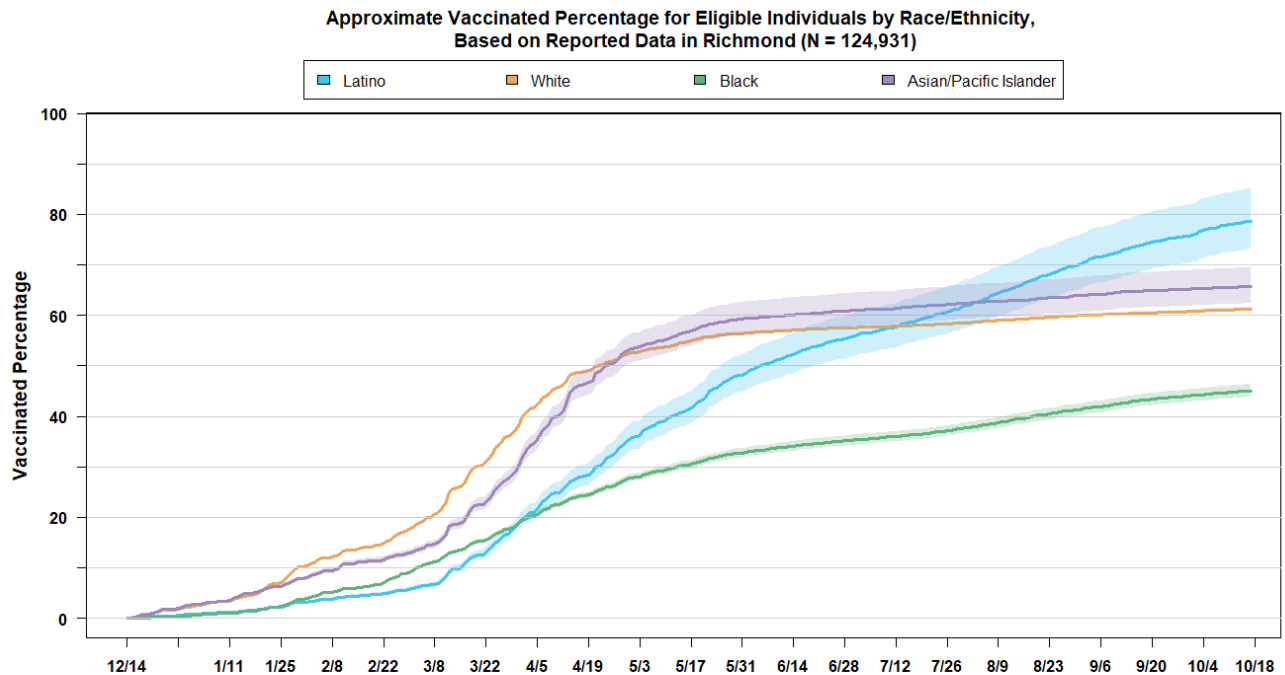
Vaccinated Percentage for Eligible Individuals by Age,
Based on Reported Data in Henrico (N = 217,747)



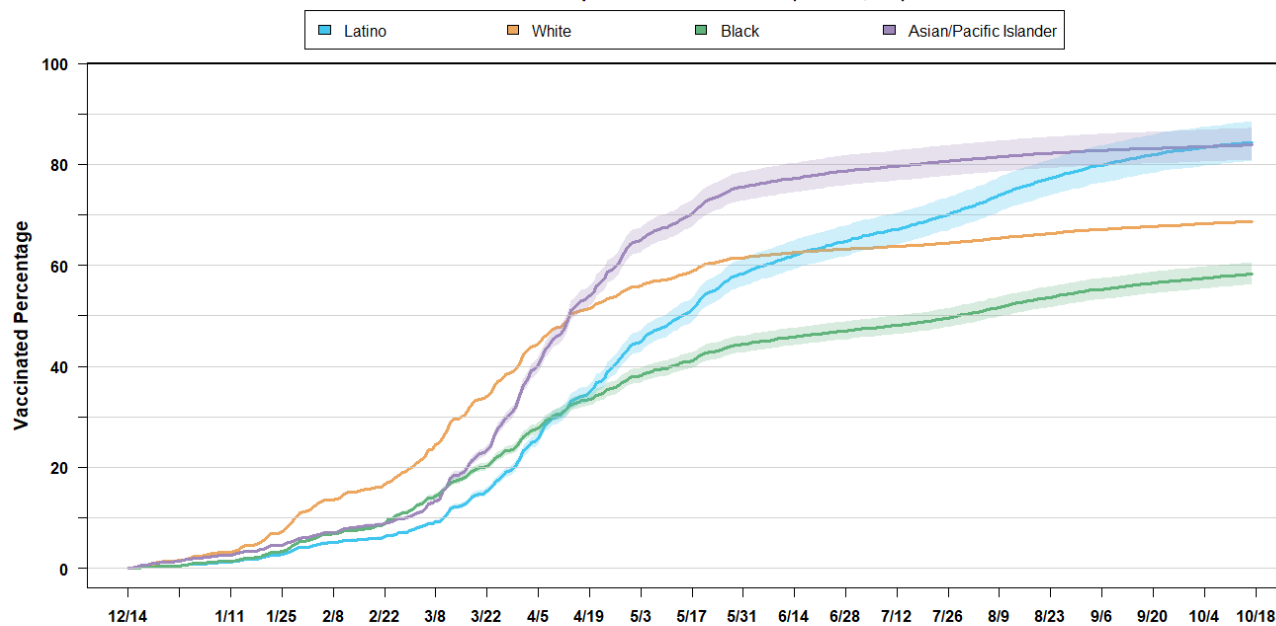
5.5 Vaccine Distribution by Race/Ethnicity over Time

The following charts track vaccination rates by race and ethnicity over time since vaccinations first began in mid-December.

- Through spring, White individuals and Asian or Pacific Islander individuals generally had higher vaccination rates in both Richmond and Henrico
- White individuals maintained the highest vaccination rates through early April in Richmond and late April in Henrico before Asian or Pacific Islander individuals surpassed them for the highest rates.
- In early months, vaccination rates of both Latino and Black individuals were lower, with Black individuals still comprising the lowest vaccine uptake as of today.
- Latino individuals saw an acceleration in vaccination rates beginning in early March after a slow start and have since surpassed White individuals in vaccine uptake in both Richmond and Henrico. They also possess the highest vaccination rate overall in Richmond and are between about 75% and 85%.
- In Henrico, Asian or Pacific Islander individuals and Latino individuals have reached vaccination rates between 80% and 85%, while White individuals fall short of 70% and Black individuals fall short of 60%.
- Vaccination rates are notably lower in both Richmond and Henrico for Black individuals.
- All data is subject to lags in reporting, particularly in recent weeks.



Approximate Vaccinated Percentage for Individuals by Race/Ethnicity,
Based on Reported Data in Henrico (N = 217,770)



Vaccination rates are underestimates due to individuals not disclosing race/ethnicity or reporting 'Other Race' (16600 and 9047 vaccinations, respectively).
American Indian individuals (1468 vaccinations) excluded due to unreliable vaccination rate calculations.

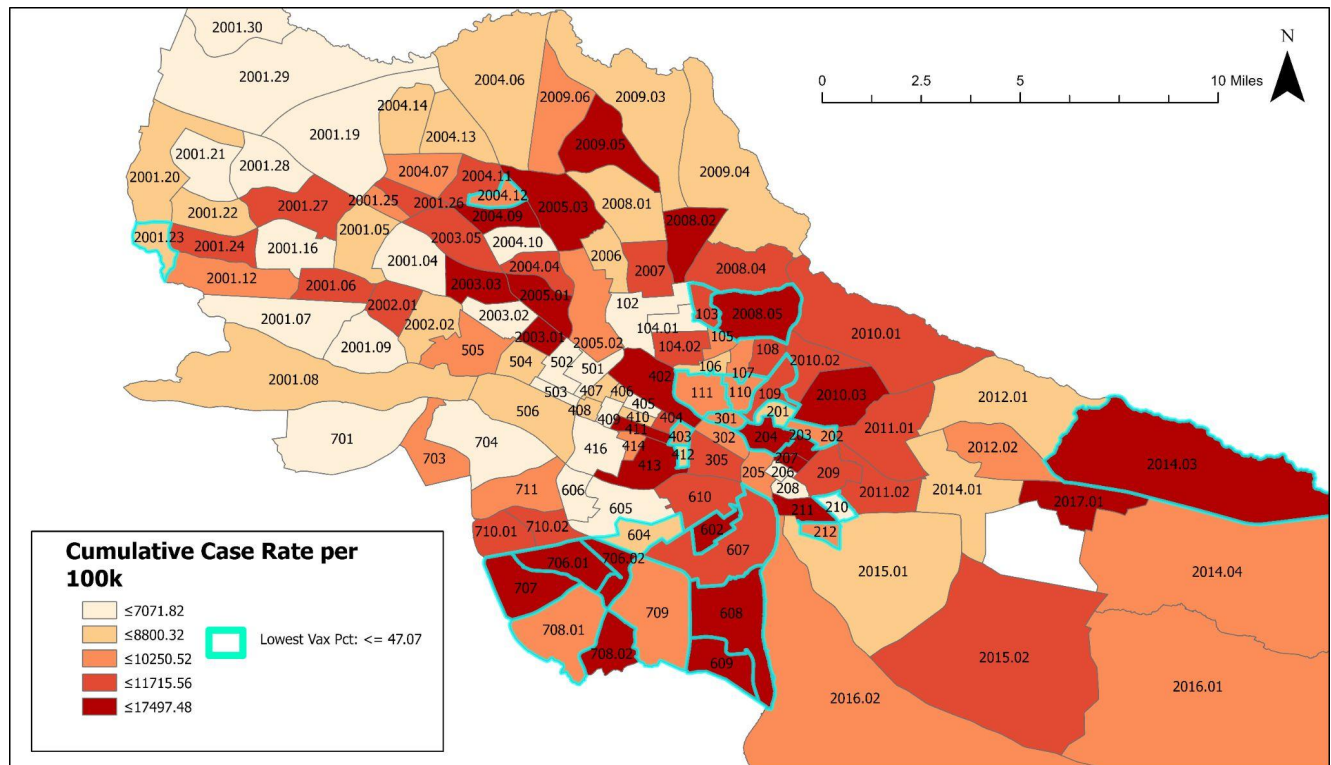
The following 3 maps visualize vaccination uptake (percentage of total population receiving at least one dose within each census tract), case burden (cumulative cases per 100,000 by census tract) and social vulnerability (defined by the CDC's social vulnerability index).

Vaccination Uptake and Outreach locations In Richmond & Henrico, VA

-- Oct 18th, 2021



Cumulative COVID-19 Cases and Lowest Percent Vaccinated by Census Tract -- Oct 18th, 2021



Social Vulnerability Rank and Lowest Percentage Vaccinated by Census Tract in -- Oct 18th, 2021

