

RVA



NOW

OCTOBER 2021

LABOR MARKET ANALYSIS

WITH A FOCUS ON
Talent Retention,
Migration &
Attraction

PREPARED FOR CHAMBER RVA



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Executive Summary

*This report assesses the labor market of the Richmond region on behalf of RVA NOW, a talent retention and recruitment program begun in early 2020 by Chamber RVA, the Richmond regional chamber of commerce. The analysis examines demographics, labor market trends, economic performance, and the regional educational pipeline before focusing on **talent retention, talent migration, and talent attraction.***

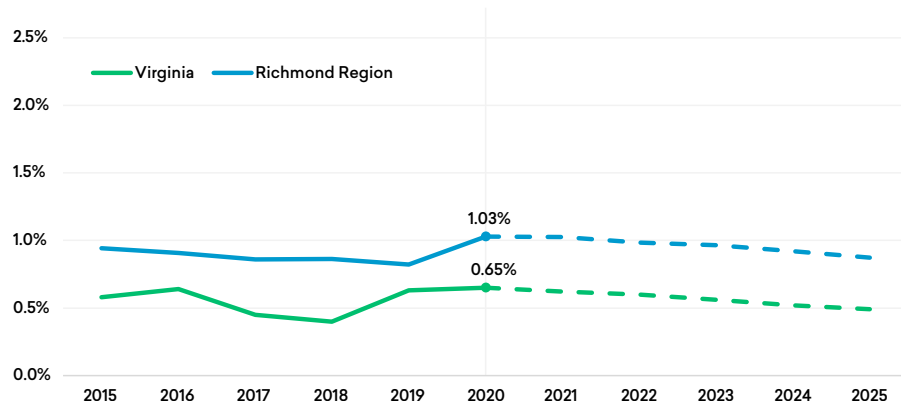


LABOR MARKET ANALYSIS



The Richmond region's population is growing faster than Virginia and the United States averages.¹ Between 2015 and 2020, the Richmond region grew 4.6% reaching a population of 1.29 million. By contrast, Virginia only grew at a rate of 2.7% and the US at a rate of 3.1%. The pandemic has created a golden opportunity to reverse decelerating population growth that was occurring in the region prior to 2020, as the graph demonstrates.

POPULATION CHANGE, YEAR OVER YEAR



¹ The region matches the 17 counties and municipalities that make up the GOVA Region 4, delineated here: <https://govirginia.org/regions/four/>

With that said, the Richmond region is a story of two halves. The upper area of the region is growing, but the lower part of the region is stagnant or declining in population. Furthermore, these two halves are reflected when observing income levels as well.

The region's median age of 38.8 is noticeably higher than Virginia (38.2) and the US (38.1). Although the region has a slightly larger-than-average Baby Boomer generation, it also has a larger-than-average millennial population—this means more opportunities can be realized for Richmond's younger workforce to fill the gap left by Baby Boomer retirements. Richmond has a noticeably smaller Gen Z population compared to the national and state averages.

Labor Force

The Richmond region boasts a labor force of 639,569 people, of which just over 70% live in Chesterfield County, Henrico County, or Richmond proper. In 2020, the unemployment rate reached 6.8%, rising sharply because of the pandemic from the extremely tight unemployment rate of 2.8% in 2019.

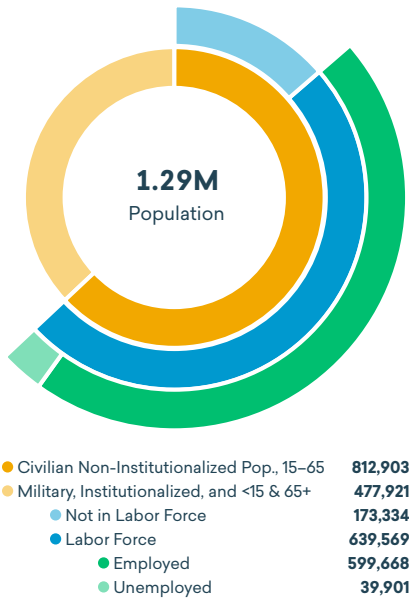
Historically, the Richmond region has had a Labor Force Participation Rate (LFPR) above both Virginia and the United States, though this metric became much closer to the national average when the pandemic hit.

Economy & Job Performance

The Richmond region accounts for over 16% of Virginia's total economy, worth \$81 billion in gross regional product (GRP). Government is the largest industry in the Richmond region, also contributing the most GRP (roughly \$11.8 billion). Despite Richmond being the state capital, its share of government employment is less than the Virginia average due to heavy federal employment associated with Washington D.C. Richmond region exceeds state levels of employment in healthcare, finance & insurance, and management of companies & enterprises (due to its 7 Fortune 500 companies).

The Richmond region accounts for over **16%** of Virginia's total economy, worth **\$81 billion** in gross regional product.

2020 LABOR FORCE BREAKDOWN



TALENT RETENTION, MIGRATION, AND ATTRACTION



Emsi Burning Glass analyzed the profiles of Richmond region, post-secondary alumni that graduated between 2015 and 2020. This data set shows graduating institution, degree level, graduation year, program of study, and current MSA region to enable us to explore talent retention and migration trends.

Talent Retention

The Richmond region has retained 51.5% of alumni graduating between 2015 and 2020. This average retention rate between 2015 and 2020 changes by graduation year. The further back the graduation year, the lower the graduation rate becomes. Retention rates also vary by institution. The region's two largest community colleges are great vehicles for talent retention—each have an overall retention rate above 80%.

Among the other institutions, Virginia Commonwealth University (VCU) performs the best at helping talent remain in-region. 54.7% of 2015-2020 graduates have remained in-region (more detail on retention rates by institution detailed in the report). The University of Richmond is just 32.8% overall, but only 27.6% of 2015 graduates are in region, the lowest among institutions measured.

Talent Migration

An estimated 48.5% of area alumni have left the region among 2015-2020 graduates. The attrition rate is essentially the inversion of the retention rate. When observing retention rate over time, we see that migration out of the area is more likely to occur the more time between graduation and the present.

VCU and the University of Richmond have the largest diasporas of regional alumni that have left the region, despite the University of Richmond being slightly smaller than J Sargeant and John Tyler Community Colleges in terms of completion numbers. The MSAs receiving the most talent from the Richmond region post-secondary institutions are Washington DC, NYC, Virginia Beach, Baltimore, Philadelphia, LA, Charlottesville, Boston, Atlanta, and Chicago, respectively.

Talent Attraction

Based on the analysis of occupations, MSAs, and countries, Emsi Burning Glass recommends the following targets for talent attraction efforts:

Occupations

- Software developers
- Financial services sales agents
- Logisticians (among others detailed in the report)

MSAs

- | | |
|-----------------|--------------------------|
| • Washington DC | • Virginia Beach-Norfolk |
| • NYC | • Miami |
| • Los Angeles | • Philadelphia |
| • Baltimore | • Boston |
| • Chicago | • Phoenix |

Foreign Countries

- UK
- Canada
- Australia
- India



KEY TAKEAWAYS

Based on our analysis of the Richmond region's labor market as well its migration data, this report recommends that the Chamber's RVA NOW program focus on the following:



Everyone talks about Millennials, but don't forget about Gen Z. As the report noted, two generations' populations declined in the Richmond region between 2015 and 2020: Gen X and Gen Z. Gen Z is the current generation entering the workforce. Coupled with the higher-than-average median age of 38.8, Richmond must focus on retaining and attracting young talent to ensure an adequate supply of talent for the future.



Maintain progress in Labor Force Participation Rates for young people. Prior to the pandemic, Richmond was making impressive progress in labor force participation across most age groups. Rates increased particularly so for younger workers between 16-29 years of age. This increased engagement was a good sign and one that Richmond will need to focus on during the recovery. It means the region is helping young people find employment and therefore reduces the risk of talent migration.



Underemployment is a nationwide problem, but one that could be contributing to talent migration out of Richmond. Roughly 26% of Richmond's population could be underemployed due to too few jobs available for people with a post-secondary education, particularly at the graduate level and above. On the other hand, there is a surplus of jobs that do not require a college degree. Such a dynamic can cause attrition of talent with higher education levels.



Some sub-regions may need more attention than others. When observing both population growth trends and income levels, the Richmond region is very much split in half. The northern part of the region is growing with healthy income levels, while the southern part has a stagnant or declining population coupled with lower incomes. This portion of the region is more likely to leak talent and therefore requires greater attention from RVA NOW.



Pay attention to talent gaps. Logistics-related occupations are projected to grow significantly, but there are gaps between relevant degree completions and job availability. For instance, the average annual job openings for logisticians are far higher than the annual educational completions for logisticians. Since Logistics is a target sector for Richmond, this should be a point of concern. For that matter, if Information Communication



Technology (ICT) is also a target sector, there is a talent gap for software developers as well.



Connect alumni with further education opportunities *within* the region.

In general, as the degree level increases from bachelor's to master's & doctorate level degrees, the retention rate also increases. Yet only 1 in 5 profiles that have further education choose to pursue these additional studies in-region. By improving this metric, retention rates should also increase accordingly.



Engineer a comeback.

Engineering degrees, whether generalized or specialized, frequently demonstrate higher retention rates for the region. Explore the demand and job growth for engineering occupations in the region and encourage area institutions to expand these program offerings to increase retention. Also inform talent entering college of opportunities in the engineering field to help increase interest in this high-retention field.



Biotechnology talent needs a look.

The region has low retention in biology talent. Biology completions have doubled since 2009 and there is a surplus of biochemists. Yet biotechnology is a strong cluster in the region with a location quotient² (LQ) above 3 for NAICS 325199 (Other Basic Organic Chemical Manufacturing). This retention issue will need more exploration by RVA NOW.



Seize the opportunity to move the retention needle at University of Richmond.

The University of Richmond draws more out of state talent to the region, while other area institutions draw from within the state and region. However, this makes talent retention more challenging. Business administration alumni from the University of Richmond are among the largest category for the institution, yet regional retention rates are very low. At the same time, business occupations are projected to increase in the Richmond region. Opportunities exist, but there might be a disconnect. If this could be reversed, the Richmond region could see noticeable improvement in its overall retention rates. Acknowledge that UR draws more out of state talent here. Other universities are drawing from within the region/state.



Capitalize on this moment.

The Covid-19 pandemic has caused migration patterns to shift across the United States. It is no accident that the Richmond region's population growth rate spiked in 2020 during the pandemic. As the pandemic continues, RVA NOW still has time to capitalize on a once-in-a-generation opportunity to capture people's attention for talent attraction. Never have people been so willing to move on from their current jobs; to escape enormous & expensive cities. Richmond can offer the solution: a medium-sized metro area with plenty of amenities while not too overwhelming.

² Location quotient (LQ) is a way of quantifying how concentrated a particular industry, cluster, occupation, or demographic group is in a region as compared to the nation. It can reveal what makes a particular region "unique." For example, if the leather products manufacturing industry accounts for 10% of jobs in your area but 1% of jobs nationally, then the area's leather-producing industry has an LQ of 10.

This is a moment in time where labor has more leverage and therefore can find great opportunities in markets they otherwise would not have considered.



You have the data. Now begin the outreach. Utilizing the data presented in this report as well as the accompanying Tableau dashboard, RVA NOW has the information it needs to begin targeting specific strategies and tactics to increase retention and gain footing in talent attraction. With that, data alone cannot reveal the full story. Data is strongest when accompanied by market validation. RVA NOW should accompany this report with ongoing outreach to engage retained talent, as well as talent that left the region, to find out why they stayed or left. This will further inform RVA NOW's programming. During its startup phase in 2020, RVA NOW conducted detailed research into GenZ perceptions of the Richmond region.³ We recommend that this component of their research continues. What perceptions prevent talent from coming to Richmond? What misconceptions cause regional talent to leave upon graduation? Only continued outreach can ensure this feedback stays current and accurate.



³ See Appendix for report on GenZ survey results.



Introduction

ChamberRVA, the Richmond regional chamber of commerce, retained Emsi Burning Glass to conduct a thorough labor market analysis of the Richmond region. The report will serve the needs of the Chamber's RVA NOW program, an initiative specifically designed to increase regional talent retention for area college students and alumni. As such, this report conducts a deep analysis of talent retention and migration, while also making key suggestions for talent attraction.

The Richmond region, for purposes of this report, is Go Virginia Region 4, which includes the cities of Colonial Heights, Emporia, Hopewell, Petersburg, and Richmond; and the counties of Charles City, Chesterfield, Dinwiddie, Goochland, Greensville, Hanover, Henrico, New Kent, Powhatan, Prince George, Surry, and Sussex. See Figure 3.

The Richmond region is a demographically fast-growing area in Virginia with a multitude of post-secondary institutions such as Virginia Commonwealth University, the University of Richmond, J Sargeant Reynolds Community College, and John Tyler Community College, to name a few. There are two notable HBCUs as well, Virginia Union University and Virginia State University. It is a region known for a heavy presence of Fortune 500 company headquarters, such as Dominion Energy, Performance Food Group, and CarMax. The economy has clusters in healthcare, information and communications technology, biotechnology, logistics, government, and finance, offering a range of employment opportunities for regional talent.

Demographic Profile



POPULATION TRENDS

Richmond's population growth is a testament to its people-friendly, business-friendly environment. The region's growth far outpaces both the United States and Virginia: Between 2015 and 2020, the Richmond region grew 4.6% reaching a population of 1.29 million. By contrast, Virginia only grew at a rate of 2.7% and the US at a rate of 3.1%. It doesn't stop there: the region is expected to grow another 4.9% by 2025—reaching a population total of roughly 1.35 million while continuing to outpace both the state and the country.

Richmond is **growing faster** than both Virginia and the United States.

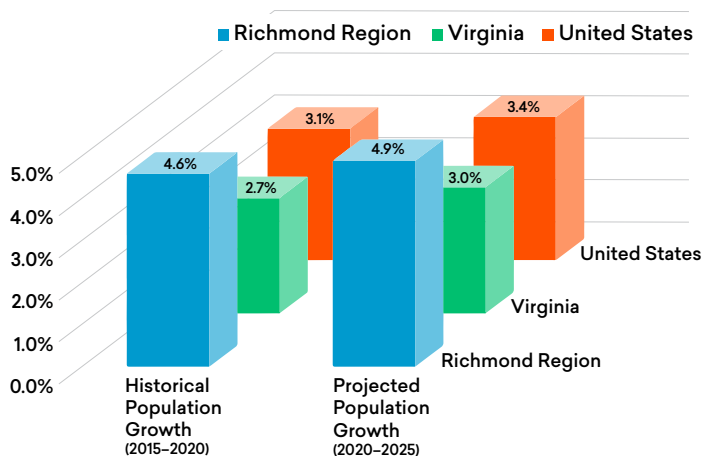
Table 1: RICHMOND REGION POPULATION GROWTH, 2015-2025

Geography	Population			Population Growth
	2015	2020	2025 (Projected)	2015-2020
Richmond Region	1,234,529	1,290,824	1,353,553	4.6%
Virginia	8,361,808	8,589,549	8,845,256	2.7%

Source: Emsi Burning Glass Q2.2021 Dataset

When observing growth year-over-year, the region's growth rate slowed, dipping below 0.9% by 2019. However, the area experienced a sharp uptick in 2020, jumping to 1.03%. At no point did the state's year-over-year growth rate exceed Richmond's, nor is it expected to in the near future.

Figure 1: HISTORICAL & PROJECTED POPULATION GROWTH BY AREA, 2015-2025

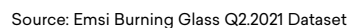


Source: Emsi Burning Glass Q2.2021 Dataset



The Richmond region experiences population growth in two distinctly different ways: the northern half, which is already more population dense, added at a brisk pace, while the southern half witnessed only modest growth or even population decline in some areas.

Figure 3: RICHMOND REGION POPULATION GROWTH RATE BY CITY & COUNTY, 2015-2020



GENERATION DYNAMICS

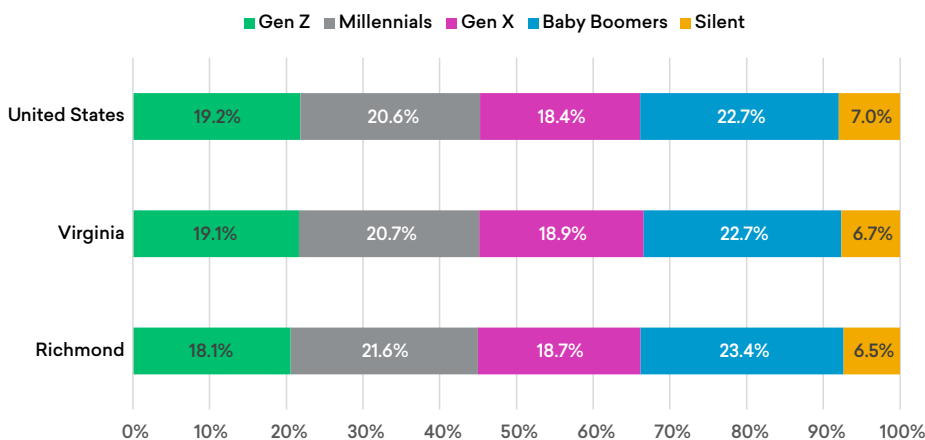
- Richmond MSA⁴ Median Age: **38.8**
- Virginia Median Age: **38.2**
- US Median Age: **38.1**

A major issue facing employers today is a nationwide labor shortage and aging workforce. Millions more jobs exist than there are people to fill them, coupled with lower labor participation rates which exacerbate the problem. Furthermore, demographic changes are only going to increase pressures on the labor market: the Baby Boomer generation (those 55 to 74 years) was the largest generation in American history, and many are currently entering retirement. Furthermore, Gen X (those 40 to 54 years) is a historically small-sized generation, smaller than Millennials (those 25 to 39 years) and Gen Z (those 10 to 24 years).

In the near-term, the Richmond region is well positioned to deal with this demographic transition. Although the region has a slightly larger-than-average Baby Boomer generation, it also has a larger-than-average millennial population—this means more opportunities can be realized for Richmond's younger workforce to fill the gap left by Baby Boomer retirements and small Gen X population. In

With more millennials than the US or Virginia average, Richmond is **well-poised to meet labor market demand.**

Figure 4: GENERATIONAL POPULATION COMPARISON, 2020



Source: Emsi Burning Glass Q2.2021 Dataset

4 Note: Median age only available by MSA or county-level, not as a custom geography.

the long-term, however, Richmond has a noticeably smaller Gen Z population compared to the national and state average.

Richmond's supply of prime-age wage earners (those aged 25-54) has increased and is projected to accelerate into 2025. The Richmond region can strengthen its population growth to be an east-coast powerhouse if it focuses on young people entering the workforce, aged 15-25. As illustrated by the table below, Richmond's population declined in in this critical age category. Within this age range, young people are entering the workforce either directly after secondary school or after some post-secondary education. The supply of this talent is vital in filling entry-level positions, so any decline places pressure on employers.

Table 2: PRIME-AGE WAGE EARNER POPULATION GROWTH, 2015-2025

Tri-Cities	Population			Compound Annual Growth Rate	
	2015	2020	2025 (Projected)	2015-2020	2020-2025
Prime-age Wage Earners (25-54)	507,537	519,831	537,607	0.48%	0.67%

Source: Emsi Burning Glass Q2.2021 Dataset

Table 3: RICHMOND POPULATION GROWTH BY AGE GROUP, 2015-2020*

Generation*	Age Cohort	2015 Population	2020 Population
Gen Z	Under 5 years	72,588	75,469
	5 to 9 years	74,781	75,711
	10 to 14 years	76,841	76,910
	15 to 19 years	80,366	78,715
	20 to 24 years	83,540	78,479
Millennial	25 to 29 years	89,596	95,876
	30 to 34 years	84,960	94,790
	35 to 39 years	78,364	87,684
Gen X	40 to 44 years	79,640	79,461
	45 to 49 years	83,997	79,598
	50 to 54 years	90,980	82,422
Boomer	55 to 59 years	87,452	88,385
	60 to 64 years	76,380	84,038
	65 to 69 years	63,301	71,448
	70 to 74 years	42,360	57,874
Silent	75 to 79 years	27,954	37,735
	80 to 84 years	19,697	22,532
	85 years and over	21,732	23,698
		1,234,529	1,290,824

Source: Emsi Burning Glass Q2.2021 Dataset

*The age cohorts for the generation definitions apply to 2020 figures, not 2015 figures.

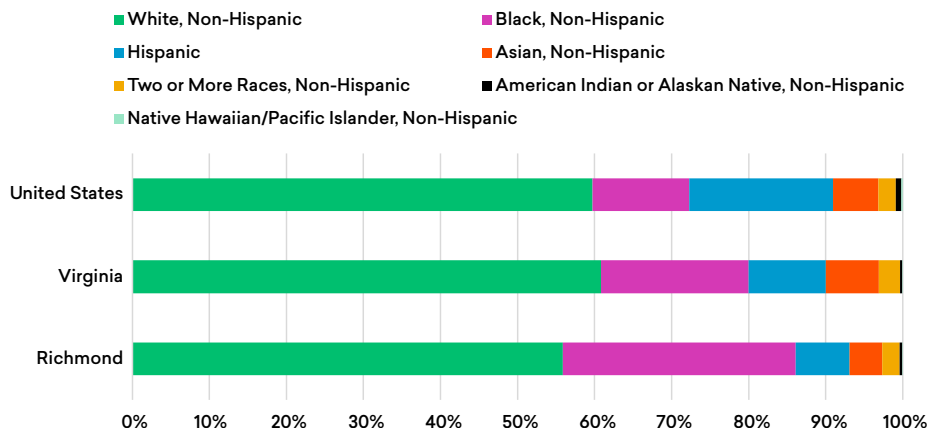
DIVERSITY

Diversity in the workforce can be a driving factor in helping businesses appeal to a larger market, especially with an eye towards talent attraction and retention. Many local economies have economic development efforts that seek to attract a diverse population base. In some cases, this is a pragmatic tactic: some areas where the white, non-Hispanic population (often the largest demographic category) is in decline see diversity as a way to reverse negative or stagnant population growth.

Richmond is more diverse than Virginia and United States as a whole. The region's black, non-Hispanic population is over twice the national average (30.2% compared to 12.6%). Richmond's growth is tied to all races & ethnicities, though some are growing at a faster rate than others. The Hispanic population grew by 17,863 between 2015 and 2020, while the white population added 15,889 and black population grew by 11,037. Richmond is projected to become more diverse well into the future.

Richmond is **more diverse** than Virginia and the United States as a whole and is projected to become more so well into the future.

Figure 5: RACE/ETHNICITY SHARE OF POPULATION COMPARISON, 2020



Source: Emsi Burning Glass Q2.2021 Dataset

INCOME

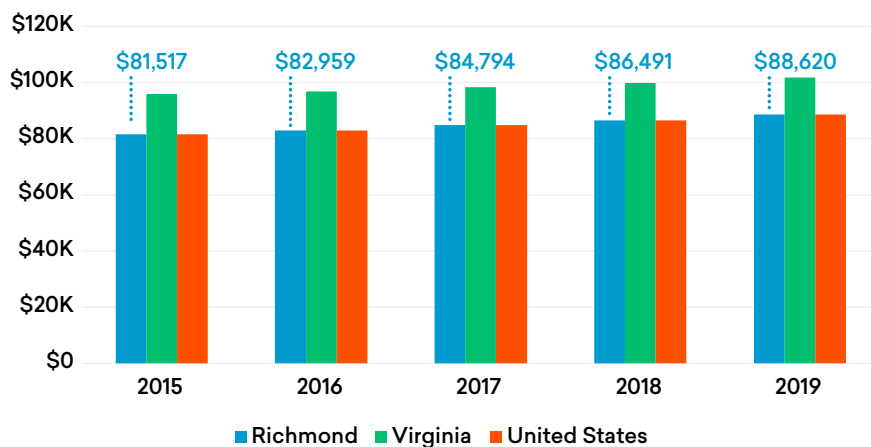


Richmond's average earnings have outpaced inflation and kept pace with the United States.

Income is generally used as a measure of the economic well-being of individuals and communities. As an MSA⁵, Richmond's median household income of \$68,529 is far higher than the United States'. However, the region's urban areas have much lower household incomes: all five (5) cities in the region have a median household income far below the national figure of \$62,843. Again, *A Tale of Two Halves* is on display: the wealthier areas are in the northern half of the region.

Richmond's average earnings have outpaced inflation and kept pace with the United States, growing from \$81,517 to \$88,620 between 2015 and 2019.

Figure 6: AVERAGE EARNINGS TREND (ADJUSTED IN \$2019), 2015-2019



Source: Emsi Burning Glass Q2.2021 Dataset

Table 4: MEDIAN HOUSEHOLD INCOMES OF RICHMOND REGION, 2019

Geography	Median Household Income 2019
Goochland County	\$93,994
Hanover County	\$89,390
Powhatan County	\$89,090
New Kent County	\$87,904
Chesterfield County	\$82,599
Virginia	\$74,222
Prince George County	\$71,912
Henrico County	\$70,307
Richmond MSA	\$68,529
United States	\$62,843
Dinwiddie County	\$60,346
Surry County	\$57,962
Charles City County	\$57,198
City of Colonial Heights	\$54,550
Greensville County	\$50,300
Sussex County	\$49,487
City of Richmond	\$47,250
City of Hopewell	\$39,030
City of Petersburg	\$38,679
City of Emporia	\$27,063

Source: Emsi Burning Glass Q2.2021 Dataset

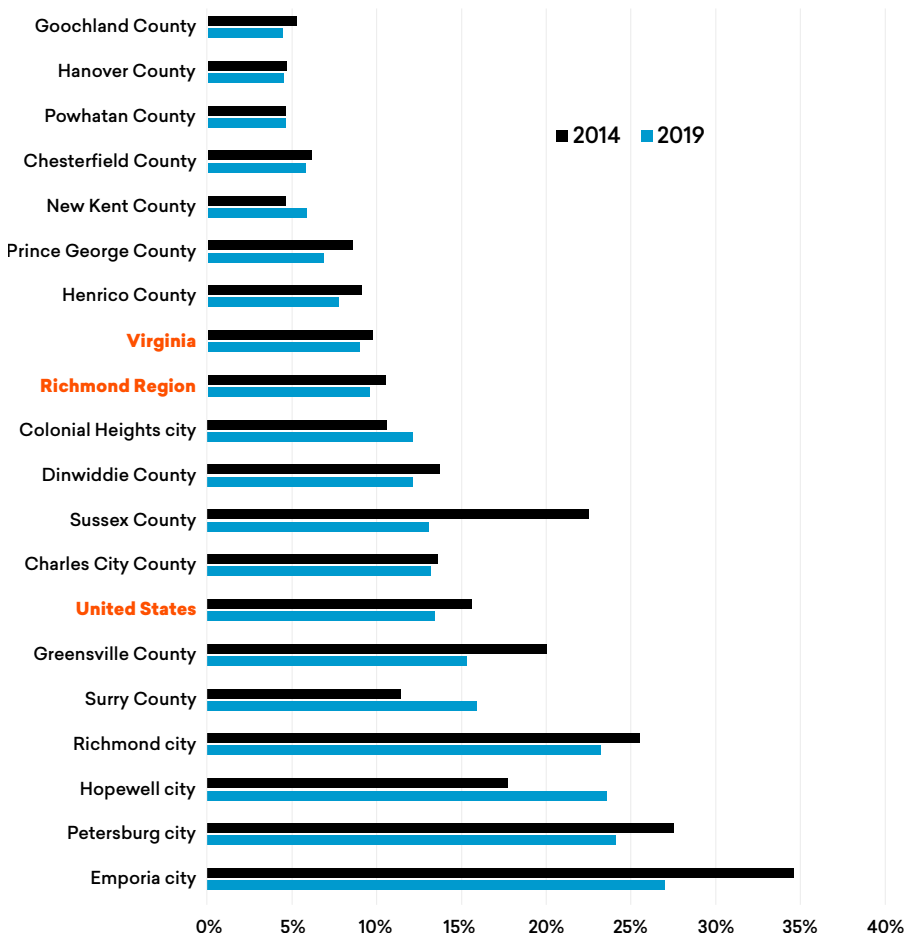
⁵ Note: Median Household Income metric not available for custom geography, only at MSA or county level

POVERTY

Poverty rates are another way of measuring the health of regional economies. It is generally expected that as the economy grows, so will employment and income growth (though this does not always hold true). The Richmond region's overall poverty rate fell from 12.4% in 2014 to 11.3% by 2019, noticeably lower than the national rate of 13.4%. Its poverty rate is slightly above that of Virginia's (10.6%). The cities of Emporia and Petersburg along with the counties of Greenville and Sussex experienced the sharpest decline in poverty rates, although it rose sharply in Surry County and the city of Hopewell.

The Richmond region's **poverty rate is below that of the United States** and close to that of Virginia. Sussex County and Emporia have improved the most.

Figure 7: POVERTY RATES WITHIN RICHMOND REGION, 2014-2019



Source: Emsi Burning Glass Q2.2021 Dataset

EDUCATIONAL ATTAINMENT

Long-term changes in educational attainment cause structural changes in the economy. Regional increases in educational attainment over the past decade can be considered a structural change with a lasting impact on the labor market. Generally higher education attainment is seen as a good thing, though the nationwide emphasis on university education over trades may have caused a skills shortage for blue-collar work.

The Richmond region is more educated than the national average: 38.4% of the population held a bachelor's degree or higher, while only 32.6% of the United States did so in 2020. The presence of Virginia Commonwealth University and numerous other higher education institutions contributes to Richmond's development of human capital. Richmond's educational attainment has also improved since 2015:

If Richmond wants to maximize its human capital development potential, it needs to focus on a few key items:

- Encourage more high school graduates to achieve higher education, whether it be a trade or a degree
- Encourage college completion among those who started but never finished
- Address education disparities among minority groups:
 - The share of Hispanic population with less than a high school education is far too high.
 - As a large minority group, a measurable increase in black college degree attainment would increase regional educational attainment noticeably.

With over **38%** of the population holding a bachelor's degree or higher, Richmond is **more educated** than the national average.

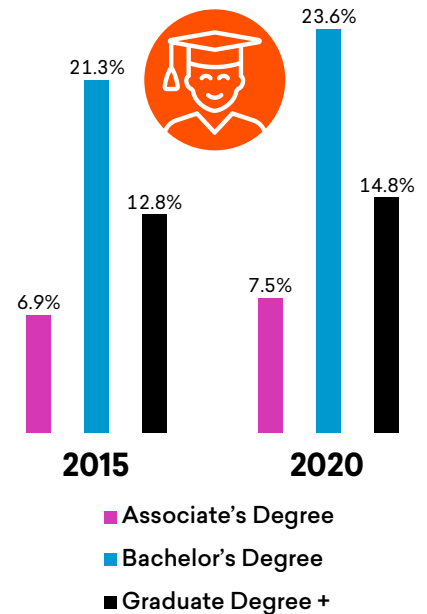
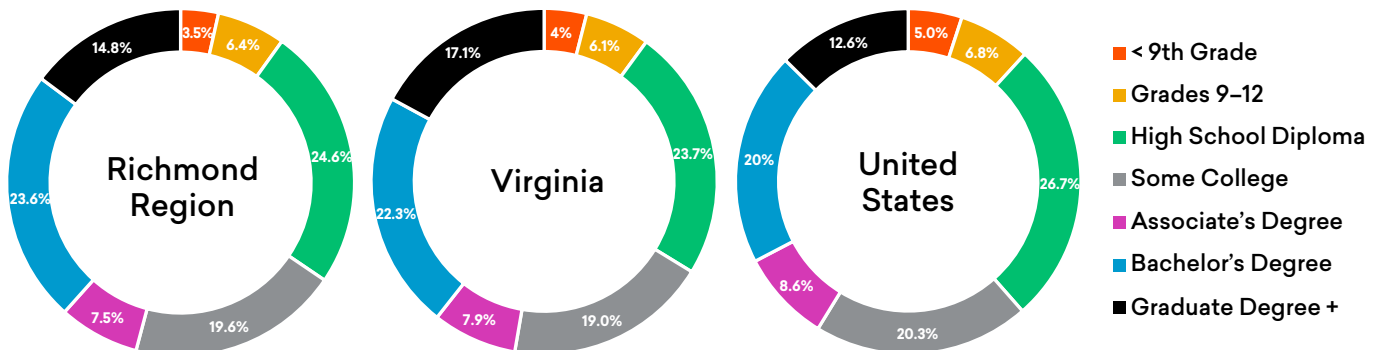


Figure 8: RICHMOND REGION EDUCATIONAL ATTAINMENT, 2020



Source: Emsi Burning Glass Q2.2021 Dataset

Labor Force Assessment





The labor force is composed of those people aged 16 and over in the civilian non-institutionalized population, including those classified as unemployed. Understanding labor force composition, particularly in terms of skills availability, provides some indications of an economy's dynamism. Nationwide, slowing labor force growth may be due to several factors, including but not limited to the following:

- Demographic shifts—increases or decreases in retirees or youth
- Discouraged workers who have dropped out due to a lack of job prospects
- People who stay in school longer or return to school
- Disengaged young adults
- Disconnect between available jobs and available skills

The Richmond region boasts a labor force of 639,569 people, of which just over 70% live in Chesterfield County, Henrico County, or Richmond proper. In 2020, the unemployment rate reached 6.8%, rising sharply from the extremely tight unemployment rate of 2.8% in 2019. The spike in unemployment is directly related to the Covid-19 pandemic. The unemployment rate has gradually fallen during the first part of 2021, though the Richmond area's rate is slightly higher than Virginia's.

Almost 67% of unemployment in the Richmond region is spread across just 6 industries, whereas unemployment across Virginia is slightly more spread out. Administrative Support, Waste Management & Remediation accounts for 13.8% of Richmond's unemployment, followed by healthcare & social assistance (11.2%), government (11.0%), accommodation & food services (10.4%), retail (10.2%), and construction (10.0%).

Certain industry unemployment in Richmond accounts for an outsized portion of Virginia's unemployment. For instance, unemployment in management of companies & enterprises in Richmond accounts for 27.5% of Virginia's unemployment in this industry. Similarly, Richmond accounts for 26.3% of unemployment in Virginia's finance & insurance industry.

With unemployment rates consistently lower and **labor force participation rates consistently higher** than the national average—Richmond isn't afraid of hard work.

2020 LABOR FORCE BREAKDOWN

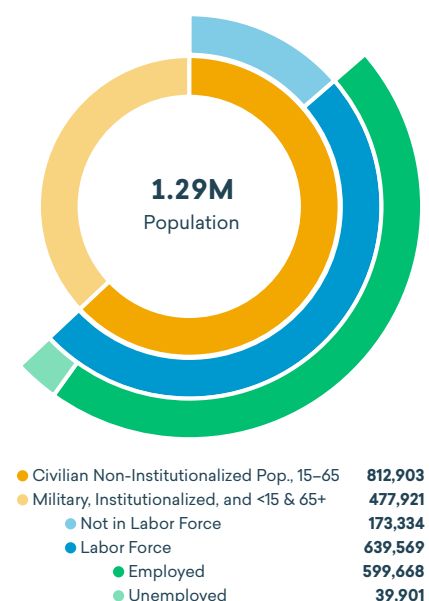
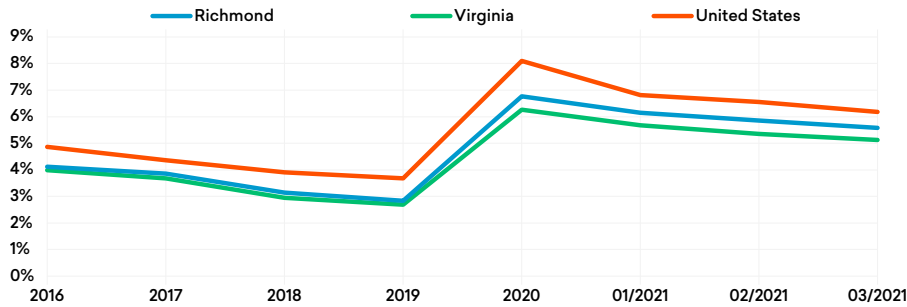
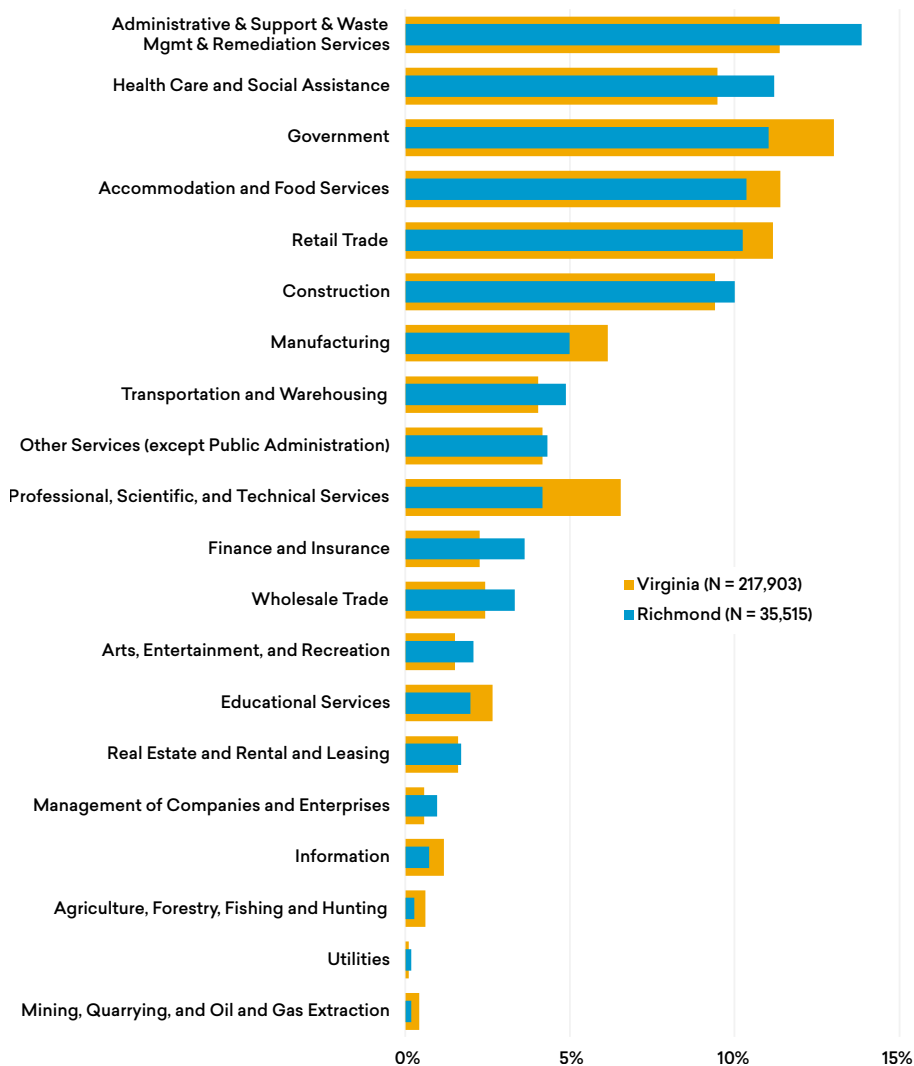


Figure 9: ANNUAL UNEMPLOYMENT RATE BY AREA, 2016–MARCH 2021



Source: Emsi Burning Glass Q2.2021 Dataset

Figure 10: INDUSTRY SHARE OF REGIONAL UNEMPLOYMENT, FEBRUARY 2021



Source: Emsi Burning Glass Q2.2021 Dataset

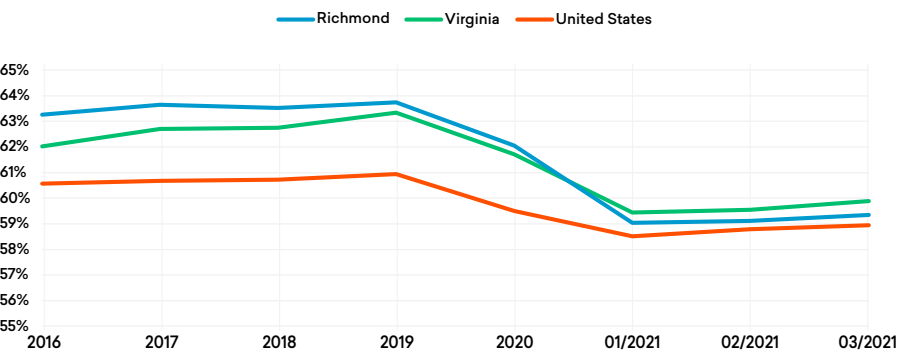
The labor force participation rate (LFPR) shows the labor force as a percentage of the civilian noninstitutional population. It is the percentage of the population employed or *looking for employment*. Prior to the pandemic, labor force



participation rates for both the Richmond region and Virginia were consistently higher than the national rate. However, the pandemic has forced participation rates downward, much closer to the national rate. Since we are experiencing a post-Covid recovery, it remains to be seen if national LFPR will recover to pre-pandemic levels. The pandemic and its lockdowns have certainly impacted LFPR to near-historic lows in the near-term.

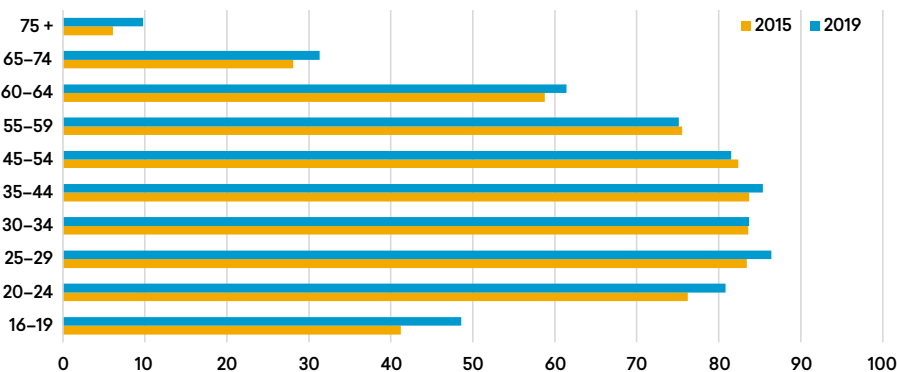
Prior to the pandemic, the Richmond region was making impressive progress in labor force participation across most age groups. Rates increased particularly so for younger workers between 16-29 years of age. This increased engagement was a good sign and one that Richmond will need to focus on during the recovery.

Figure 11: ANNUAL LABOR FORCE PARTICIPATION RATE, 2016-MARCH 2021



Source: Emsi Burning Glass Q2.2021 Dataset

Figure 12: LABOR FORCE PARTICIPATION RATE BY AGE GROUP, 2015-2019



Source: Emsi Burning Glass Q2.2021 Dataset

UNDEREMPLOYMENT



Richmond's workforce is grossly underemployed. To improve talent retention, it needs **employment opportunities** to match the workforce's level of education.

Underemployment describes portions of a population working in careers which do not fully utilize the education they have received. Emsi Burning Glass evaluates gaps between the educational attainment of a regional population and typical entry level job requirements of the region's jobs. Emsi Burning Glass uses detailed regional analysis of deltas between this supply and demand of education in a market to reveal underemployment.

The figure below depicts the percentage point difference between share of jobs and people to fill them by typical entry level education. Negative numbers indicate an oversupply of people while a positive number represents more jobs than people to fill them.

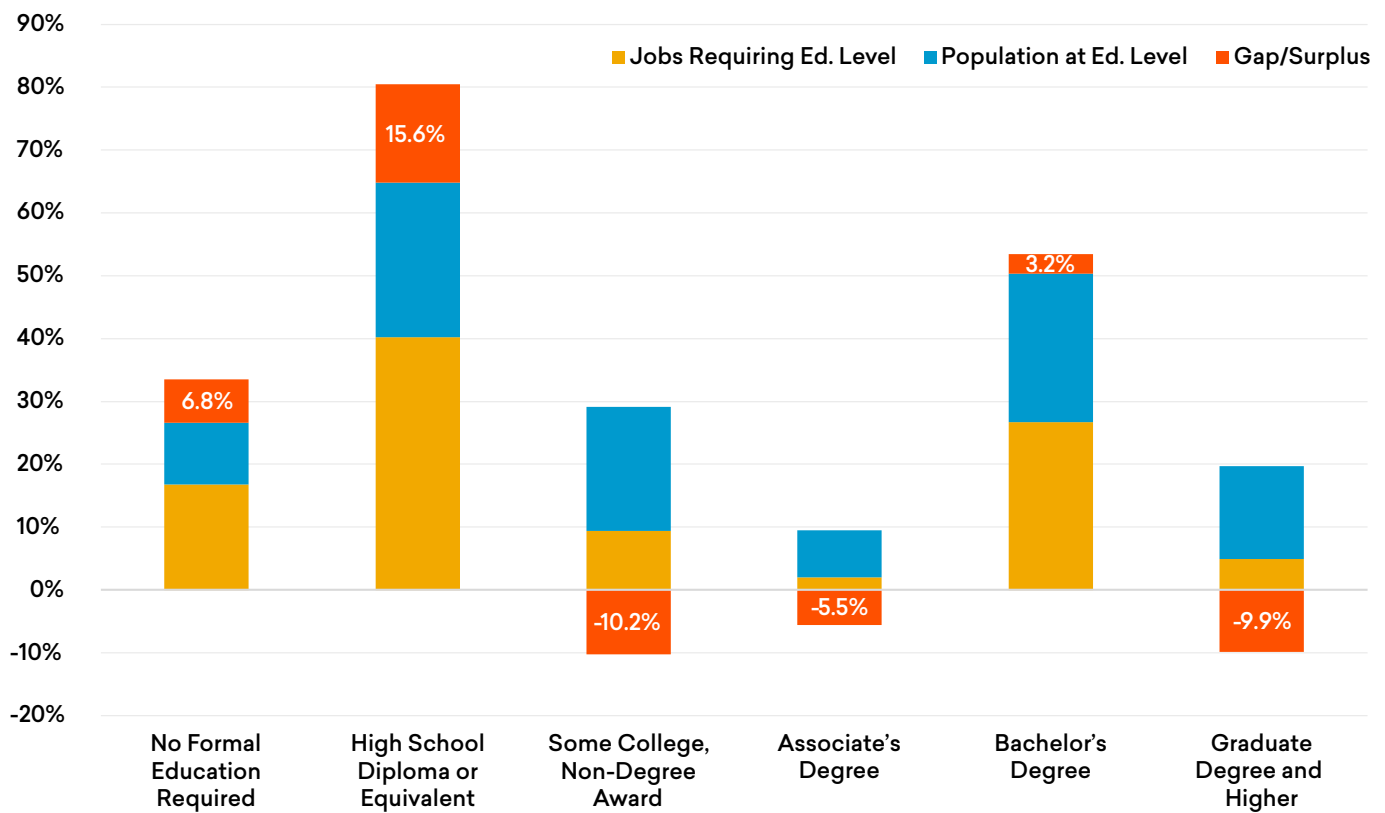
Roughly 26% of Richmond's population is underemployed. At the top end, there are more people with a graduate degree than there are jobs that require them. This could lead to several things occurring:

People with graduate degrees or higher must settle for jobs only requiring a bachelor's education. However, since there is a smaller gap of jobs requiring bachelor's degrees than there are people with graduate degrees, the more highly

educated could edge out those with just a bachelor's degree. This could lead to several things:

- Graduate degree holders could out-qualify bachelor's degree holders, essentially cascading the underemployment conundrum to the bachelor's degree level.
- People will pursue even more higher education (regardless of job education requirements) to compete with “more qualified” candidates. This “degree inflation” would only exacerbate the graduate-level degree oversupply unless job growth meets this added supply.
- Underemployed people, whether bachelor's or graduate degree holders, may simply leave Richmond and migrate to a place with more job opportunity that fits their education investment.

Figure 13: RICHMOND REGION UNDEREMPLOYMENT, 2020



Source: Emsi Burning Glass Q2.2021 Dataset

COMMUTING PATTERNS

Commuting patterns show how far workers travel from their places of residence to their places of work. This data demonstrates whether there is an adequate supply of workers or jobs within a given area. Commuting patterns were analyzed for the Richmond area using data from the Census LEHD's On the Map program. Then, Emsi Burning Glass proprietary data was analyzed to better understand the occupation mixes of these commuters.

Over 500,000 people live and work in the Richmond region. Roughly 115,000 people are residents of the area but commute to work outside of the MSA. However, roughly 157,000 people live outside the area but commute into the region to work, giving the region a net influx of over 40,000 workers per day. This net influx means there are more jobs than there are people. It also means the region benefits from an infusion of economic activity and spending from these daily commuters.

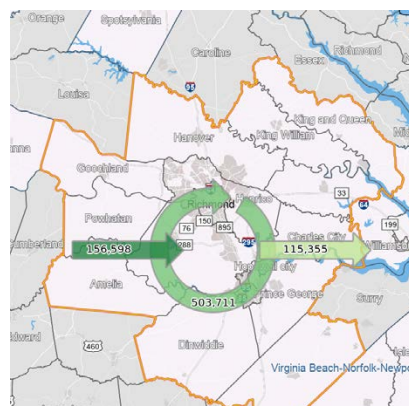
The City of Richmond gains the most daily commuters—the area has roughly 61,000 more in-commuters than out-commuters. On the other hand, Chesterfield County acts as a bedroom community with over 27,000 more out-commuters than in-commuters. Generally, the outer areas of the region have net out-commuting patterns towards the economic center of Richmond and Henrico County.

Over 70% of Richmond region residents commute to one of the following places: Henrico County, City of Richmond, Chesterfield County, or Hanover County. Richmond also has some connections with nearby metros:

- 16,150 residents commute to Fairfax County just outside DC. Another 14,971 commute to Norfolk, Virginia Beach, or Newport News.
- 10,031 Fairfax County residents commute to Richmond to work. Another 18,091 people commute from Virginia Beach, Newport News, or Norfolk to work in the Richmond region.

The Richmond region has a net influx of over **40,000** commuters per day. This net influx gives Richmond an infusion of economic activity and spending from daily commuters.

Figure 14: RICHMOND MSA COMMUTING PATTERNS, 2018



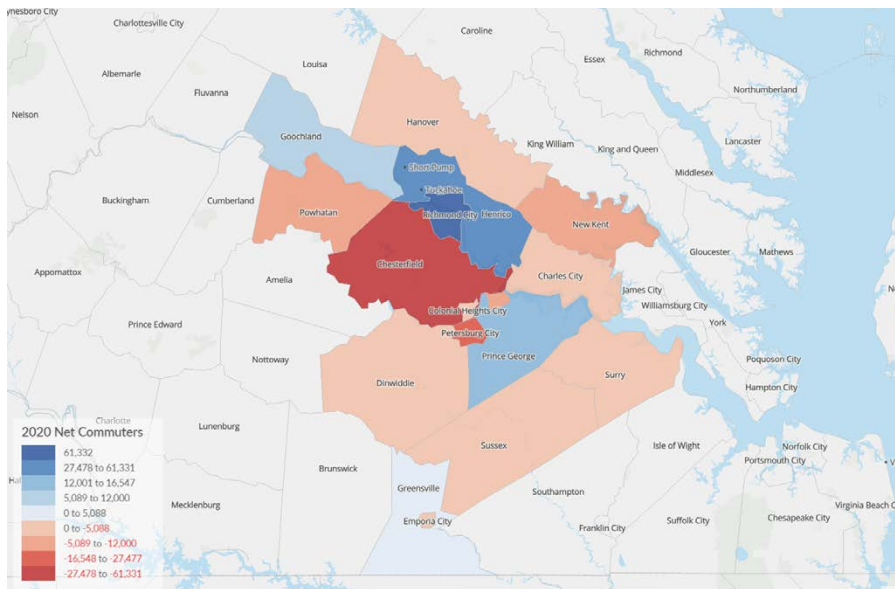
Source: U.S. Census Bureau, Center for Economic Studies, On the Map program (2018, all jobs)

Table 5: NET COMMUTERS OF RICHMOND REGION RESIDENT WORKERS, 2018-2020

	2018			2019			2020		
	Jobs	Resident Workers	Net Commuters	Jobs	Resident Workers	Net Commuters	Jobs	Resident Workers	Net Commuters
Richmond Region	709,911	667,591	42,320	714,821	672,839	41,982	689,733	649,002	40,731

Source: Emsi Burning Glass Q2.2021 Dataset

Figure 15: RICHMOND REGION NET COMMUTERS MAP, 2020

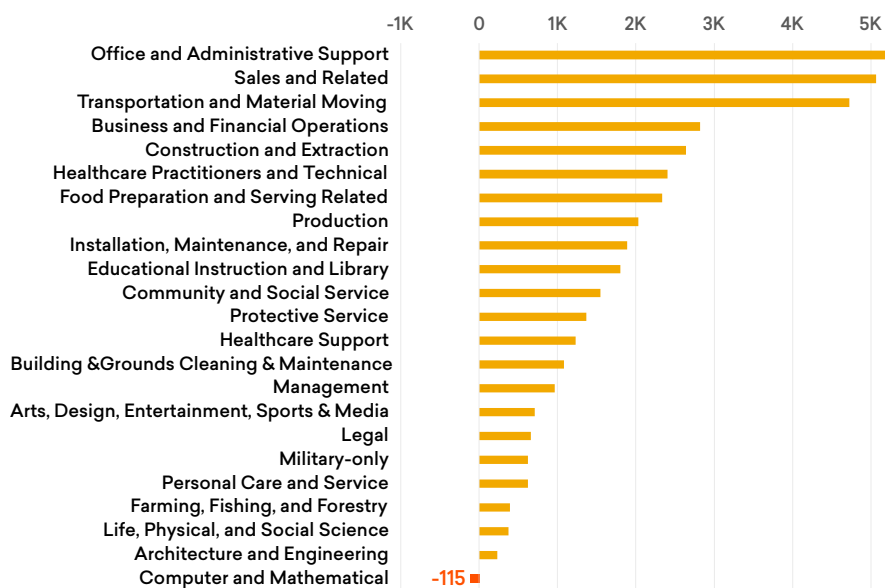


Source: Emsi Burning Glass Q2.2021 Dataset

Only a single occupation category at the SOC 2-digit level has a net out-commuting pattern in the region: In 2020, there were approximately 115 more out-commuters of computer & mathematical occupations than there were in-commuters. The largest net in-commuting occupations are:

- **Office & administrative support**
- **Sales**
- **Transportation & material moving**

Figure 16: RICHMOND REGION NET COMMUTERS BY OCCUPATION GROUPS, 2020



Source: Emsi Burning Glass Q2.2021 Dataset

Economy & Job Performance





The Richmond region economy grew to over \$81 billion gross regional product in 2020, up from \$70.7 billion in 2015. However, net job growth was tepid due to the Covid-19 pandemic. Government is the largest industry in the Richmond region, also contributing the most GRP (roughly \$11.8 billion). Despite Richmond being the state capital, its share of government employment is less than Virginia due to heavy federal employment associated with nearby Washington D.C. Richmond exceeds state levels of employment in healthcare, finance & insurance, and management of companies & enterprises (due to its 7 Fortune 500 companies).

The Richmond region accounts for over **16%** of Virginia's total economy, worth **\$81 billion** in gross regional product (GRP).

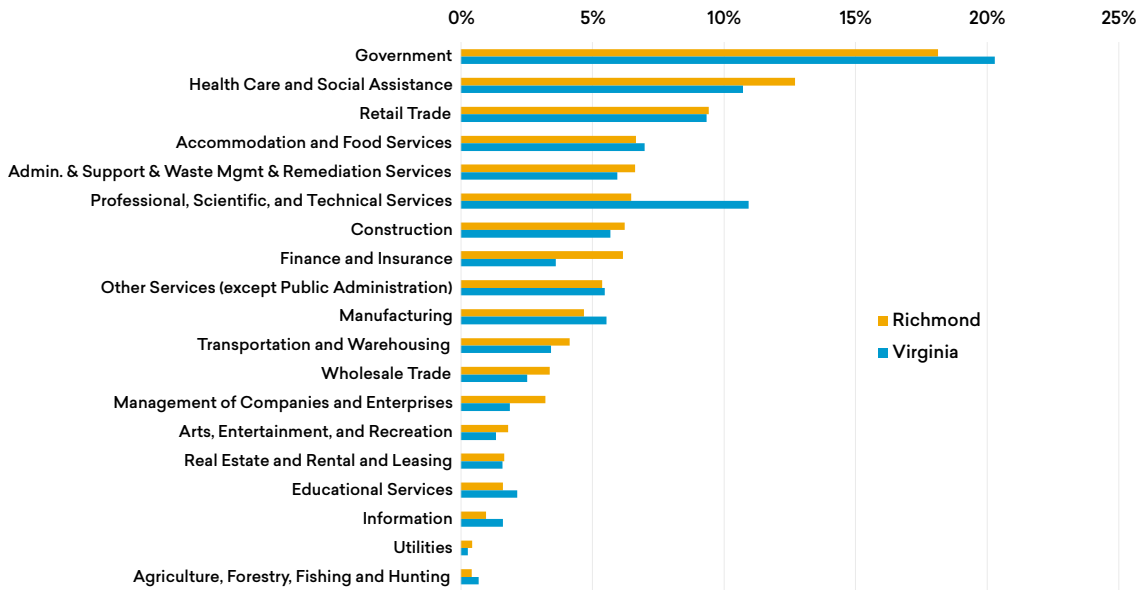
While manufacturing employment is far below the national average and only represents 4.7% of Richmond employment, it is very important to the area economy, contributing \$10.8 billion in GRP—third among industries.

To understand the region's most critical industries, we measure jobs by their concentration, or location quotient. Location quotients, or LQ, measures a region's industry concentration compared to the national average. An LQ above one indicates industry employment higher than the national average, while an LQ below one indicates industry employment below the national average. The Richmond region has highly concentrated employment in:

- Management of Companies & Enterprises
- Finance & Insurance
- Utilities
- Arts, Entertainment & Recreation
- Government

Richmond also has slightly higher than average concentrated employment in administrative support, waste management & remediation; construction; transportation & warehousing; and other services.

Figure 17: SHARE OF INDUSTRY EMPLOYMENT BY AREA, 2020



Source: Emsi Burning Glass Q2.2021 Dataset

Table 6: RICHMOND REGION INDUSTRY SECTOR LQS, 2020

Industry	2015 Jobs	2020 Jobs	Change in Jobs	2020 LQ
Management of Companies and Enterprises	21,466	22,092	626	2.19
Finance and Insurance	41,028	42,346	1,317	1.47
Utilities	2,734	2,892	158	1.22
Arts, Entertainment, and Recreation	12,192	12,381	189	1.19
Government	123,330	124,705	1,375	1.19
Admin. & Support & Waste Mgmt. & Remediation Services	44,348	45,515	1,168	1.09
Construction	39,816	42,783	2,967	1.08
Transportation and Warehousing	24,498	28,418	3,920	1.03
Other Services (except Public Administration)	38,577	36,870	-1,707	1.02
Health Care and Social Assistance	85,303	87,405	2,102	0.98
Retail Trade	69,647	64,859	-4,787	0.96
Professional, Scientific, and Technical Services	41,987	44,469	2,482	0.96
Real Estate and Rental and Leasing	10,409	11,268	859	0.95
Wholesale Trade	24,652	23,213	-1,439	0.92
Accommodation and Food Services	51,044	45,796	-5,248	0.88
Educational Services	11,978	11,006	-971	0.63
Manufacturing	32,099	32,169	69	0.60
Information	7,567	6,552	-1,014	0.52
Agriculture, Forestry, Fishing and Hunting	1,711	2,842	1,132	0.34
Mining, Quarrying, and Oil and Gas Extraction	463	422	-41	0.17

Source: Emsi Burning Glass Q2.2021 Dataset



Industry Health Check

To better gauge how industries are performing in the Richmond region and help determine where to concentrate economic development efforts, Emsi Burning Glass examined all industries at the NAICS 3-digit level using job growth and concentration (LQ) as indicators. We classified important industries using the following three-pronged criteria:

- **Emerging Industries**—LQ of 0.80-0.99, growth of at least 200 jobs
- **Industries Requiring Attention**—LQ at or above 1.10 in 2015, job losses
- **Growth Industries**—LQ of 1.2 and above, job growth

Emerging	Requires Attention	Growth
Food & Beverage Stores	State Government	Monetary Authorities-Central Bank
Ambulatory Health Care Services	Paper Manufacturing	Postal Service
Professional, Scientific, & Technical Services	Nonstore Retailers	Beverage & Tobacco Product Manufacturing
Construction of Buildings	Insurance Carriers & Related Activities	Management of Companies & Enterprises
Real Estate	Religious, Grantmaking, Civic, Professional, & Similar Organizations	Credit Intermediation & Related Activities
Transit & Ground Passenger Transportation	Heavy & Civil Engineering	Chemical Manufacturing
Building Material & Garden Equipment & Supplies Dealers	Construction	Federal Government
Local Government	Funds, Trusts, & Other Financial Vehicles	Warehousing & Storage
	Personal & Laundry Services	Couriers & Messengers
	Wood Product Manufacturing	Amusement, Gambling, & Recreation Industries
		Utilities

Source: Emsi Burning Glass Criteria—for detailed data see Appendix

EMERGING INDUSTRIES

Emerging industries are those whose concentrations are currently below or hovering around the national average, but jobs are increasing and demonstrate a strong enough base for further concentration. Despite job growth, most of the emerging industry LQs did not increase substantially between 2015 and 2020 except for:

- **Food & beverage stores**—adding 844 jobs, LQ going from 0.91 to 0.98
- **Transit & ground passenger transportation**—adding 865 jobs going from 0.65 to 0.91

Ambulatory healthcare services (+2,563 jobs) and professional, scientific, & technical services (+2,482 jobs) added the most jobs of this group, but the LQs did not noticeably increase suggesting growth on pace with national growth. Real estate and construction of buildings had modest LQ improvement but enjoyed double-digit job growth percentages.

INDUSTRIES REQUIRING ATTENTION

There are industries that are important to the region's economy but may be struggling and need some attention. These industries reveal a loss of jobs over time but have higher LQs. For instance, employment in civil society organizations (religious, grantmaking, civic, professional, or otherwise) shed 1,535 jobs (a 10% decline) with its LQ dropping from 1.26 to 1.17. Non-store retailers once had an LQ of 1.53, but its employment fell by half resulting in an LQ of 0.70.

One small sector in terms of employment stood out: funds, trusts, and other financial vehicles had small employment of 37 people in 2015, but a respectable LQ of 1.16. However, by 2020 it had only lost 5 jobs, but the LQ plummeted to 0.40. In other words, this industry grew rapidly nationwide, but skipped Richmond. US employment in this industry was just 7,290 in 2015 but more than doubled to 18,354 by 2020. Why? We suspect that the rising massive retirements of baby boomers, the wealthiest and largest generation in US history, has something to do with the growing demand for trusts and management of generational assets.

GROWTH INDUSTRIES

The more concentrated an industry, the more likely it is the industry is exporting products and services, thereby bringing wealth to the region. Industries important to the area have experienced healthy job growth with an LQ above 1.2. These industries are considered the Richmond region's areas of specialty and can provide opportunities for industry and supply chain expansion.

In terms of overall employment, Richmond's top growth industries are couriers & messengers (+1,855 jobs), unclassified industry (+1,416 jobs), federal government (+1,251 jobs), and credit intermediation (+1,201 jobs). Employment concentration has increased rapidly for postal service and unclassified industry.

Unclassified industry employment was just 313 in 2015 with an LQ of 0.30 but rose to 1,729 jobs by 2020 with an LQ of 2.71. What's going on here? Nationwide, this employment fell by 38% but it grew by 452% in Richmond. "Unclassified industry (999) is used by Quarterly Census of Employment and Wages to categorize businesses who did not report a NAICS code. These are mostly newer businesses who have not yet determined their proper NAICS code. The BLS sends a special form to these businesses to help them determine their proper NAICS so that future reporting is improved."⁶ In other words, it could be associated with new businesses & entrepreneurship. For instance, the number of "unclassified





industry” business locations also grew from 188 to 882 in the same period, the second largest growth of locations among industries. We won’t know more until these businesses eventually declare their proper industry sector.

Beverage & tobacco product manufacturing as well as management of companies & enterprises are also critical industries which have enjoyed employment growth. Considering Richmond’s focus on logistics, it is no surprise warehousing & storage also makes the “growth industries” list. However, despite adding 544 jobs, Richmond’s LQ shrank from 2.27 to 1.45. This means the region is likely losing expansion opportunities to outside regions since national growth is exceeding regional growth in this sector.

Regional Business Dynamics

Analyzing an area’s business mix provides a useful snapshot of the firm dynamics of a regional economy. The number, sizes, and types of firms say much about the character, dependencies, and growth opportunities within a region. In 2015, there were over 36,600 business locations with paid employees in the region. This number grew by over 3,033 to reach 39,652 by 2020, an 8.3% growth. Healthcare & social assistance added the most locations, followed by unclassified industry as mentioned above. Other services also expanded greatly. Only a few industries declined in number of locations: information, retail, wholesale trade, and professional, scientific & technical services.

The Richmond economy added **over 3,000** business locations between 2015 and 2020, an **8.3% growth**.

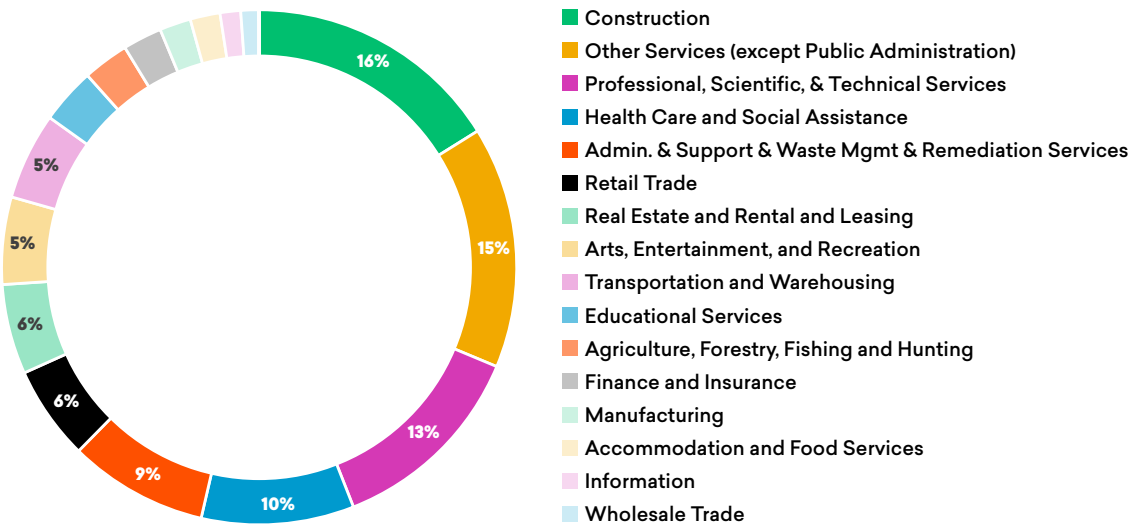
Table 7: NUMBER OF PAYROLLED BUSINESS LOCATIONS BY 2-DIGIT NAICS

Industry	NAICS	2015 Payrolled Business Locations	2020 Payrolled Business Locations	Growth/Decline
Health Care and Social Assistance	62	6,540	7,896	1,356
Unclassified Industry	99	188	882	694
Other Services -except Public Administration	81	3,271	3,877	606
Real Estate and Rental and Leasing	53	1,346	1,559	213
Accommodation and Food Services	72	2,486	2,660	174
Admin. & Support & Waste Mgmt. & Remediation Services	56	1,958	2,125	167
Transportation and Warehousing	48	783	887	104
Arts, Entertainment, and Recreation	71	460	517	57
Finance and Insurance	52	2,096	2,123	27
Educational Services	61	427	452	25
Construction	23	3,283	3,302	19
Utilities	22	59	72	13
Government	90	928	939	11
Manufacturing	31	1,059	1,068	9
Agriculture, Forestry, Fishing and Hunting	11	132	136	4
Management of Companies and Enterprises	55	385	388	3
Mining, Quarrying, and Oil and Gas Extraction	21	28	28	0
Information	51	465	448	-17
Retail Trade	44	4,004	3,892	-112
Professional, Scientific, and Technical Services	54	4,624	4,465	-159
Wholesale Trade	42	2,098	1,938	-160

Source: Emsi Burning Glass Q2.2021 Dataset

Over 33,300 people are self-employed in the Richmond economy. The largest part of these self-employed persons is in construction or other services, followed by 13% of which employed in professional, scientific & technical services. The Richmond region's share of self-employed persons in the overall economy (4.8%) is less than Virginia (5.4%) and the United States (6.5%).

Figure 18: INDUSTRY SHARE OF SELF-EMPLOYED, 2020



Source: Emsi Burning Glass Q2.2021 Dataset



OCCUPATIONS

Occupation data gives a greater sense of regional economic trends. This is because earning and educational levels of workers are associated more directly with occupations than with the industry in which they work. For example, the manufacturing industry, while employing assemblers and machine operators—also employs people in management occupations and in professional occupations such as accountants, HR specialists, and marketing analysts. All of these occupations have different pay scales and require varying levels of education and training.

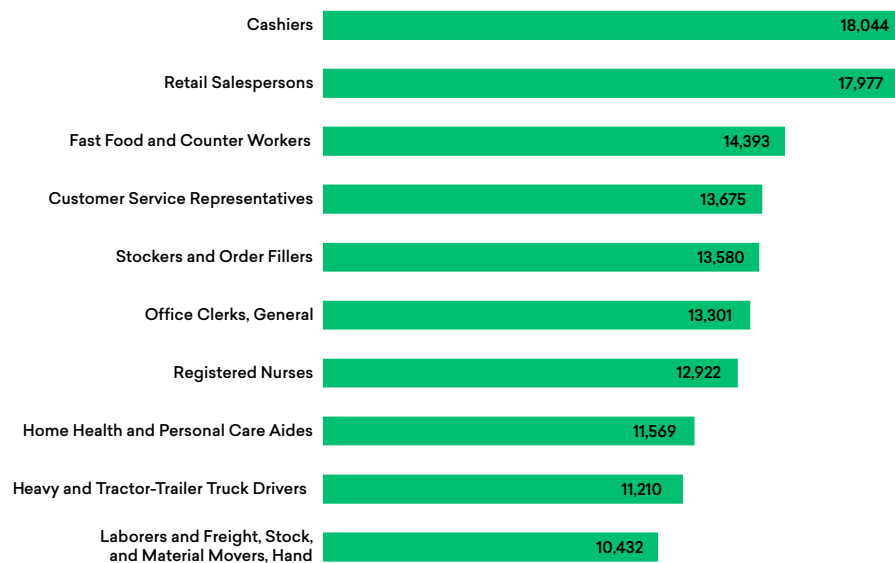
The most numerous occupations in the region tend to require less education—such as cashiers, retail salespersons, and fast-food workers. Healthcare occupations (such as registered nurses and home health aides) and logistics occupations (such as stockers, truck drivers, and material movers) feature heavily as the largest occupations.

When examining occupation concentration, some of Richmond's unique strengths are revealed. Richmond is equidistant between two nuclear power generating stations (North Anna and Surry), causing a high number of nuclear engineers and technicians to locate in the region. In fact, Surry County has the highest concentration of nuclear engineers and technicians in the country. Richmond's focus on the finance & insurance industry means that it has the 15th highest concentration of financial clerks in the country.

Some of the Richmond region's largest occupations—such as cashiers, retail salespersons, and stockers & order fillers—are also projected to decline.

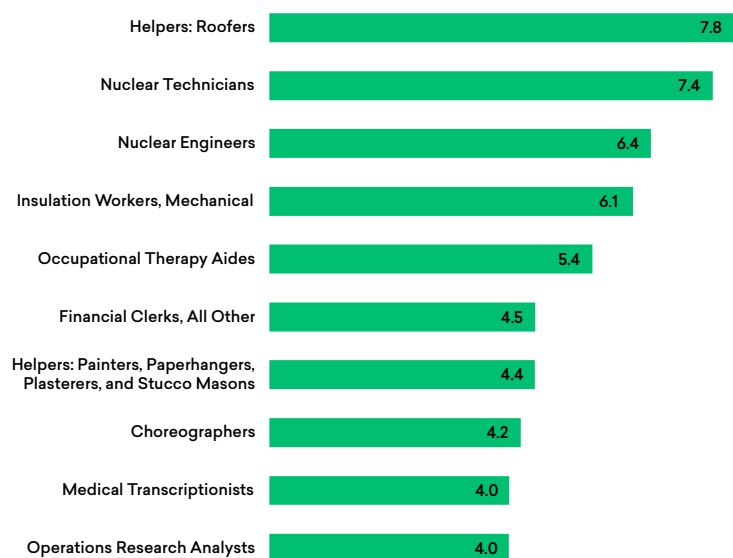
At the same time, large employment in logistics-related occupations is expected to expand.

Figure 19: LARGEST RICHMOND OCCUPATIONS BY EMPLOYMENT, 2020



Source: Emsi Burning Glass Q2.2021 Dataset

Figure 20: RICHMOND OCCUPATIONS WITH HIGHEST LOCATION QUOTIENT, 2020



Source: Emsi Burning Glass Q2.2021 Dataset

Table 8: PROJECTED OCCUPATION GROWTH, 2020-2025

SOC Title	SOC Code	2020 Jobs	2025 Jobs	2020-2025 Change	2020-2025 % Change	2020 Location Quotient	Median Hourly Earnings
Transportation & Material Moving	53-0000	58,248	61,210	2,962	5%	1.02	\$15.45
Healthcare Support	31-0000	28,412	31,037	2,625	9%	0.90	\$13.31
Healthcare Practitioners & Technical	29-0000	42,549	44,912	2,362	6%	1.08	\$33.79
Business & Financial Operations	13-0000	53,469	55,620	2,151	4%	1.32	\$35.23
Management	11-0000	33,859	35,948	2,089	6%	0.79	\$50.79
Computer & Mathematical	15-0000	23,274	24,565	1,290	6%	1.10	\$45.08
Construction & Extraction	47-0000	32,800	33,853	1,053	3%	1.02	\$20.64
Community & Social Service	21-0000	15,997	16,905	907	6%	1.30	\$22.50
Personal Care & Service	39-0000	18,314	19,110	796	4%	0.93	\$11.69
Production	51-0000	26,727	27,519	791	3%	0.69	\$18.06
Educational Instruction & Library	25-0000	37,755	38,537	782	2%	0.92	\$23.73
Installation, Maintenance, & Repair	49-0000	27,512	28,185	673	2%	1.02	\$24.39
Arts, Design, Entertainment, Sports, & Media	27-0000	11,700	12,289	590	5%	0.94	\$23.41
Office & Administrative Support	43-0000	89,808	90,338	529	1%	1.05	\$18.99
Farming, Fishing, & Forestry	45-0000	1,869	2,218	349	19%	0.35	\$14.05
Military-only	55-0000	6,874	7,174	300	4%	1.61	\$20.90
Architecture & Engineering	17-0000	9,326	9,623	297	3%	0.81	\$39.52
Life, Physical, & Social Science	19-0000	6,473	6,753	280	4%	1.00	\$30.55
Protective Service	33-0000	18,182	18,442	260	1%	1.20	\$20.75
Food Preparation & Serving Related	35-0000	46,314	46,570	256	1%	0.90	\$10.83
Legal	23-0000	7,239	7,481	242	3%	1.22	\$37.90
Sales & Related	41-0000	68,886	68,920	33	0%	1.08	\$13.98
Unclassified Occupation	99-0000	0	0	0	0%	0	0
Building & Grounds Cleaning & Maintenance	37-0000	24,146	24,119	-27	0%	0.98	\$12.72

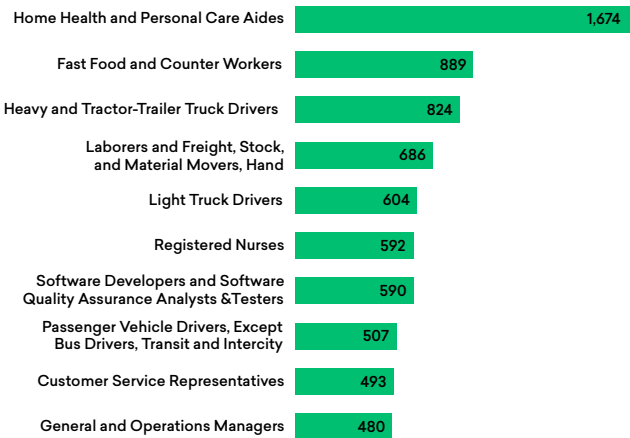
Source: Emsi Burning Glass Q2.2021 Dataset



The Richmond region is expected to add the most jobs in the transportation & material moving occupation category. In fact, these occupations may grow by almost 3,000 jobs between 2020 and 2025. The region will also add thousands more in healthcare and business professional-related occupations. Despite having a high concentration of legal occupations (LQ of 1.22), only modest growth of 3% is expected. The only major occupation category with projected job decline is building & grounds cleaning & maintenance.

When considering occupations at a more specific level (5-digit SOC), home health & personal care aides are projected to grow the most. Employment of registered nurses, whose employment took a hit during the pandemic, is expected to rebound. Just as logistics-related occupations are some of the largest, they are also projected to grow the most: light and heavy truck drivers and material movers are all within the top 10 largest growth projected occupations.

Figure 21: OCCUPATIONS WITH LARGEST PROJECTED JOB GROWTH, 2020-2025



Source: Emsi Burning Glass Q2.2021 Dataset

Figure 22: OCCUPATIONS WITH LARGEST PROJECTED JOB DECLINE, 2020-2025



Source: Emsi Burning Glass Q2.2021 Dataset

Much of the projections for occupation declines are influenced by the 2020 pandemic trend. Employment growth/decline models perform better during status quo but have difficulty accounting for shocks like a pandemic. For instance, a sharp decline in restaurant servers and retail salespersons is projected. While retail was already affected by growing e-commerce, the pandemic accelerated its decline.

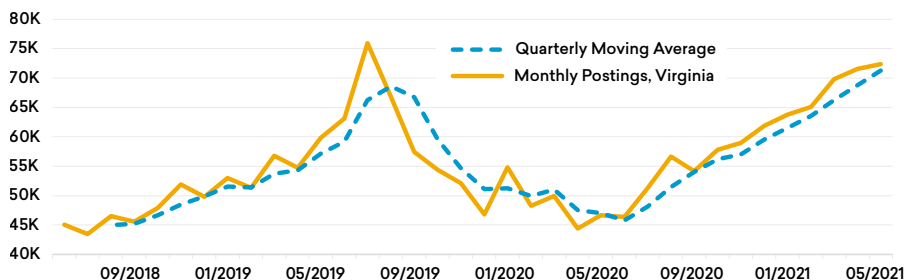
REAL-TIME DATA



Richmond job posting fervor meets 2019 peak levels—employers desperately need talent and **opportunities** **abound** for **job seekers**.

Using Job Posting Analytics, Emsi Burning Glass can track internet job postings in real-time, matching unique job postings with job title, occupation, company, pay, and skills requirements. In July 2019, the Richmond region had almost 76,000 unique job postings—an indicator of red-hot job opportunities. Activity level afterwards plummeted, even before the pandemic struck. Unique job postings bottomed out in April 2020, the height of the pandemic but have since recovered to match 2019 peak levels. As the economy opened, employers desperately needed workers. In many cases, aftershocks of the pandemic are still being felt.

Figure 23: UNIQUE JOB POSTINGS BY MONTH, JUNE 2018–MAY 2021

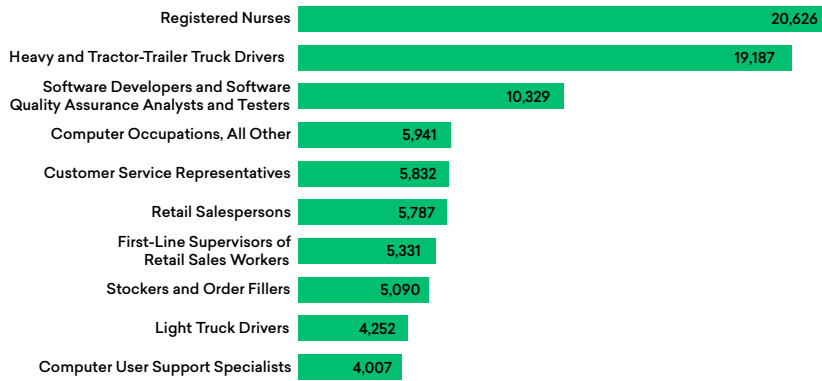


Source: Emsi Burning Glass Q2.2021 Dataset

Perhaps defying the projected decline, registered nurses is the single most posted occupation on job boards in the region. Logistics-related occupations are also highly sought after, which meets projection expectations. Tech occupations are also in high demand—software developers, computer user support specialists, and other computer occupations are in the top 10 highest unique postings since June 2020.



Figure 24: UNIQUE POSTINGS BY OCCUPATION, JUNE 2020–MAY 2021

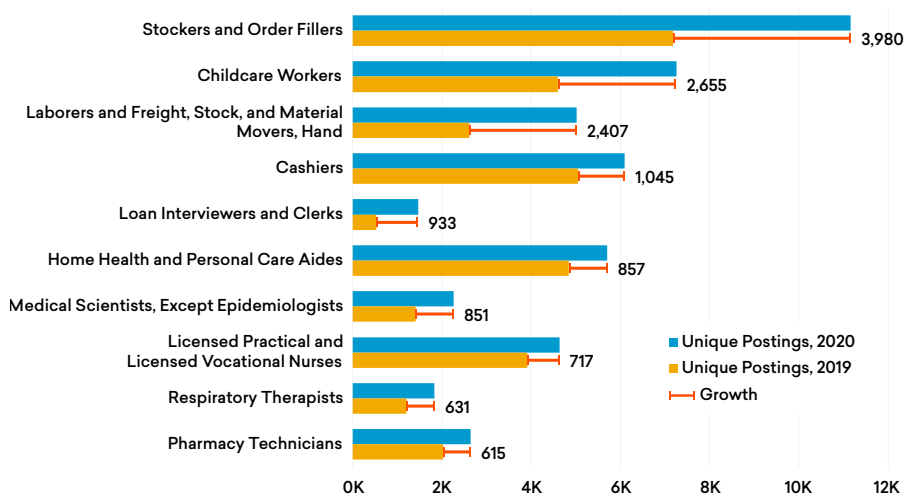


Source: Emsi Burning Glass Q2.2021 Dataset

We examined each occupation's total unique postings in both 2019 and 2020 to measure the pandemic's impact on job posting activity. Some of the largest increases in postings seem to match our experience during the pandemic: stockers & order filler demand nearly doubled as e-commerce became the preferred method of shopping in order to observe social distancing. Child worker postings grew—likely connected to school shutdowns. Surprisingly, loan interviewers and clerks posting demand more than doubled.

Mirroring government reported data, registered nurse demand (in terms of postings) declined. Some tech occupation postings also declined such as software developers, information security analysts, and other computer occupations. Despite the decline in registered nurse postings, the demand for nursing as a skill did not decline. Warehousing-related hard skills increased the most. Other prominent hard skills that increased are merchandising, basic life support, customer experience, automation, and AWS.

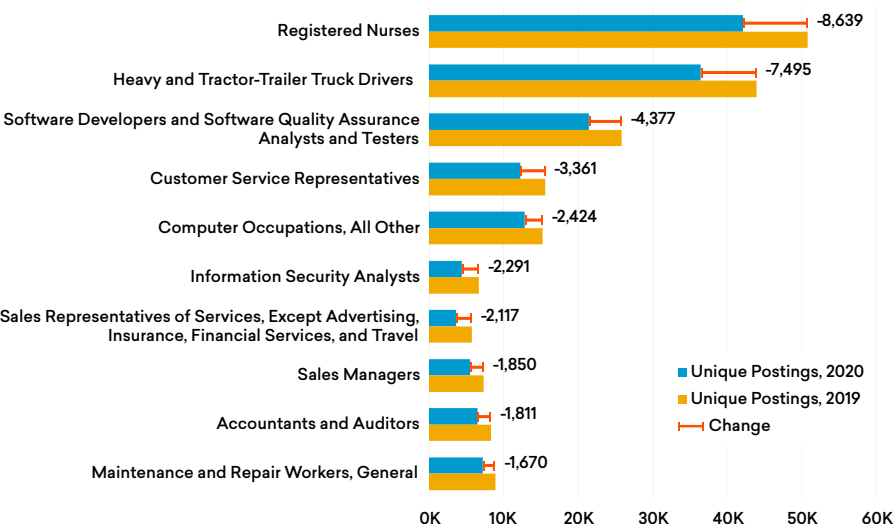
Figure 25: TOP OCCUPATIONS WITH 2020 POSTINGS ABOVE 2019 POSTINGS



Source: Emsi Burning Glass Q2.2021 Dataset

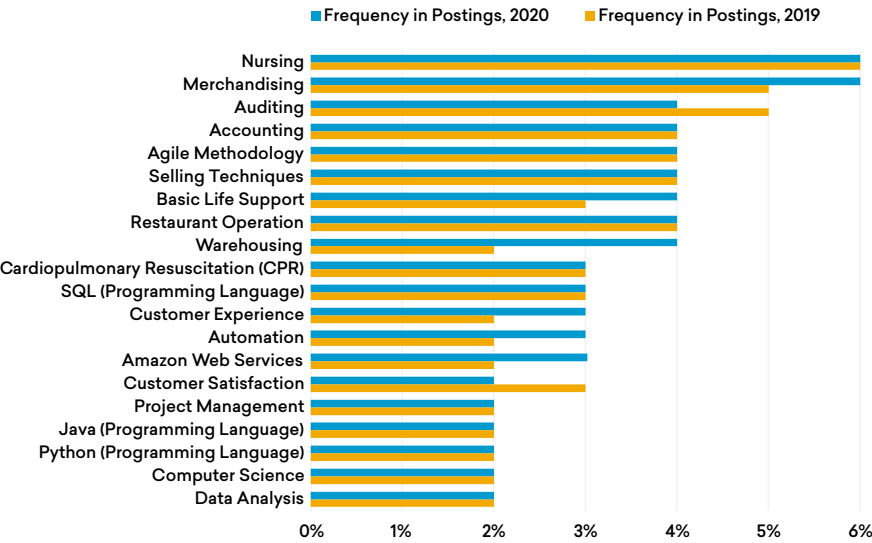


Figure 26: TOP OCCUPATIONS WITH 2020 POSTINGS BELOW 2019 POSTINGS



Source: Emsi Burning Glass Q2.2021 Dataset

Figure 27: POSTINGS FOR HARD SKILLS, 2019 AND 2020



Source: Emsi Burning Glass Q2.2021 Dataset

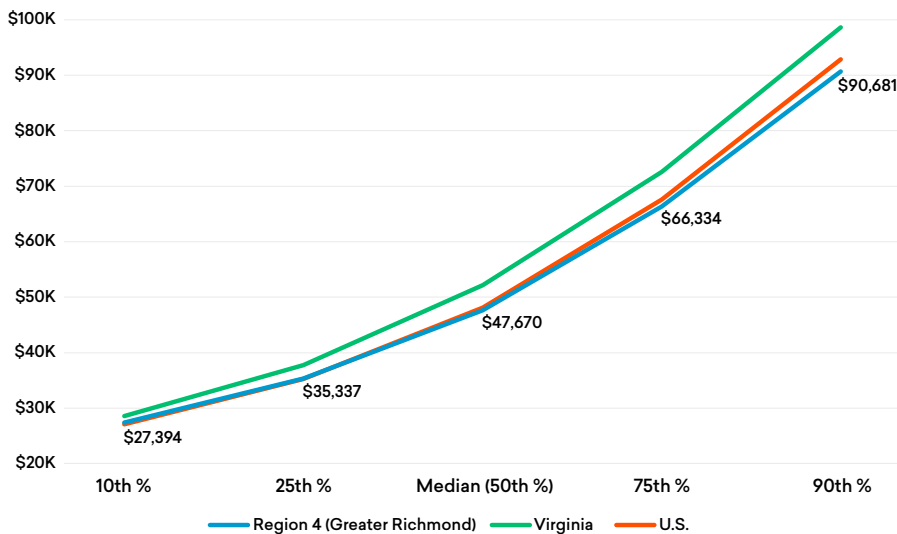
COMPENSATION



Although wages in the Richmond Region are **on par with the United States**, residents may feel like they earn slightly less due to the area's cost of living.

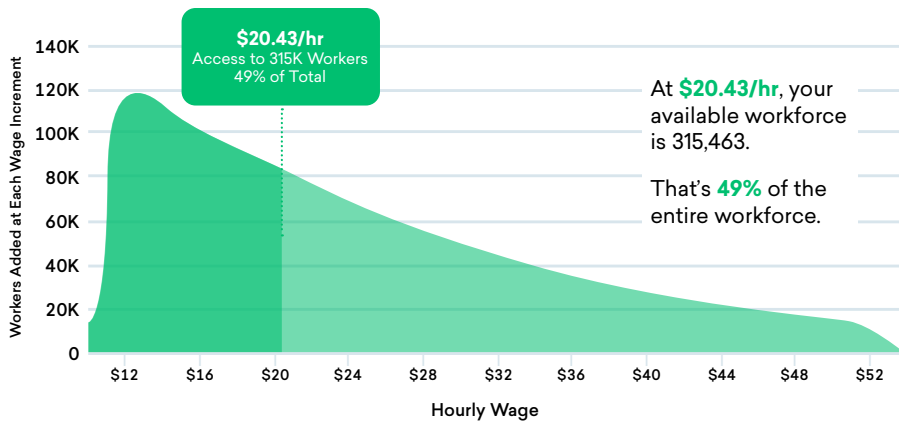
Wages in the Richmond region seem on par with the country but tend to be lower than Virginia. This wage discrepancy widens in the upper percentiles. The figure below demonstrates how many additional workers can be captured by an increase in wage, based on the current wage distribution of workers in the region. It is a nice visual representation of the median wage of \$20.43/hr. For instance, at \$24/hr, another 70,000 workers become available. We can also see the wage distribution of the region by years of experience. For instance, the median wage of \$42,758 is comparable to someone with 7 years of experience. After 15 years of experience, someone in Richmond could expect to earn \$52,889 annually.

Figure 28: RICHMOND REGION WAGE DISTRIBUTION, ALL OCCUPATIONS



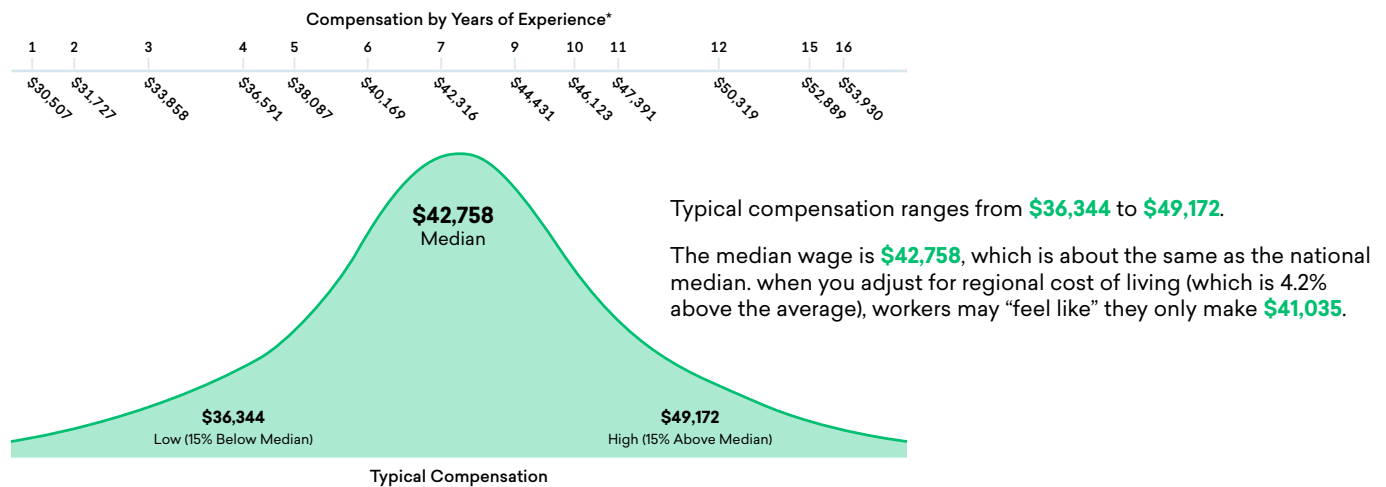
Source: Emsi Burning Glass Q2.2021 Dataset

Figure 29: RICHMOND REGION AVAILABLE WORKFORCE BY WAGE INCREMENT



Source: Emsi Burning Glass Q2.2021 Data Set

Figure 30: RICHMOND REGION COMPENSATION BY YEARS OF EXPERIENCE



Region	10th Pct.	25th Pct.	50th Pct.	75th Pct.	90th Pct.
Chamber RVA Region	\$21,149	\$28,186	\$42,758	\$66,803	\$102,039
Nation	\$23,338	\$29,320	\$42,058	\$66,613	\$103,820
COL-Adjusted Chamber RVA Region	\$20,298	\$27,050	\$41,035	\$64,110	\$97,926

Source: Emsi Burning Glass Q2.2021 Data Set

*Only the median compensation for each cohort is plotted. In reality, compensation for a cohort will range above and below the plotted point.

CHAPTER 4:

Education and Training Supply and Demand



INSTITUTIONS AND PROGRAMS

- **15,501** annual regional completions at Richmond colleges & universities⁷
- **18** higher education institutions⁸
- **222** active programs⁹



With just as many **colleges and universities** per capita as Boston, Richmond is also wicked smaht ...

Top 10 of the 18 degree-granting institutions have added a considerable amount of completions between 2009 and 2019, but between 2013 and 2019 this growth has slowed considerably. This could indicate a saturated education market. It will be interesting to see the pandemic's impact on completion numbers, both immediate and medium-term.

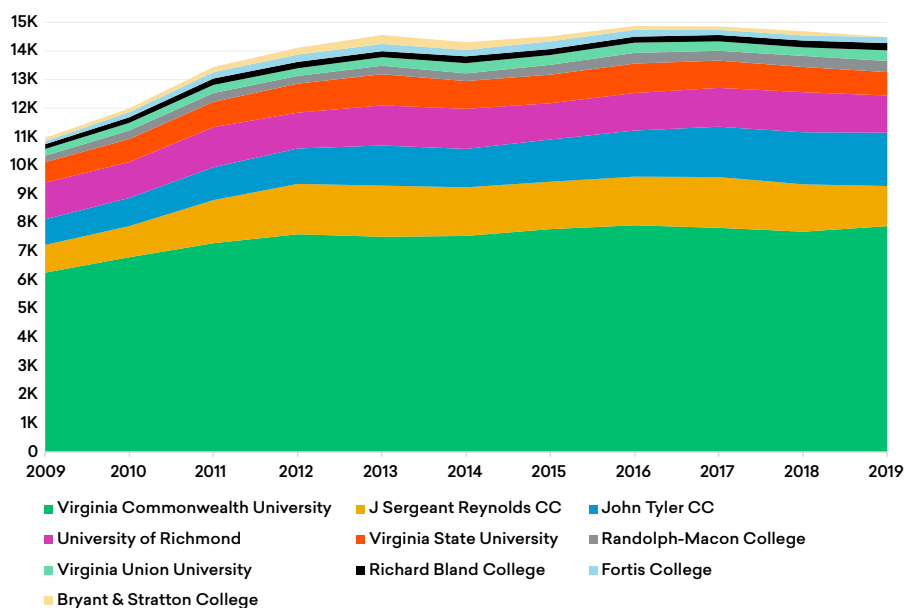
Virginia Commonwealth University is by far the largest institution, followed by J Sergeant Reynolds Community College and John Tyler Community College, which each serve between 1,500 and 1,800 completions at the certificate or associate's degree level annually. The University of Richmond and Virginia State University are the next largest before the size of higher education institutions in the region drops off significantly.

⁷ 2018 figures

⁸ Excluding seminaries and beauty schools

⁹ 2019 figure based on any CIP 5-digit program with a completion

Figure 31: POSTSECONDARY COMPLETIONS BY TOP 10 INSTITUTIONS, 2009–2019

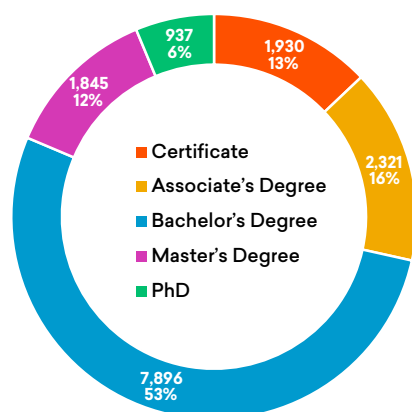


Source: Emsi Burning Glass Q2.2021 Dataset

Roughly half of all regional completions are bachelor's degrees (53%), followed by associate's degrees (16%), certifications (13%), master's degrees (12%), then doctoral degrees (6%). Only the bachelor's degree level has expanded significantly over the years. Certifications also grew overall but declined sharply in 2019. The other completion levels have remained steady. The table below shows completions by institution and degree type:

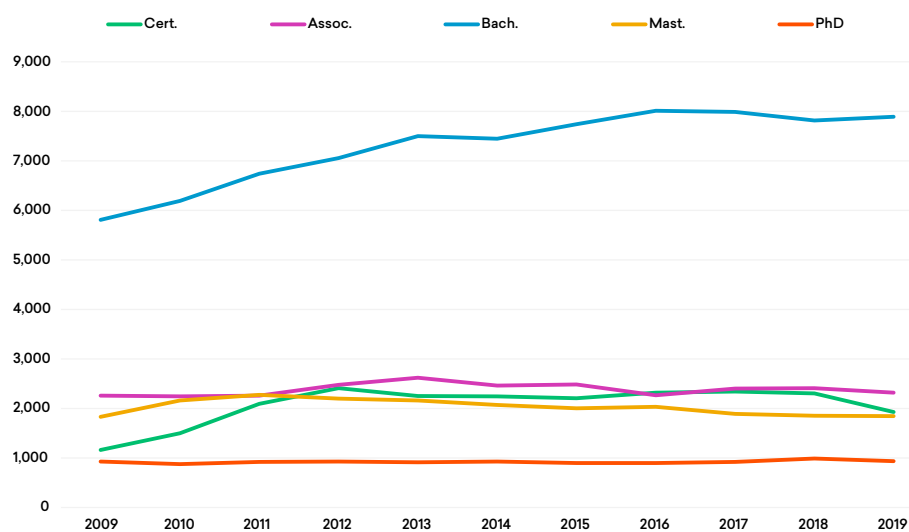
- 12 institutions offer associate's degrees
- 7 institutions offer bachelor's degrees
- 6 institutions offer master's degrees, and
- 6 institutions offer doctoral degrees

Figure 32: RICHMOND REGION POST-SECONDARY COMPLETIONS BY AWARD LEVEL, 2019



Source: Emsi Burning Glass Q2.2021 Dataset

Figure 33: RICHMOND REGION POST-SECONDARY COMPLETIONS BY AWARD LEVEL, 2009-2019



Source: Emsi Burning Glass Q2.2021 Dataset

Table 8: RICHMOND DEGREE COMPLETIONS BY INSTITUTION & DEGREE LEVEL, 2018

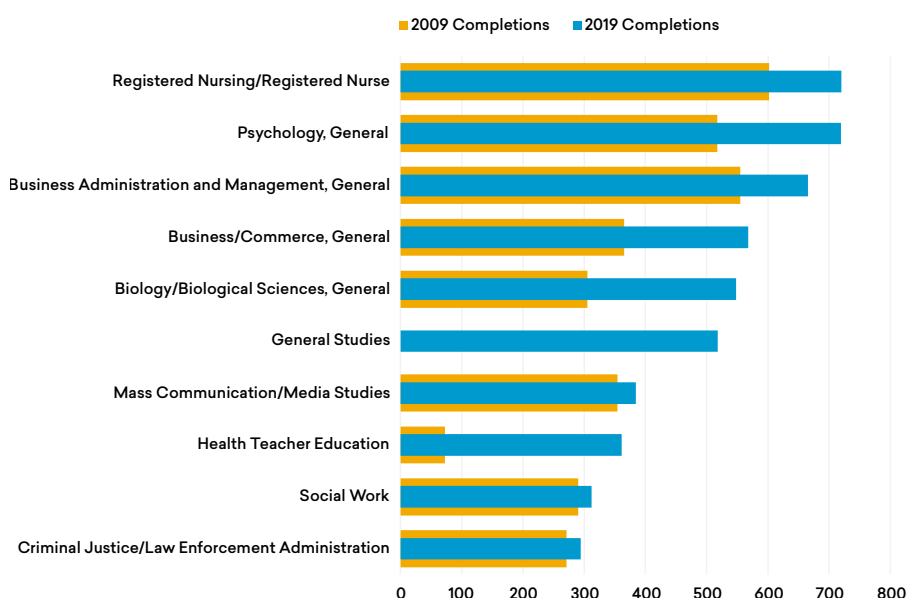
Institution	Associate's Degree	Bachelor's Degree	Master's Degree	Doctor's Degree
Randolph-Macon College	-	379	-	-
Bon Secours Memorial College of Nursing	-	153	-	-
Bon Secours School of Medical Imaging	16	-	-	-
Union Presbyterian Seminary	-	-	48	3
Virginia Commonwealth University	-	5,195	1,414	770
Virginia Union University	-	204	92	16
J Sargeant Reynolds Community College	928	-	-	-
John Tyler Community College	920	-	-	-
Richard Bland College	227	-	-	-
Bryant & Stratton College-Richmond	104	30	-	-
Southside College of Health Sciences	53	-	-	-
Virginia College-Richmond	61	-	-	-
Fortis College-Richmond	19	-	-	-
Centura College-Richmond Main	37	-	-	-
Chester Career College	30	-	-	-
South University-Richmond	26	103	43	0
Virginia State University	-	731	126	13
University of Richmond	1	1,020	119	183
Total	2,406	7,815	1,852	990

Source: Emsi Burning Glass Q2.2021 Dataset

EDUCATION GAPS & SURPLUSES

Emsi Burning Glass examined program completions across all institutions to identify the largest pipelines and their growth over a 10-year period. Nursing and Psychology are tied for the largest degree programs, both of which have expanded since 2009. The top programs which have grown the most are General Studies (+518), Health Teacher Education (+288), Biology (+243), Business (+203), and Psychology (+202).

Figure 34: TOP DEGREE PROGRAMS IN RICHMOND REGION



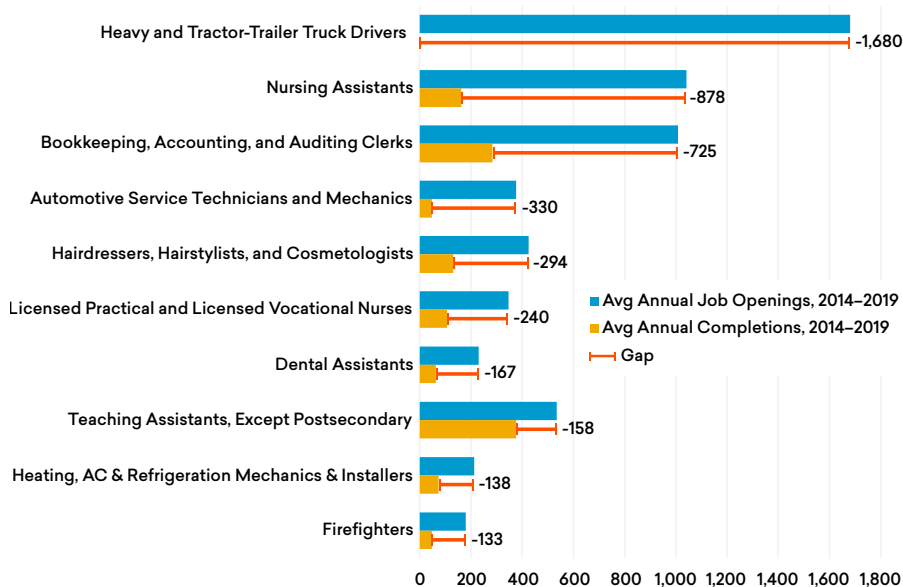
Source: Emsi Burning Glass Q2.2021 Dataset

By examining the average annual openings for occupations in the Richmond region compared to the average annual completions over the same period, we can see if there is a supply surplus or gap relative to job demand. For occupations requiring a certification or some college, there is an enormous gap for truck drivers. Though this is a national trend, Richmond would do well to address this gap given that logistics is a target sector with complementary regional assets, such as the Army's logistics focus in the area. There are also large regional pipeline gaps for nursing assistants and bookkeeping, accounting & auditing clerks.

Though Logistics is a key industry for Richmond, **critical gaps exist** in the talent pipeline for occupations such as logisticians and truck drivers.

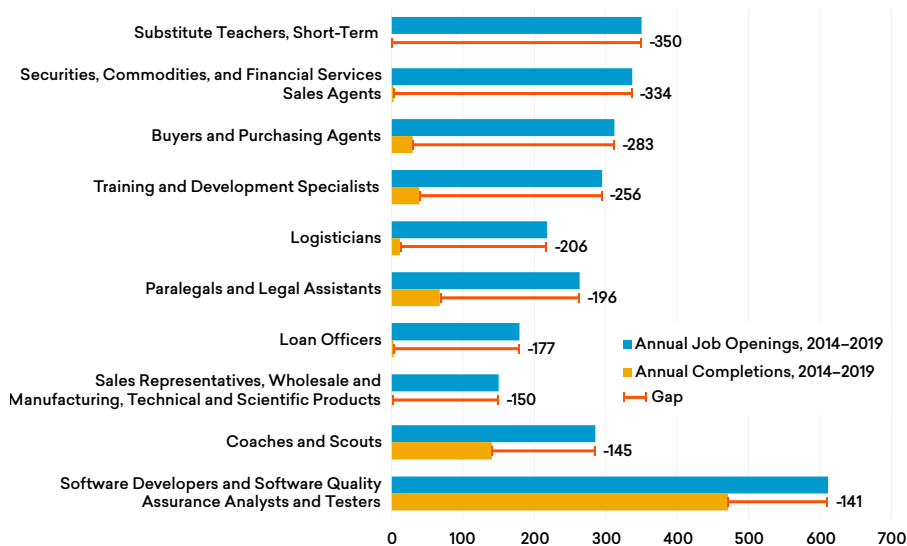
For occupations requiring a degree (from associate's to doctorate level), the largest gaps exist for short-term substitute teachers and securities, commodities, & financial sales agents. The talent gaps in the logistics sector also reveal themselves at this education level: only a few logisticians are produced relative to the regional demand, indicating talent is likely sourced from out-of-market. Though the region does produce a good amount of software developers, the pipeline could be expanded to meet regional demand.

Figure 35: TOP GAPS FOR OCCUPATIONS REQUIRING CERT. OR SOME COLLEGE



Source: Emsi Burning Glass Q2.2021 Dataset

Figure 36: TOP GAPS FOR OCCUPATIONS REQUIRING A DEGREE



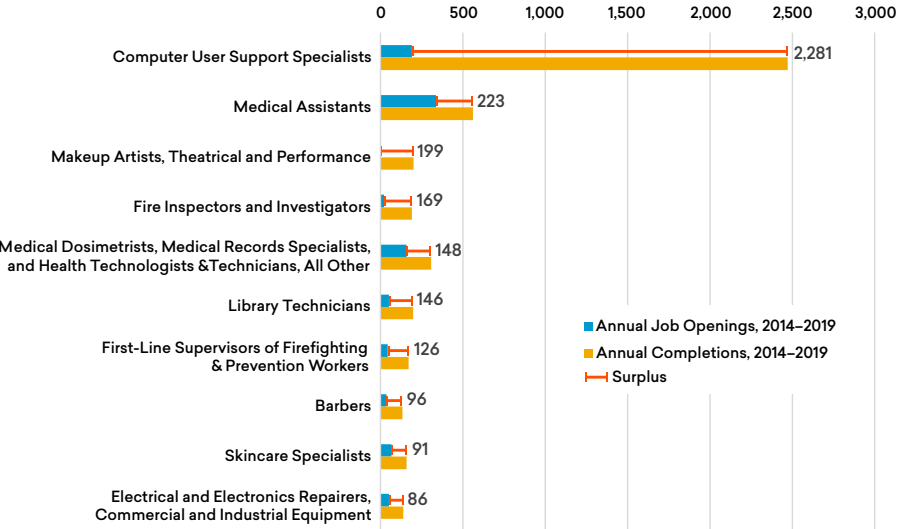
Source: Emsi Burning Glass Q2.2021 Dataset



Approaching this analysis from the other side, we can examine which occupations are saturated with talent supply which could lead to retention issues, but also business attraction and expansion opportunity. For occupations requiring a certification or some college, the region produces far more people with potential to become computer support specialists than there are jobs in the market. There also seems to be a theme of oversupply related to the beauty sector, such as barbers, skincare specialists, and makeup artists.

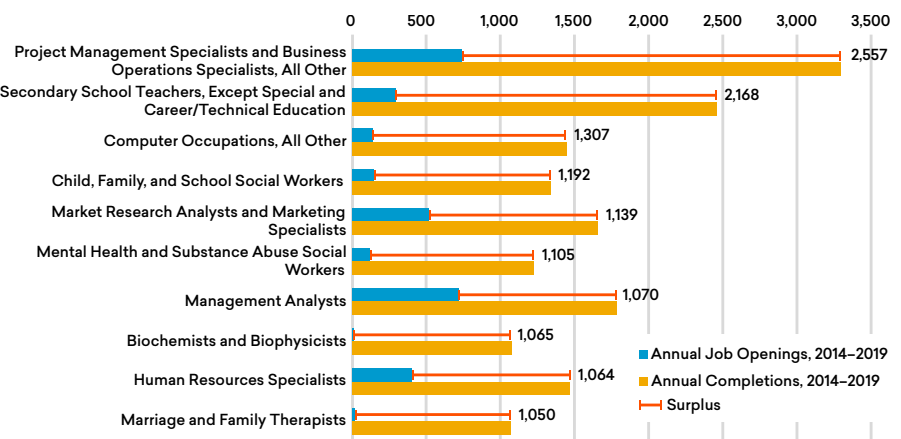
For occupations requiring a degree (from associate's to doctorate level), there's likely a surplus of people with the potential to be project management specialists, secondary school teachers, and therapists of various kinds. Surprisingly, the data also suggests a surplus of biochemists/biophysicists.

Figure 37: TOP SURPLUSES FOR OCCUPATIONS REQUIRING A CERTIFICATE OR SOME COLLEGE



Source: Emsi Burning Glass Q2.2021 Dataset

Figure 38: TOP SURPLUSES FOR OCCUPATIONS REQUIRING A DEGREE



Source: Emsi Burning Glass Q2.2021 Dataset

Methodology Notes for the Talent Retention, Migration and Attraction Section

Emsi Burning Glass selected all profiles that indicated study at any of the Richmond region's post-secondary institutions. For portions of this analysis, we include all profiles regardless of graduation year—otherwise the data would be too thin to make a meaningful analysis of certain factors like major employers, skills, and qualifications.

However, when analyzing migration and program retention/attrition, we analyze profiles of graduates between 2015 & 2020. The accompanying Tableau dashboard reflects this data set. This data set shows graduating institution, degree level, graduation year, program of study, and current MSA region.

A Note on Data Bias & Limitations: Emsi Burning Glass analyzes migration by obtaining online profiles from vendors every quarter. We then normalize and clean the data, applying standard institution names, areas of study, graduation year, and locations to each individual profile.

- Not all profiles have all the necessary information for analysis, and therefore we discard these during the cleaning process to ensure like-by-like analysis. Therefore, it is best to look at this data comparatively rather than in absolute terms.
- The more criteria applied to profiles, the thinner the data becomes. For this reason, we attempted to keep a balance between enough criteria to provide insight but broad enough to maintain a critical mass of profiles to analyze.
- With profile data comes an inherent bias: certain occupation types utilize online job boards such as Indeed or Monster more than others. For instance, professional profiles such as business analysts are more likely to use an online profile to search for work than someone in the trades, such as an electrician or plumber.
- Data for US profiles was obtained for post-secondary alumni that graduated between 2015 and 2020. The data shows where a person graduated from and where they are located *currently*, but it does not demonstrate *intermediate migration*. In other words, it does not show the first location an alumnus moves to, but only the most recent.

CHAPTER 5:

Talent Retention



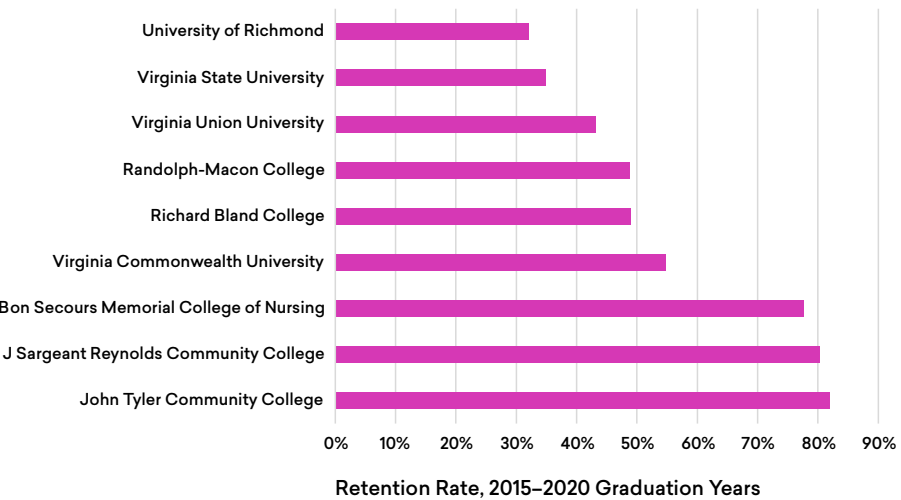
Emsi Burning Glass identified 20,484 profiles of individuals that graduated from a Richmond region post-secondary institution between 2015 and 2020. Of these, 10,559 profiles indicate that the person remained or returned to the Richmond region, giving the area a retention rate of 51.5% for post-secondary alumni.

This average retention rate between 2015 and 2020 changes by graduation year. The further back the graduation year, the lower the graduation rate becomes. This intuitively makes sense: first, the profiles have been on the job market longer and therefore have had more time to accept employment opportunities elsewhere. Second, recent graduates may remain in the area as they seek job opportunities. 2020 was a very tumultuous year so it may have discouraged recent graduates from moving.

Overall retention rates vary by institution. **The region's two largest community colleges are great vehicles for talent retention. Each have an overall retention rate above 80%.** Bon Secours Memorial College of Nursing also has an excellent retention rate, as it is able to connect graduates to its healthcare system and keep employment in-region.

Among the other institutions, Virginia Commonwealth University performs the best at helping talent remain in-region. 54.7% of 2015-2020 graduates have remained in-region (more detail on retention rates by institution later). The University of Richmond is just 32.8% overall, but only 27.6% of 2015 graduates are in region, the lowest among institutions measured.

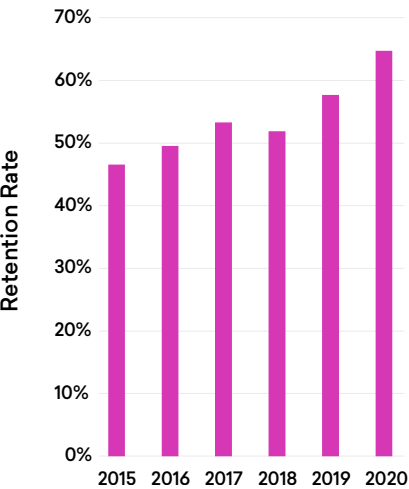
Figure 40: RETENTION RATE BY RICHMOND REGION INSTITUTION, AVG OF 2015-2020 GRADUATION YEARS



Source: Emsi Burning Glass Profile Data

51.5%: Retention rate of Richmond region post-secondary alumni, 2015-2020.

Figure 39: RICHMOND REGION RETENTION RATE BY GRADUATION YEAR



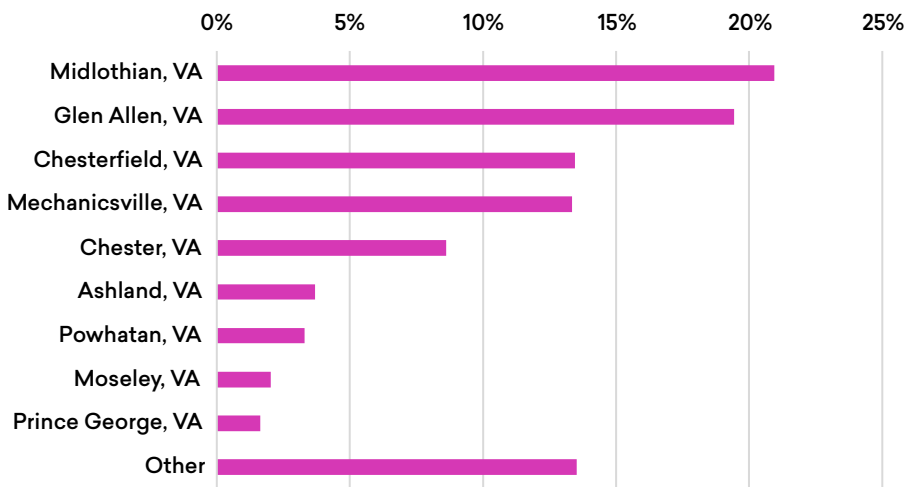
Source: Emsi Burning Glass Profile Data

LOCATION

More than half of the region's post-secondary alumni are located in four main areas: Midlothian, Glen Allen, Chesterfield, and Mechanicsville. The distribution of graduates from Virginia Commonwealth University is roughly the same as the chart below, since the majority of profiles are associated with this institution. This is also the case for University of Richmond and Bon Secours alumni.

J Sargeant Reynolds alumni tend to gravitate more towards Glen Allen (25.42% of in-region profiles) and Mechanicsville (22.08% of in-region profiles), while John Tyler Community College alumni are located primarily in Midlothian (28.07%), Chesterfield (21.74%), and Chester (19.09%).

Figure 41: LOCATION OF RETAINED RICHMOND REGION POST-SECONDARY ALUMNI



Source: Emsi Burning Glass Developer Profiles



"I went to VCU and graduated in 2016. Immediately upon arriving in 2012, **I fell in love with Richmond** and its vibrancy... I was fortunate to have secured a full time offer at Dominion Energy prior to starting my senior year of college. The company has been great and I love the people. That made it easy for us to **plant roots and build an amazing community** around us here in the city."

—FABY HELME,
Emergency Management
Specialist II at Dominion Energy



PROGRAMS



Of all the profiles of Richmond region post-secondary alumni that remained in region, business administration, psychology, communications, biology, marketing, and nursing were the most numerous programs of study¹⁰ indicated. Most of these programs hover just below the 2015-2020 graduation year average retention rate:

- Business Administration retention rate: 49.6%
- Psychology retention rate: 47.9%
- Communications retention rate: 47.3%
- Biology retention rate: 45.8%
- Marketing retention rate: 51.2%

We also observed which programs have the highest overall retention rates for the Richmond region.¹¹ HR management & services and public administration have impressive retention rates of 80% or above. As expected, registered nursing also has a high retention rate.

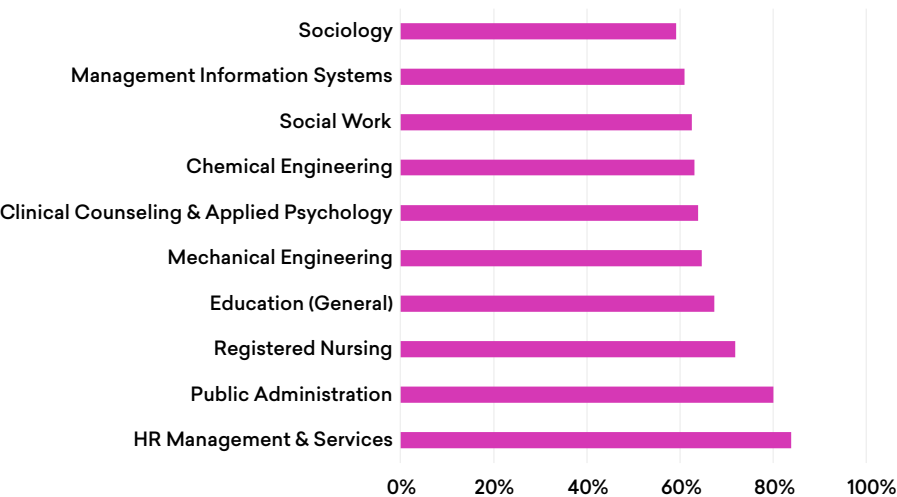
On the other hand, other programs perform poorly when it comes to talent retention. Many government and politics related fields have low retention rates: political science & government (40.6% retention), homeland security (42.9% retention), and international/global studies (41.1% retention). The same could be said of programs for the arts.

¹⁰ At the Classification of Instructional Programs (CIP) 3-digit code level.

¹¹ Analysis of programs with at least 100 profiles or more



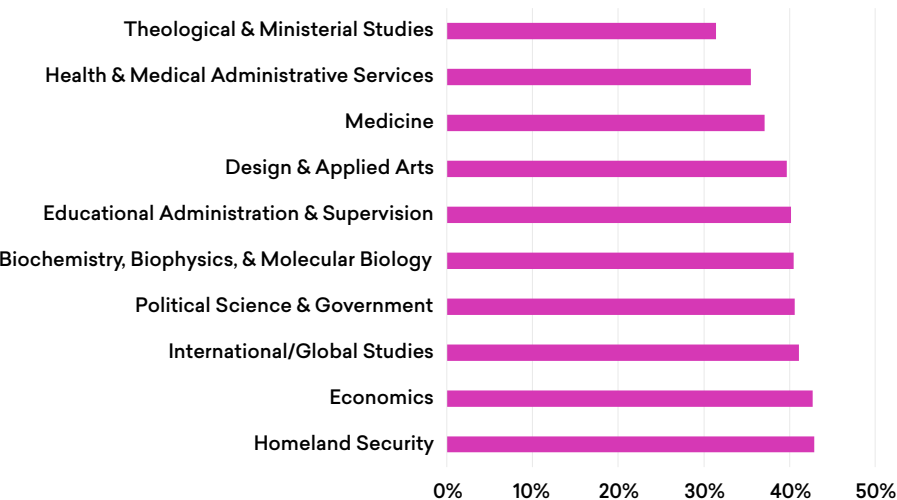
Figure 42: TOP 10 HIGHEST PROGRAM RETENTION RATES, 2015-2020 GRADUATION YEARS



Source: Source: Emsi Burning Glass Profile Data

For more detail, we demonstrate each institution's largest programs by number of alumni profiles, along with their retention rates.¹² Business administration features heavily among several institutions. The community colleges all have registered nursing in their top 3 programs. Meanwhile, the University of Richmond demonstrates its specialization in law while Virginia Union University shows its concentration in theology.

Figure 43: LOWEST PROGRAM RETENTION RATES, 2015-2020 GRADUATION YEAR



Source: Source: Emsi Burning Glass Profile Data

12 Richard Bland excluded due to too few profiles for this level of analysis.



Table 9: LARGEST PROGRAMS BY INSTITUTION, 2015-2020 GRADUATION YEARS

Institution	Top Programs	Retention Rate
Bon Secours Memorial College of Nursing	Registered Nursing	77.5%
	N/A	N/A
	N/A	N/A
J Sargeant Reynolds Community College	Business Administration, Management & Operations	81.7%
	Social Sciences, General	73.0%
	Registered Nursing	82.0%
John Tyler Community College	Business Administration, Management & Operations	83.2%
	Liberal Arts & Sciences, General Studies & Humanities	76.1%
	Registered Nursing	82.1%
Randolph-Macon College	Communications	49.3%
	Business Administration, Management & Operations	52.6%
	Biology	44.4%
University of Richmond	Business Administration, Management & Operations	24.4%
	Law	55.2%
	Educational Administration & Supervision	25.7%
Virginia Commonwealth University	Business Administration, Management & Operations	58.2%
	Psychology	51.2%
	Social Work	63.0%
Virginia State University	Business Administration, Management & Operations	35.9%
	Communications	23.7%
	Criminal Justice	21.0%
Virginia Union University	Theology	31.4%
	Communications	37.1%
		59.1%

Source: Source: Emsi Burning Glass Profile Data

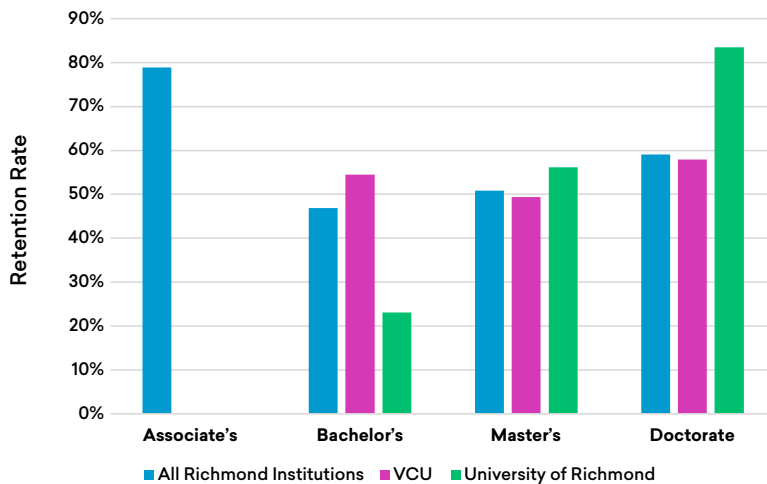
Retention by Degree Level

Retention rates also change by degree level. Associate's degrees have the highest retention rate, as expected. The institutions that offer these degrees tend to be more focused on serving the local community. Almost 80% of Richmond region alumni with this degree level have remained in region since 2015.

Profiles with bachelor's degrees have the lowest retention rate—but with a retention rate of almost 45%, it is still fairly strong. The University of Richmond struggles to keep bachelor's level talent in the region after graduation, but a high number of its doctorate degree alumni stay in the region.



Figure 44: RICHMOND REGION RETENTION RATE BY DEGREE LEVEL, 2015-2020 GRADUATION YEARS



Source: Source: Emsi Burning Glass Profile Data

UNIVERSITY OF RICHMOND

At the bachelor's level, liberal arts & sciences & general studies in humanities has a high retention rate of 75%. The University of Richmond's human resources management & services program area has an even more impressive retention rate of 96%. On the low end of bachelor's degrees, the University of Richmond has poor retention rates of low twenties/high teens for its larger programs of business administration, economics, and educational administration.

At the master's level, the university has a high retention rate of 86.1% for HR management and 79.1% for business administration. Its doctorate level law program also has a retention rate of 56.3%

VIRGINIA COMMONWEALTH UNIVERSITY

At the bachelor's level, Virginia Commonwealth University (VCU) has high retention rates of 74.4% in HR management, 68.1% in mechanical engineering, 67.3% in computer engineering, 66.4% in social work, 66.3% in registered nursing, 63.2% in general engineering, and 61.9% in accounting. It seems bachelor's level engineering degrees are a great avenue for talent retention. On the low end, VCU has poor retention rates of 36.7% in design & applied arts, 36.8% in international relations, 37.9% in bio mathematics/bio informatics/computational biology, and 39.6% in biomedical/medical engineering.

At the master's level, VCU helps the Richmond region retain talent well in general education (69.2% retention), social work (62.4% retention), business administration (62.0% retention), and clinical counseling & applied psychology (62.0% retention). This bodes well because social work and business administration are also among the largest in terms of profile numbers.

Two of VCU's top 3 largest doctorate programs keep less than half of alumni in the Richmond region: pharmacy has a retention rate of 44.6% and medicine has a retention rate of 36.9%. On the high end, VCU has strong doctorate level retention rates for rehabilitation & therapeutic professions (68.5%), public policy (63.9%), philosophy (53.6%), and educational administration (75.0%).

When examining retention rate by degree level for the top 5 most numerous program areas, the retention rate for business administration is at its lowest level for bachelor's degrees, keeping just 38.3% of profiles between 2015 and 2020 graduation years. This increases to 64.1% at the master's level.¹³ For psychology, the retention rate is 47.8% at the bachelor's level, on par with the program average across degree levels. There are very few at the master's and doctorate level, but retention rate is lower at these levels. Communications' retention rate drops from 46.7% at the bachelor's level to 41.7% at the master's level, while biology increases from 43.9% at the bachelor's level to 58.8% at the master's level. Marketing rises from 48.1% retention rate at the bachelor's level to 68.9% at master's level.

High & Low Program Retention Rates by Institution

- **J Sargeant Reynolds Community College** has very high retention rates all around, with culinary arts (58.3%), general engineering (61.5%), and computer science (71.0%) on the *lower* end. **John Tyler Community College's** programs are very similar.
- **Randolph-Macon College** does not have many profiles to analyze. In fact, no program broke 100 profiles, so it is too small a sample size to break down into detail with any degree of confidence.
- **Virginia Union University** also had too few profiles to analyze at this level.
- The **University of Richmond's** HR management program has a retention rate of 87.9%, which is very high compared to its other programs. Liberal arts & sciences, general studies & humanities also has a high retention rate of 77.8%. On the low side, only 17.6% of profiles with finance degrees remain in the region, followed by retention rates of 19.4% for biochemistry, 21.7% for accounting, 21.3% for political science, and 21.7% for biology.
- **Virginia Commonwealth University** has a multitude of program areas given its size, but its programs with high retention rates include public administration (79.6%), education (69.1%), mechanical engineering (68.0%), and registered nursing (65.3%). On the low end, VCU has poor retention rates in medicine (37.3%), design & applied arts (37.5%), and health & medical administrative services (39.7%).
- **Virginia State University** also has a smaller number of profiles, so it is difficult to show anything definitive. However, the small amount of clinical counseling & applied psychology profiles indicate a retention rate of 74.1%. Meanwhile, criminal justice, with the university's 3rd most profiles, has a retention rate of just 21.0%.

¹³ Note: too few doctorate level profiles to make an definitive statements.



TOP COMPANIES & EMPLOYERS

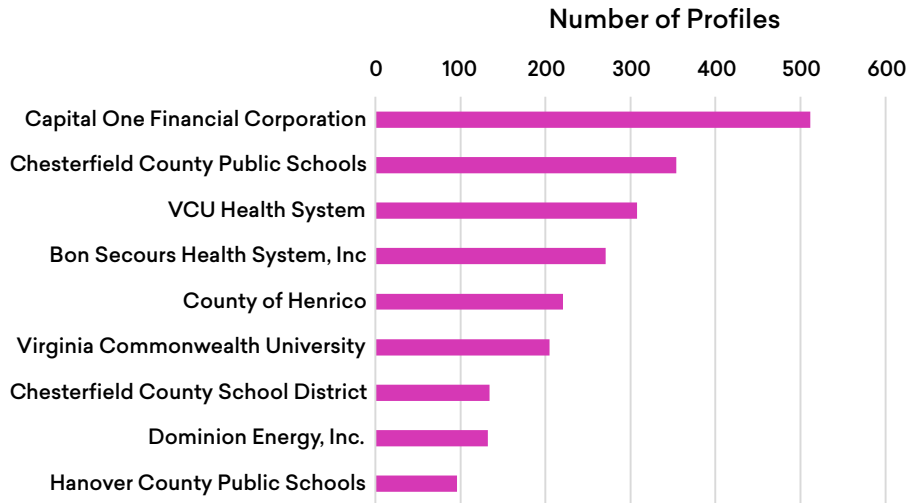


While Richmond region alumni end up with many different regional employers, a few stand out as having the most regional talent. Capital One Financial Corporation stands out as having the most regional alumni, followed by Chesterfield County Public Schools. Healthcare organizations such as VCU Health System and Bon Secours Health System are also notable employers.

The mix of top employers can vary by institution. For instance, a large portion (39%) of Bon Secours Memorial College of Nursing alumni work within the same health system they were educated within. Bon Secours Health System also features as a top employer of John Tyler Community College and J Sargeant Reynolds Community college graduates. Others continue the trend of becoming employed at the institution they were educated within. Such is the case with Randolph-Macon College, Virginia Union, and Virginia State.



Figure 45: TOP 10 REGIONAL EMPLOYERS OF RICHMOND
REGION POST-SECONDARY ALUMNI



Source: Emsi Burning Glass Developer Profiles, 2015-Present

Table 10: TOP REGIONAL EMPLOYERS BY GRADUATING INSTITUTION

Institution	Company/Employer	Percent of Alumni
Bon Secours Memorial College of Nursing	Bon Secours Health System	39.0%
	VCU Health System	8.2%
	Johnston Willis Hospital	2.1%
John Tyler Community College	Capital One Financial Corporation	2.6%
	Bon Secours Health System	2.3%
	Chesterfield County School District	1.6%
J Sargeant Reynolds Community College	Bon Secours Health System	2.6%
	Capital One Financial Corporation	2.0%
	VCU Health System	1.9%
Randolph-Macon College	Randolph-Macon College	4.4%
	Capital One Financial Corporation	2.5%
	Hanover County Public Schools	1.2%
Richard Bland College	Capital One Financial Corporation	3.3%
	Chesterfield County Public Schools	2.9%
	County of Prince George	1.6%
University of Richmond	Capital One Financial Corporation	4.2%
	Chesterfield County Public Schools	2.6%
	County of Henrico	1.6%
Virginia Commonwealth University	Capital One Financial Corporation	3.1%
	Chesterfield County Public Schools	2.5%
	VCU Health System	2.4%
Virginia State University	Chesterfield County Public Schools	3.0%
	Virginia State University	2.8%
	Richmond Public Schools	2.4%
Virginia Union University	Richmond Public Schools	3.9%
	Capital One Financial Corporation	2.0%
	Virginia Union University	2.0%

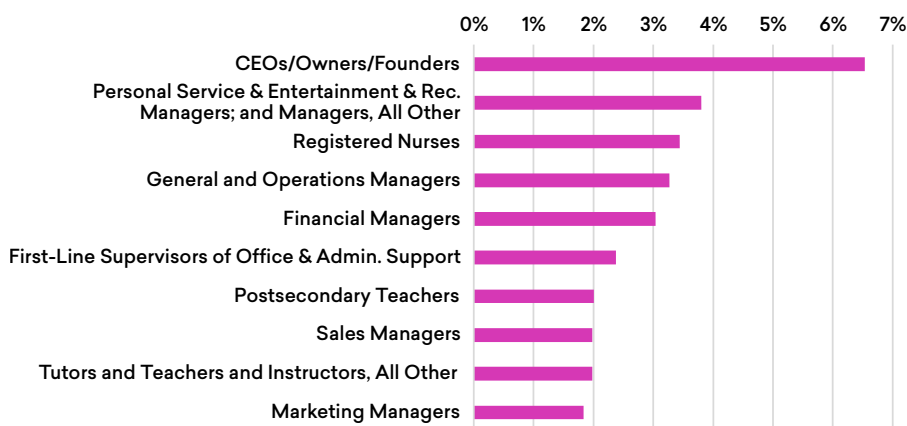
Source: Emsi Burning Glass Developer Profiles, 2015-Present

OCCUPATIONS

Based on Richmond region profile data of area alumni, the largest group note their occupation as either a founder, owner or CEO. Another prevalent occupation is related personal service, entertainment, and recreation managers, followed by registered nurses.

For Bon Secours, J Sargeant Reynolds Community College, and John Tyler Community College, registered nurse is the top occupation of alumni. When ignoring CEOs and entertainment managers, institutions offer peaks of their disciplines: Richard Bland College's 3rd highest alumni occupation is computer support specialists, while Virginia Commonwealth and University of Richmond are responsible for higher numbers of financial managers. Virginia Union University, with a legacy as the Richmond Theological Institute and a dedicated school of theology, produces a higher number of clergy alumni.

Figure 46: TOP 10 OCCUPATIONS OF RETAINED RICHMOND REGION POST-SECONDARY ALUMNI



Source: Emsi Burning Glass Developer Profiles, 2015-Present

Table 11: TOP OCCUPATIONS OF RETAINED RICHMOND REGION
POST-SECONDARY ALUMNI BY INSTITUTION

Institution	Occupation	Percent of Alumni
Bon Secours Memorial College of Nursing	Registered Nurses	65.1%
	Medical & Health Service Managers	4.11%
	Nurse Practitioners	3.42%
John Tyler Community College	Registered Nurses	7.55%
	First-Line Supervisors of Office & Admin Support Workers	3.8%
	Personal Service Managers; Entertainment Managers (except Gambling); and Managers (All Other)	3.6%
J Sargeant Reynolds Community College	Registered Nurses	6.3%
	CEOs/Founders/Owners	4.3%
	Personal Service Managers; Entertainment Managers (except Gambling); and Managers (All Other)	3.2%
Randolph-Macon College	CEOs/Founders/Owners	7.3%
	General & Operations Managers	4.4%
	Personal Service Managers; Entertainment Managers (except Gambling); and Managers (All Other)	4.3%
Richard Bland College	CEOs/Founders/Owners	6.7%
	Personal Service Managers; Entertainment Managers (except Gambling); and Managers (All Other)	4.1%
	Computer User Support Specialists	3.1%
University of Richmond	CEOs/Founders/Owners	12.1%
	Financial Managers	5.7%
	Lawyers	4.8%
Virginia Commonwealth University	CEOs/Founders/Owners	6.3%
	Personal Service Managers; Entertainment Managers (except Gambling); and Managers (All Other)	3.8%
	Financial Managers	3.4%
Virginia State University	CEOs/Founders/Owners	5.7%
	Tutors & Teachers & Instructors, All Other	4.8%
	Personal Service Managers; Entertainment Managers (except Gambling); and Managers (All Other)	3.4%
Virginia Union University	CEOs/Founders/Owners	7.9%
	Clergy	7.6%
	Personal Service Managers; Entertainment Managers (except Gambling); and Managers (All Other)	4.2%

Source: Emsi Burning Glass Developer Profiles, 2015-Present



FURTHER EDUCATION



1 in 5 Richmond region post-secondary alumni that pursued further education choose to do so **in-region**.

Approximately 16% of Richmond region post-secondary alumni went on to pursue further education.¹⁴ Of this group, 22% pursued a bachelor's degree as further education, 30% completed a master's degree as further education, and 8.5% pursue a PhD as further education. The top programs were business, management, & marketing; health-related fields; and engineering.

Of the Richmond region alumni who went on to pursue further education, 19.6% remain to study at Richmond region institutions. Virginia Commonwealth University keeps most of these alumni in region (14.2% of alumni who pursue further education), many of which continued to study business, management, or marketing. Just 1.6% of continuing education regional alumni did so at the University of Richmond, while another 1.3% remained to study at Virginia State University. At the University of Richmond, these continuing education profiles indicate studies in law, business, or education, while Virginia State profiles indicate education in computer & information science, social sciences, and business.

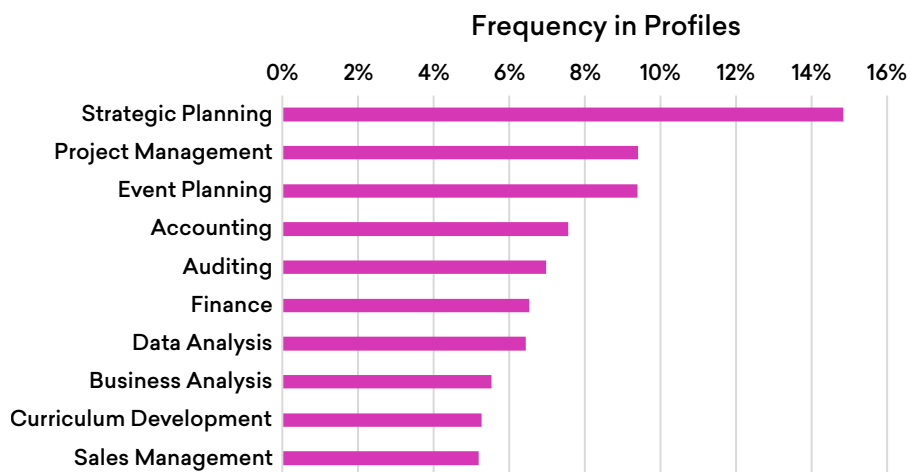
14 Emsi Burning Glass Labor Insight tool—Alumni Analysis dashboard

SKILLS

The most frequently mentioned hard skills in the profiles of in-region Richmond alumni are related to business and finance. For instance, strategic planning, project management, accounting, auditing, finance, data analysis, and business analysis are all in the top 10. This is due to the overwhelming amount of profiles that completed business-related programs. Again, profiles tend to gravitate towards professional roles, so there is possible data bias.

The skills associated with profiles can vary by institution. For instance, Bon Secours and John Tyler Community College alumni possess skills in basic life support, acute care, and CPR due to large program completions in nursing from these institutions, while Virginia Commonwealth University and University of Richmond alumni demonstrate business-related skills.

Figure 47: TOP 10 HARD SKILLS MENTIONED IN PROFILES OF RETAINED RICHMOND REGION POST-SECONDARY ALUMNI



Source: Emsi Burning Glass Developer Profiles, 2015-Present





Table 12: TOP HARD SKILLS BY INSTITUTION

Institution	Top Hard Skills	Frequency in Profiles
Bon Secours Memorial College of Nursing	Nursing	42%
	Acute Care	27%
	Basic Life Support	24%
John Tyler Community College	Strategic Planning	10%
	Event Planning	9%
	CPR	8%
J Sargeant Reynolds Community College	Strategic Planning	10%
	Event Planning	8%
	Customer Satisfaction	7%
Randolph-Macon College	Event Planning	15%
	Strategic Planning	14%
	Fundraising	9%
Richard Bland College	Strategic Planning	14%
	Accounting	9%
	Event Planning	8%
University of Richmond	Strategic Planning	23%
	Project Management	14%
	Finance	10%
Virginia Commonwealth University	Strategic Planning	15%
	Project Management	10%
	Event Planning	9%
Virginia State University	Strategic Planning	14%
	Event Planning	13%
	Curriculum Development	12%
Virginia Union University	Strategic Planning	22%
	Event Planning	17%
	Program Development	13%

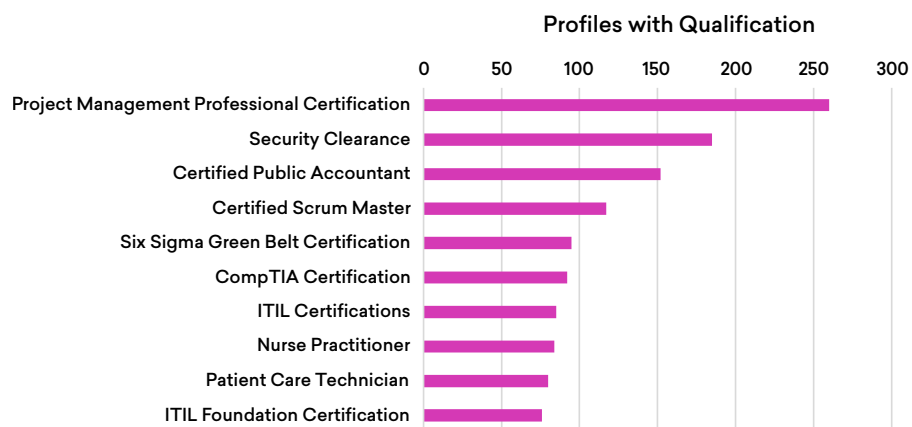
Source: Emsi Burning Glass Developer Profiles, 2015-Present

QUALIFICATIONS



The most frequently mentioned qualifications related to business, finance, and nursing and varies by institution. Bon Secours alumni naturally cite qualifications in nursing, as do J Sargeant Reynolds alumni. John Tyler Community College alumni profiles mention IT expertise via CompTIA certifications. Again, Virginia Commonwealth and the University of Richmond's expertise in the business & finance program area is reflected by their alumni indicating qualifications in Project Management Professional (PMP) and Certified Public Accountant (CPA) certifications.

Figure 48: TOP 10 QUALIFICATIONS IN PROFILES OF RETAINED RICHMOND REGION POST-SECONDARY ALUMNI



Source: Emsi Burning Glass Developer Profiles, 2015-Present



Table 13: TOP QUALIFICATIONS BY INSTITUTION

Institution	Qualifications	Profiles with Qualification
Bon Secours Memorial College of Nursing	Patient Care Technician	24
	Bachelor of Science in Nursing (BSN)	10
	Critical Care Registered Nurse (CCRN)	9
John Tyler Community College	Security Clearance	35
	CompTIA Certification	28
	CompTIA Network+	21
J Sargeant Reynolds Community College	Certified First Responder	23
	Certified Nursing Assistant	20
	CompTIA Certification	18
Randolph-Macon College	Series 63 Uniform Securities Agent State Law License	7
	Series 7 General Securities Representative License	7
	Six Sigma Green Belt Certification	6
Richard Bland College	Security Clearance	10
	Certified Public Accountant (CPA)	5
	CompTIA Certification	4
University of Richmond	Project Management Professional (PMP) Certification	67
	Certified Public Accountant (CPA)	36
	Senior Professional in Human Resources	30
Virginia Commonwealth University	Project Management Professional (PMP) Certification	177
	Certified Public Accountant (CPA)	118
	Certified Scrum Master	84
Virginia State University	Security Clearance	39
	CompTIA Security+	9
	Project Management Professional (PMP) Certification	8
Virginia Union University	Six Sigma Green Belt Certification	6
	Project Management Professional (PMP) Certification	6
	Security Clearance	6

Source: Emsi Burning Glass Developer Profiles, 2015-Present

FABY HELME

ROLE:

**Emergency Management
Specialist II at Dominion Energy**

INDUSTRY:

Utilities

EDUCATION:

**Bachelor of Science, Information
Systems from Virginia
Commonwealth University**



Profile

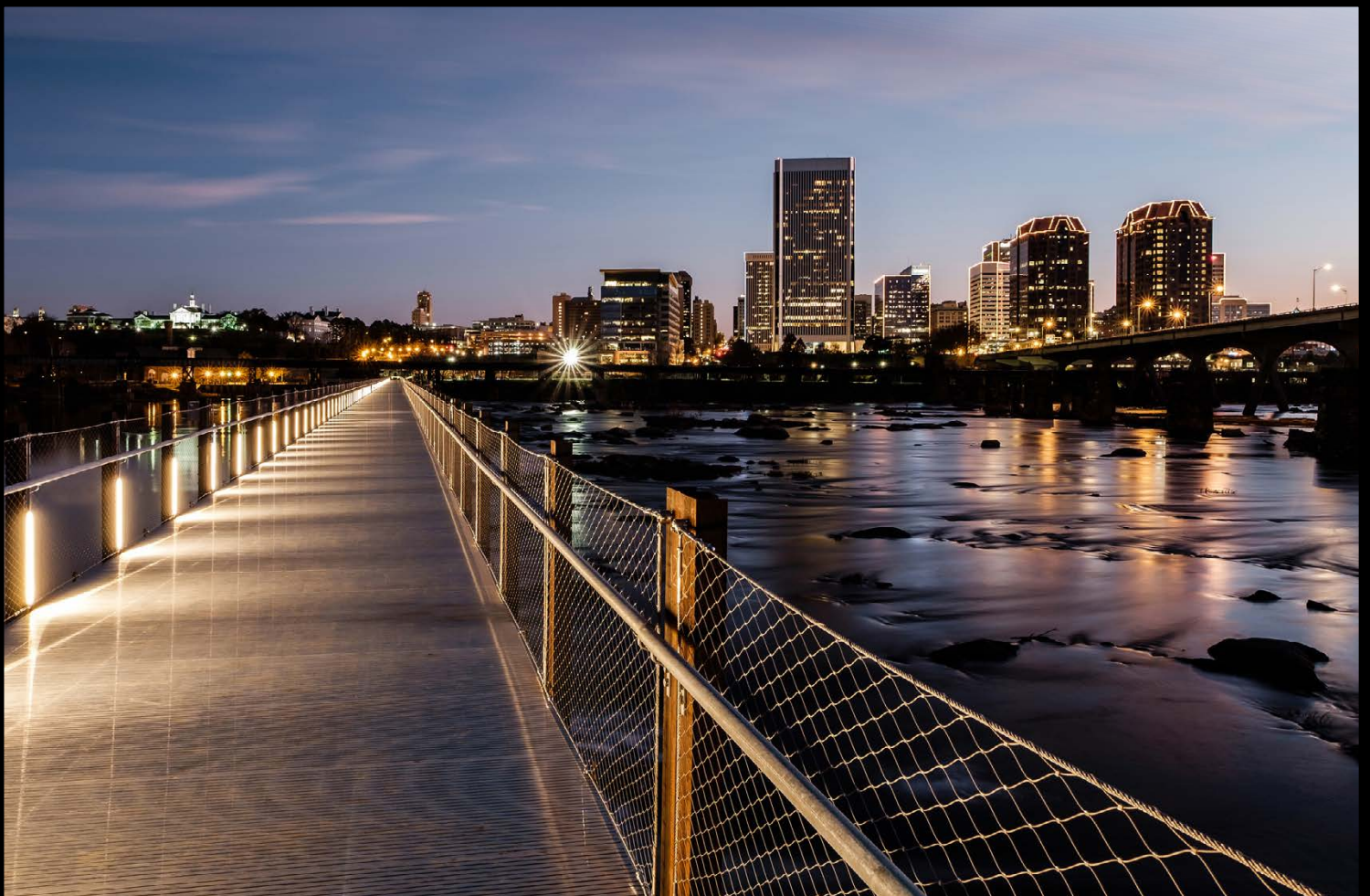
I went to VCU and graduated in 2016. Immediately upon arriving in 2012, I fell in love with Richmond and its vibrancy. As a big foodie, I enjoyed trying all the amazing food the city has to offer with friends and family. There is so much history to the city, and it has a youthful feel with tons of outdoor activities such as going to Belle Isle, walks along the canal, a stroll through Hollywood Cemetery or Carytown, or walking around the old stomping grounds at VCU. Also, there is always something going on in the city, so every week is different!

My husband and I (who are high school sweethearts) had all the intention of moving back to Northern Virginia upon graduation. I was fortunate to have secured a full time offer at Dominion Energy prior to starting my senior year of college. The company has been great, and I love the people. That made it easy for us to plant roots and build an amazing community around us here in the city. We are so grateful to be building a house that will be ready next year. Being close to the heart of RVA was important to us, so we are not going to be far! Affordability has been a large factor of why we have stayed as well.

Talent Migration



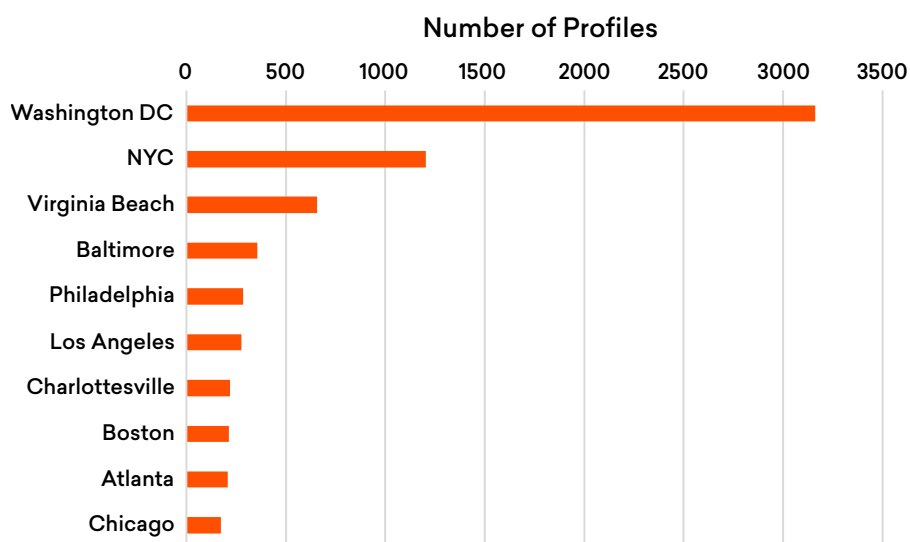
Of the 20,484 profiles of individuals that graduated from a Richmond region post-secondary institution between 2015 and 2020, 9,925 are located outside of the region. In other words, 48.5% of area alumni have left the region among 2015-2020 graduates. The attrition rate is essentially the inversion of the retention rate. When observing retention rate over time, we see that migration out of the area is more likely to occur the more time between graduation and the present.



LOCATION

VCU and the University of Richmond have the largest diasporas of regional alumni that have left the region, despite the University of Richmond being slightly smaller than J Sargeant and John Tyler Community Colleges in terms of completion numbers. The MSAs receiving the most talent from the Richmond region post-secondary institutions are Washington DC, NYC, Virginia Beach, Baltimore, Philadelphia, LA, Charlottesville, Boston, Atlanta, and Chicago, respectively.

Figure 49: TOP 10 MSA DESTINATIONS OUTSIDE OF RICHMOND REGION



Source: Emsi Burning Glass Developer Profiles

Washington DC receives most Richmond region alumni from VCU—71.7% of all alumni from the Richmond region in this MSA graduated from this institution. This is followed by the University of Richmond (13.6%) and Virginia State (7.7%). VCU also accounts for the most Richmond region alumni in Virginia Beach (66.6%), Baltimore (64.9%), LA (69.1%), and Charlottesville (75.9%). The University of Richmond, however, sends the largest amount of Richmond region alumni to NYC (52.7%), Philadelphia (47.6%), and Boston (52.6%).



“I grew up in Richmond and **decided to move back** after spending some time away for college. **I love living and working in the city** where I can walk to Richmond's many amazing restaurants, breweries, and coffee shops.”

—AUDREY CANNON,
Senior Communications
Specialist at Dominion Energy

PROGRAMS



For 9 of the 10 top recipient MSAs of Richmond region talent, **business administration was the top program category** of these profiles, though the main institution which they graduate from varies. For example, most Richmond region alumni graduating in business administration graduated from VCU when observing profiles in Atlanta, Virginia Beach, and Washington DC. However, the University of Richmond accounts for most business administration profiles in Baltimore, Boston, Chicago, LA, NYC, and Philadelphia. Some of the other top program areas that each MSA receives are:

- **Atlanta:** Business administration is the main program category, 68.7% of Richmond region alumni in business administration graduate from VCU
- **Baltimore:** Business administration is the top program category, 47.2% of these profiles come from the University of Richmond, followed by 30.6% from VCU. Psychology is the second largest program category—78.3% of these Richmond region profiles graduate from VCU. Communications is the 3rd largest category that Atlanta receives from Richmond—split evenly between VCU and Virginia State.
- **Boston:** Business administration is the top program category, 86.7% of Richmond region alumni graduate from University of Richmond. Educational administration is the second largest category of Richmond region alumni in Boston, 100% of which graduate from University of Richmond.
- **Charlottesville:** Unique among top destinations of Richmond talent, social work is the largest program category of Richmond region profiles with 94.7%



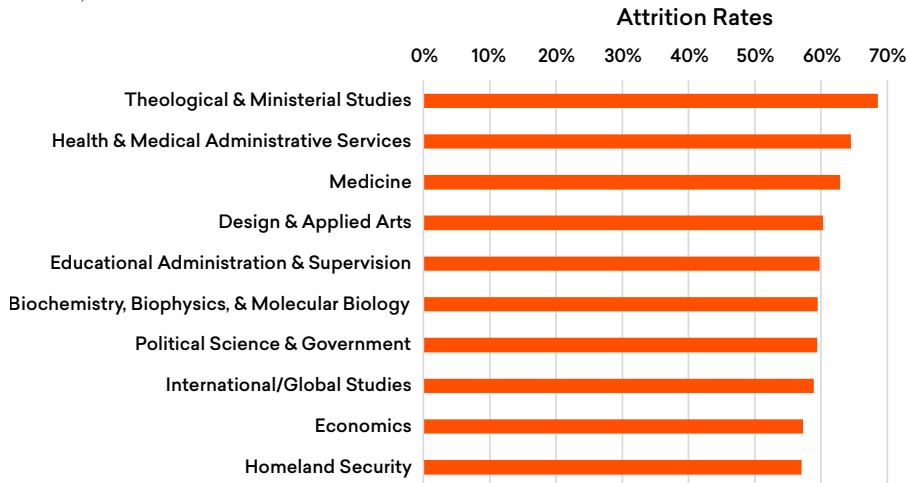
graduating from VCU. Pharmacy is the second largest category with 100% of Richmond region alumni in the MSA graduating from VCU.

- **Chicago:** 62.5% of business administration alumni from the Richmond region graduate from the University of Richmond.
- **Los Angeles:** an even split of business administration alumni from the Richmond region come from VCU and University of Richmond. Meanwhile, communications is the second largest program area of Richmond region alumni in Los Angeles, with 72.0% graduating from VCU.
- **NYC:** 82.1% of business administration alumni from the Richmond region graduate from University of Richmond. Educational administration is the second largest program area, with 92.4% graduating from University of Richmond. Economics is the third largest program category, with 84.2% of Richmond region alumni graduating from University of Richmond. Finally, design and public relations are also notable program areas, but VCU is the main graduating institution.
- **Philadelphia:** 81.0% of business administration alumni from the Richmond region in Philadelphia graduate from the University of Richmond.
- **Virginia Beach:** 58.9% of business administration alumni from the Richmond region graduate from VCU, with another 28.6% from Virginia State. Biology, communications, and psychology have more or less the same number of profiles from the Richmond region. Almost 69% of biology alumni from the Richmond region located in Virginia Beach graduated from VCU. 63.2% of Richmond region alumni in communications graduate from VCU, while 68.8% of psychology profiles graduating from VCU.
- **Washington DC:** Business administration is the top program category, with 52.1% of Richmond region alumni graduating from VCU, 27.8% from the University of Richmond, and 13.5% from Virginia State. Psychology is the second largest category with 83.5% of Richmond region alumni in the MSA graduating from VCU. Again, VCU leads as the main graduating institution for Richmond region communications and biology alumni in the Washington DC MSA.

Emsi Burning Glass also analyzed the attrition of Richmond region alumni for the largest program categories to see which MSA receives the most talent. For business administration, Washington DC has almost 350 profiles of graduates between 2015 and 2020, while NYC has just under 300. For psychology, Washington DC leads again with 200 Richmond region profiles, followed by Virginia Beach (with around 50 profiles), then NYC. Regarding communications program alumni, Washington DC has received over 150 profiles, followed by NYC and Virginia Beach with considerably less. Washington DC also leads as the main recipient of Richmond region alumni that studied biology and marketing.



Figure 50: TOP RICHMOND REGION PROGRAM ATTRITION RATES, 2015-2020 GRADUATION YEARS



Source: Source: Emsi Burning Glass Profile Data

The figure above demonstrates the program areas which leak the most talent from the Richmond region. Almost 70% of theology alumni between 2015 and 2020 have left the region, followed by health & medical administrative services alumni. The region has a high attrition rate for government/political-related programs such as political science, international/global studies, and homeland security.

Since Washington DC is the largest destination of Richmond region alumni, it tends to be the largest destination for most programs of study. However, this can vary at times. For instance:

- NYC slightly outnumbers Washington DC for Richmond region alumni in educational administration.
- NYC and Washington DC have roughly equal amounts of Richmond region alumni for fine & studio arts. NYC slightly outnumbers Washington DC in design & applied arts profiles.
- The Virginia Beach-Norfolk area outnumbers NYC in biology profiles, but still lags Washington DC.
- Finally, Washington DC outnumbers Richmond in Richmond region alumni that studied international relations & national security studies.

COMPANIES & EMPLOYERS

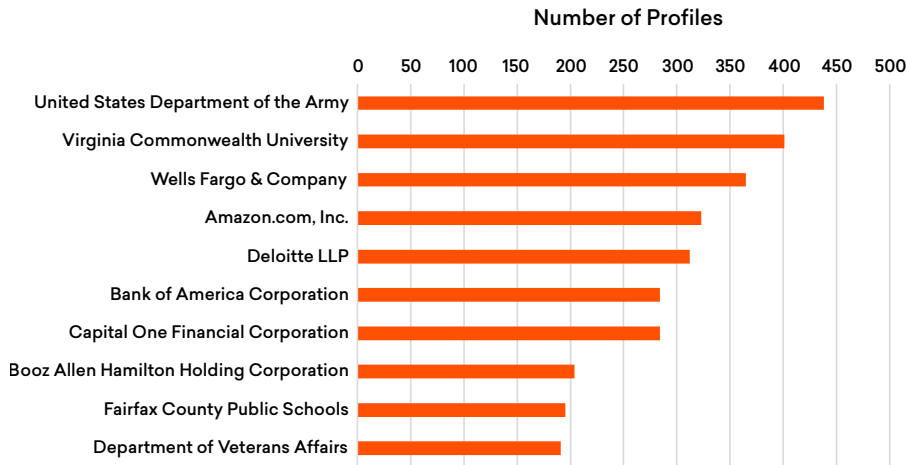


The figure below shows the top employers of Richmond region alumni that have left the region. Surprisingly, a couple of the major employers are still associated with Richmond: VCU and Capital One both remain in the top 10 employers of alumni outside the region.

The top MSAs reflect different types of major employers. For instance, Richmond region alumni in Washington DC concentrate around defense-related employment: the US Army, Booz Allen Hamilton, and Homeland Security are all among the top employers. Meanwhile, alumni in NYC gravitate towards financial and professional services with employers such as JPMorgan & Chase, Citigroup, Morgan Stanley, PWC, Bank of America, EY, and Deloitte. By contrast, the major employers of Richmond alumni in the Virginia Beach area tend to be healthcare companies.



Figure 51: TOP 10 EMPLOYERS OF RICHMOND REGION POST-SECONDARY ALUMNI OUTSIDE OF RICHMOND REGION



Source: Emsi Burning Glass Developer Profiles, 2015-Present

Table 14: TOP EMPLOYERS OF RICHMOND REGION POST-SECONDARY ALUMNI BY MSA

MSA	Company/Employer	Percent of Alumni
Washington-Arlington-Alexandria, DC-VA-MD-WV	Fairfax County Public Schools	0.78%
	Inova Health System	0.71%
	Booz Allen Hamilton	0.66%
New York-Newark-Jersey City, NY-NJ-PA	JP Morgan & Chase	0.56%
	NYC Department of Education	0.52%
	Citigroup	0.47%
Virginia Beach-Norfolk-Newport News, VA-NC	Riverside Health System	2.4%
	Sentara Healthcare	2.0%
	Huntington Ingalls Industries	1.6%
Baltimore-Columbia-Towson, MD	University of Maryland	1.1%
	Baltimore County Public Schools	1.0%
	Johns Hopkins University	0.9%
Philadelphia-Camden-Wilmington, PA-NJ-DE-MD	JPMorgan & Chase	1.0%
	Penn Medicine	0.9%
	University of Pennsylvania	0.8%

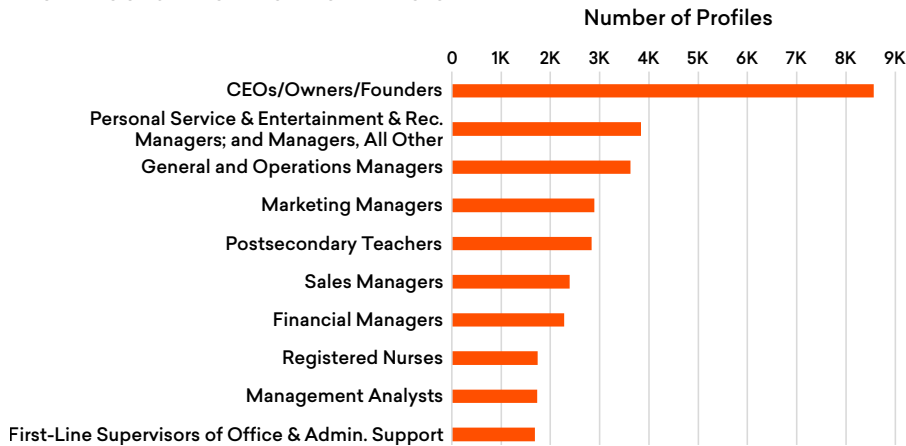
Source: Emsi Burning Glass Developer Profiles, 2015-Present



OCCUPATIONS

As with the profiles of alumni that remained in the region, the largest group of profiles of regional alumni that left the region note their occupation as either a founder, owner or CEO. Personal service managers also remains the second highest occupation. There seems to be less prevalence of nurses and higher numbers of management occupations in operations, marketing, finance, and sales.

Figure 52: TOP 10 OCCUPATIONS OF RICHMOND REGION POST-SECONDARY ALUMNI OUTSIDE OF RICHMOND REGION



Source: Emsi Burning Glass Developer Profiles, 2015-Present

Table 15: TOP OCCUPATIONS OF RICHMOND REGION POST-SECONDARY ALUMNI BY MSA

MSA	Occupation	Percent of Alumni
Washington-Arlington-Alexandria, DC-VA-MD-WV	CEOs/Founders/Owners	6.7%
	Personal Service Managers; Entertainment Managers (except Gambling); and Managers (All Other)	4.1%
	General & Operations Managers	2.7%
New York-Newark-Jersey City, NY-NJ-PA	CEOs/Founders/Owners	8.5%
	Marketing Managers	4.5%
	Personal Service Managers; Entertainment Managers (except Gambling); and Managers (All Other)	3.9%
Virginia Beach-Norfolk-Newport News, VA-NC	CEOs/Founders/Owners	8.3%
	General & Operations Managers	3.8%
	Registered Nurses	3.5%
Baltimore-Columbia-Towson, MD	CEOs/Founders/Owners	10.7%
	Personal Service Managers; Entertainment Managers (except Gambling); and Managers (All Other)	4.8%
	Sales Managers	4.1%
Philadelphia-Camden-Wilmington, PA-NJ-DE-MD	CEOs/Founders/Owners	8.7%
	Personal Service Managers; Entertainment Managers (except Gambling); and Managers (All Other)	3.8%
	General & Operations Managers	3.4%

Source: Emsi Burning Glass Developer Profiles, 2015-Present

FURTHER EDUCATION



Using the legacy Burning Glass data via the Labor Insight tool, we examined how many Richmond region alumni pursued further education outside of the region. Of the Richmond Region alumni that went on to further education, 80.4% chose to do so with institutions outside of the region. The leading recipients of these were:

- **Liberty University**—2.6% of further education Richmond region alumni. Profiles focus on business, education, and health professions.
- **George Mason University**—2.4% of further education Richmond region alumni with a focus on business, health, and psychology.
- **Old Dominion University**—2.0% of further education Richmond region alumni studying business, engineering, and health.

For other noteworthy state institutions, these received the following Richmond region alumni pursuing further education:

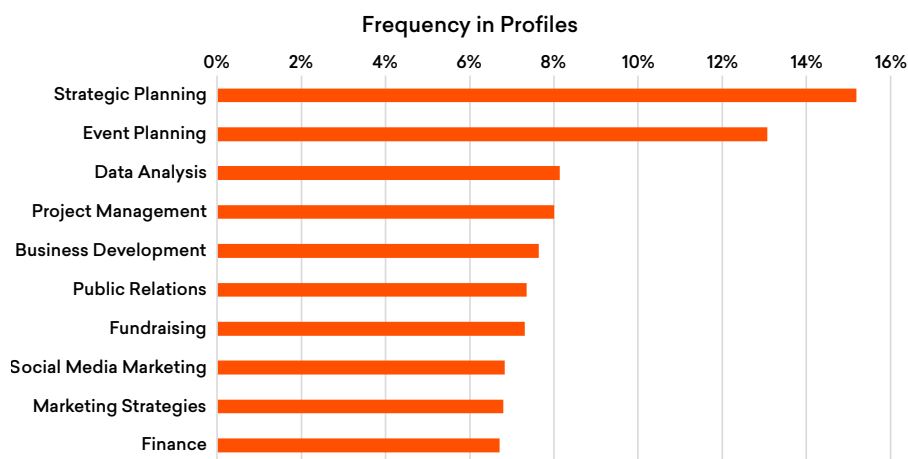
- **University of Virginia**—1.6% of regional alumni studying business, education, and engineering.
- **Virginia Tech**—1.0% of regional alumni with focuses on engineering, business, and computer & information sciences.
- **James Madison University**—0.6% of regional alumni studying business and health.
- **William & Mary University**—1.0% of regional alumni studying business, interdisciplinary studies, and psychology.



SKILLS

The most frequently mentioned hard skills in the profiles of out-of-region Richmond alumni are strategic planning and event planning. Other business and finance related skills feature heavily, such as data analysis, project management, business development, marketing, & finance.

Figure 54: TOP QUALIFICATIONS IN PROFILES OF OUT-OF-REGION RICHMOND POST-SECONDARY ALUMNI



Source: Emsi Burning Glass Developer Profiles, 2015-Present

Table 16: TOP HARD SKILLS OF RICHMOND REGION POST-SECONDARY ALUMNI BY MSA

MSA	Top Hard Skills	Frequency in Profiles
Washington-Arlington-Alexandria, DC-VA-MD-WV	Strategic Planning	14%
	Event Planning	13%
	Project Management	10%
New York-Newark-Jersey City, NY-NJ-PA	Event Planning	16%
	Strategic Planning	12%
	Social Media Marketing	11%
Virginia Beach-Norfolk-Newport News, VA-NC	Strategic Planning	11%
	Event Planning	8%
	Public Relations	5%
Baltimore-Columbia-Towson, MD	Strategic Planning	18%
	Event Planning	11%
	Business Development	8%
Philadelphia-Camden-Wilmington, PA-NJ-DE-MD	Strategic Planning	16%
	Event Planning	13%
	Data Analysis	9%

Source: Emsi Burning Glass Developer Profiles, 2015-Present

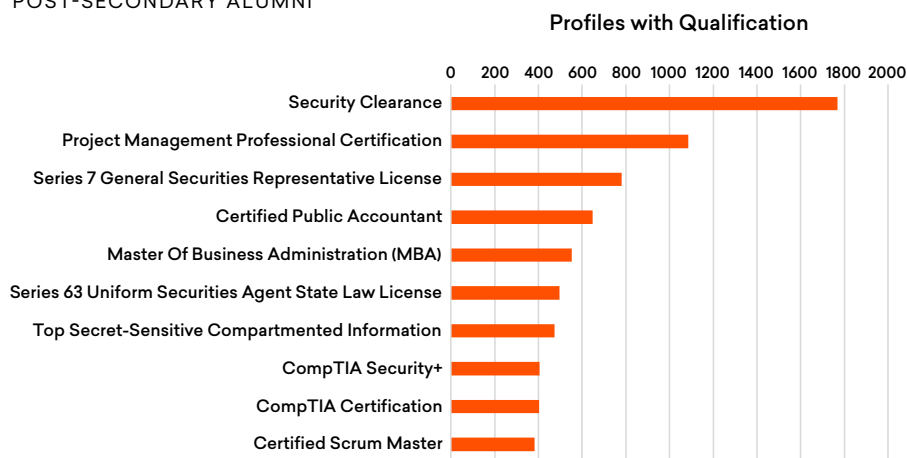


QUALIFICATIONS

The most frequently mentioned qualifications of out-of-region Richmond alumni varies by MSA. However, generally speaking, most qualifications are either related to defense (security clearance, TS/SCI clearance), business (MBA, PMP, Certified Scrum Master), finance (Series 7 or 63), or IT (CompTIA).

Defense-related qualifications are more frequent for MSAs with a heavier federal government or military presence. Such is the case for Washington DC, Virginia Beach-Norfolk, and Baltimore. As one would expect, New York features finance-related qualifications, as does Philadelphia.

Figure 54: TOP QUALIFICATIONS IN PROFILES OF OUT-OF-REGION RICHMOND POST-SECONDARY ALUMNI



Source: Emsi Burning Glass Developer Profiles, 2015-Present

Table 17: TOP QUALIFICATIONS OF RICHMOND REGION POST-SECONDARY ALUMNI BY MSA

MSA	Qualifications	Profiles with Qualification
Washington-Arlington-Alexandria, DC-VA-MD-WV	Security Clearance	841
	Project Management Professional (PMP) Certification	427
	CompTIA Security+	235
New York-Newark-Jersey City, NY-NJ-PA	Series 7 General Securities Representative License	247
	Series 63 Uniform Securities Agent State Law License	163
	Chartered Financial Analyst	102
Virginia Beach-Norfolk-Newport News, VA-NC	Security Clearance	18
	Top Secret-Sensitive Compartmented Information (TS/SCI Clearance)	8
	Nurse Practitioner	7
Baltimore-Columbia-Towson, MD	Security Clearance	45
	Project Management Professional (PMP) Certification	19
	Top Secret-Sensitive Compartmented Information (TS/SCI Clearance)	17
Philadelphia-Camden-Wilmington, PA-NJ-DE-MD	Series 7 General Securities Representative License	64
	Certified Public Accountant (CPA)	42
	Series 63 Uniform Securities Agent State Law License	38

Source: Emsi Burning Glass Developer Profiles, 2015-Present



Talent Attraction



Economic development talent attraction strategies frequently leverage diasporas of certain groups—often those which have roots or ties to a region but have since left. The rationale for this being an optimal target group for talent attraction is that previous experience and familiarity with the region makes it an easier sell as a place to live and work. Assuming these connections are regarded positively in the person’s mind, memory, nostalgia, and relationships are as powerful talent attraction pieces as salary and benefits.

Memory, nostalgia, & relationships are as **powerful talent attraction tools** as salary & benefits.



TOP US OCCUPATIONS



Software developers, financial services sales agents, & logisticians are **prime target occupations** for Richmond region talent attraction.

Before targeting which US regions would be the best to dedicate talent attraction efforts towards, there needs to be some focus. After all, is it worth it to spend time and money only to attract individuals in retail jobs? Or would it be better to focus on occupations with a higher economic impact that are also sorely needed in the Richmond region? We followed a simple methodology to identify the top US occupations that the Richmond region should be targeting:

- **First**, we focused on occupations requiring post-secondary education.
- **Second**, we filtered out management occupations due to methodology limitations. Emsi Developer calculates occupation gaps based on typical entry level education requirements and completions. However, a person fresh out of college with an engineering degree is unlikely to become a manager in their first role. For this reason, the methodology for identifying gaps in management occupations is flawed.
- **Third**, we weighted and ranked the top US occupations based on the following criteria:
 - Largest occupation gaps for the Richmond region
 - Total US jobs added between 2015-2020 for each occupation
 - Total US growth rate (%) for that occupation between 2015-2020

Using this methodology, the top US occupations that the Richmond region should target are the following:



Table 18: TOP TARGET OCCUPATIONS

SOC	Occupation	Richmond Occupation Surplus/(Gap)	US Occ Growth 2015-2020	US Occ Growth Rt 2015-2020
15-1256	Software Developers and Software Quality Assurance Analysts and Testers	-84	341,396	28%
41-3031	Securities, Commodities, and Financial Services Sales Agents	-340	123,556	36%
13-1081	Logisticians	-203	88,401	54%
13-1198	Project Management Specialists and Business Operations Specialists, All Other	2522	535,196	53%
29-1141	Registered Nurses	256	216,401	8%
13-1151	Training and Development Specialists	-252	61,736	22%
23-2011	Paralegals and Legal Assistants	-185	60,145	21%
15-2098	Data Scientists and Mathematical Science Occupations, All Other	72	23,723	62%
25-9099	Educational Instruction and Library Workers, All Other	-61	38,728	29%
13-2098	Financial and Investment Analysts, Financial Risk Specialists, and Financial Specialists, All Other	19	72,421	17%
29-2091	Orthotists and Prosthetists	-10	3,649	49%
13-2061	Financial Examiners	203	25,916	55%
29-1228	Physicians, All Other; and Ophthalmologists, Except Pediatric	-8	57,431	16%
17-2112	Industrial Engineers	-24	44,577	18%
19-5011	Occupational Health and Safety Specialists	69	25,392	35%
29-1071	Physician Assistants	1	27,783	27%
15-1212	Information Security Analysts	509	53,379	57%
17-3098	Calibration Technologists and Technicians and Engineering Technologists and Technicians, Except Drafters, All Other	94	24,195	32%
13-2053	Insurance Underwriters	-127	16,778	16%
33-3031	Fish and Game Wardens	-16	1,830	31%
17-2051	Civil Engineers	-122	25,926	9%
25-9031	Instructional Coordinators	114	36,630	23%
13-1161	Market Research Analysts and Marketing Specialists	1132	187,483	34%
13-2052	Personal Financial Advisors	-74	25,363	10%
13-1028	Buyers and Purchasing Agents	-278	5,180	1%

Source: Emsi Burning Glass Q2.2021 Dataset & Calculations

Software developers, financial services sales agents, & logisticians are prime target occupations for Richmond region talent attraction. These occupations have experienced a rapid growth rate, adding tens of thousands of positions across the US. Clearly these jobs are in demand. Yet when observing related program completions and comparing them to area openings, Richmond's talent pipeline falls short. The result: key candidates for talent attraction efforts reside outside of the region.

Other occupations might offer talent attraction opportunities due to their overwhelming growth, despite there currently being an adequate talent pipeline in the region. For instance, project management specialists added over half a million jobs nationally between 2015 and 2020. Meanwhile, data scientists grew at an astonishing rate of 62%.

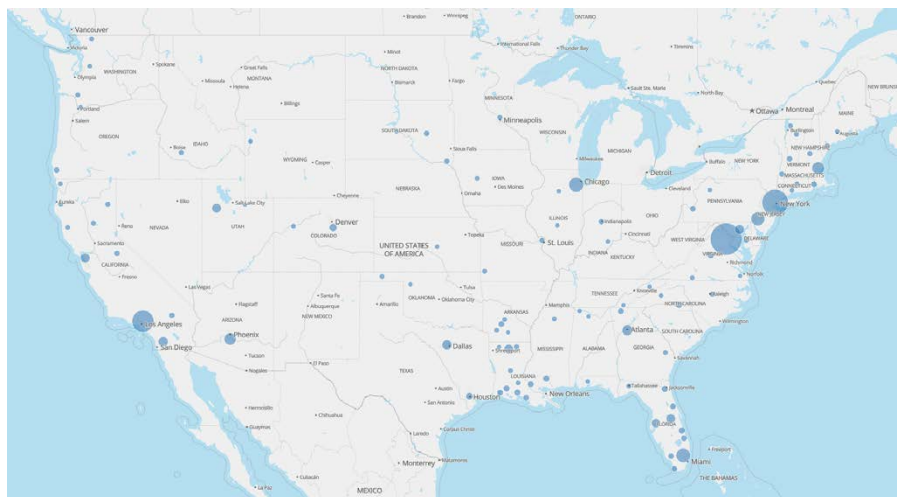
TOP US MARKETS

The top US regions for Richmond region talent attraction efforts were selected using a simple weighing & ranking methodology through the Emsi Developer tool's Talent Attraction function which assesses locations based on total MSA size, number of Richmond region alumni, regional graduate oversupply of selected occupations, and cost-of-living (COL) adjusted median earnings gains.

- Total talent size is self-explanatory—the bigger the market, the more opportunity for talent attraction.
- We placed extra weight on the number of Richmond region alumni so that the diaspora strategy can be seen.
- MSAs with an oversupply of talent for the top US occupations selected above are a perfect target for Richmond. It means that talent in those MSAs may struggle to find employment and therefore will be more willing to entertain employment opportunities elsewhere.
- While real wages may be higher in larger markets such as New York City or LA, the cost of living in those areas mute the benefits of these higher wages. By comparing cost of living adjusted wages, we can see which cities that, when compared to Richmond, feel like less pay. In other words, by moving to Richmond, the people in these occupations will feel like they are earning more because their dollar will stretch further.

Richmond has a strong case for **attracting talent** from DC, NYC, Baltimore, and Philadelphia.

Figure 55: TOP US MARKETS FOR RICHMOND REGION TALENT ATTRACTION



Source: Emsi Burning Glass Q2.2021 Dataset

The most fertile hunting ground for out-of-region talent attraction efforts are along the east coast. Washington DC is the most promising market to recruit from by far, with the most Richmond region post-secondary graduates and a sizeable oversupply of talent for the top occupations we examined.

New York City has the second most Richmond region alumni. It is also an extremely large market overall, with a surplus of talent for Richmond region target occupations. Furthermore, talent would feel an immediate pay raise due to the lower cost of living in the Richmond region. While LA has a smaller network of Richmond region alumni, the earnings gain that talent would experience with a move back to the region is significant.

The non-east coast target markets (LA, Chicago, & Phoenix) may have smaller networks of Richmond region alumni, but they all have large talent surpluses for the area's target occupations.

When considering states overall, Florida and Louisiana have numerous MSAs in the running. Louisiana wages are so low that the Richmond region would offer a sizeable and immediate bump in pay, even when adjusting for cost of living. Florida, led by Miami, has a large overall talent supply, a surplus of talent in key occupations, and lower earnings when adjusting for cost of living.

Richmond has a strong case for attracting talent from DC, NYC, Baltimore, and Philadelphia. These markets are a strong mix of size, strong alumni networks with Richmond, and oversupply of talent in key occupations along with another important factor: geographic proximity.



"I think young professionals like myself should more seriously consider Richmond and establishing a career here as it is once more on a large upswing."

RYAN TAYLOR,
Assistant Project Manager
at Hourigan

Table 19: TOP US TARGET MARKETS

MSA Name	Overall Rank	Total Talent	Your Alumni	Graduate Oversupply	Earnings Gain
Washington-Arlington-Alexandria, DC-VA-MD-WV	1	269,027	1,660	28,091	-\$2.36
New York-Newark-Jersey City, NY-NJ-PA	2	569,625	670	39,056	\$2.52
Los Angeles-Long Beach-Anaheim, CA	3	355,504	146	74,855	\$8.08
Baltimore-Columbia-Towson, MD	4	94,172	655	6,511	\$6.23
Chicago-Naperville-Elgin, IL-IN-WI	5	256,909	130	42,787	-\$0.62
Virginia Beach-Norfolk-Newport News, VA-NC	6	43,720	530	4,338	\$2.81
Miami-Fort Lauderdale-Pompano Beach, FL	7	142,711	88	38,637	\$7.23
Philadelphia-Camden-Wilmington, PA-NJ-DE-MD	8	172,620	217	22,077	\$3.68
Boston-Cambridge-Newton, MA-NH	9	191,212	155	21,111	\$2.62
Phoenix-Mesa-Chandler, AZ	10	120,416	58	42,703	\$1.74

Source: Emsi Burning Glass Q2.2021 Dataset

TOP FOREIGN MARKETS

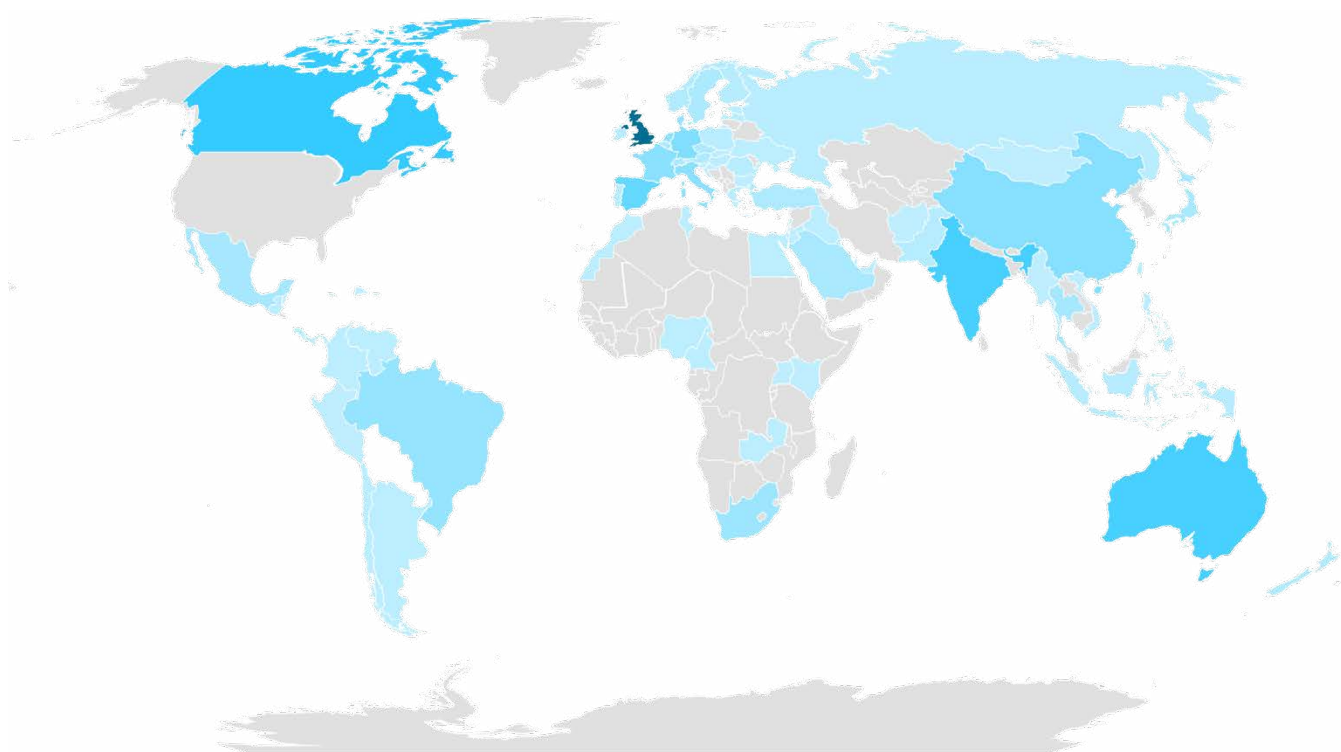
Leveraging Richmond's Global Diaspora

Because foreign data is sparser for Richmond region post-secondary alumni, we calculated total profiles regardless of graduation year to see which countries receive the most Richmond alumni. The data does not differentiate between Americans working abroad or foreigners who came to study in Richmond but returned abroad to work, nor does it indicate the year of graduation for these profiles.

The map below demonstrates the concentration of Richmond region post-secondary alumni abroad. According to profile data, the United Kingdom is the top foreign destination for Richmond region post-secondary alumni, with roughly half of these profiles in the London area. The second tier of global alumni destinations consists of Canada, Australia, and India, each between 350-450 profiles. Spain is the fifth highest destination before profile numbers begin to drop off significantly.

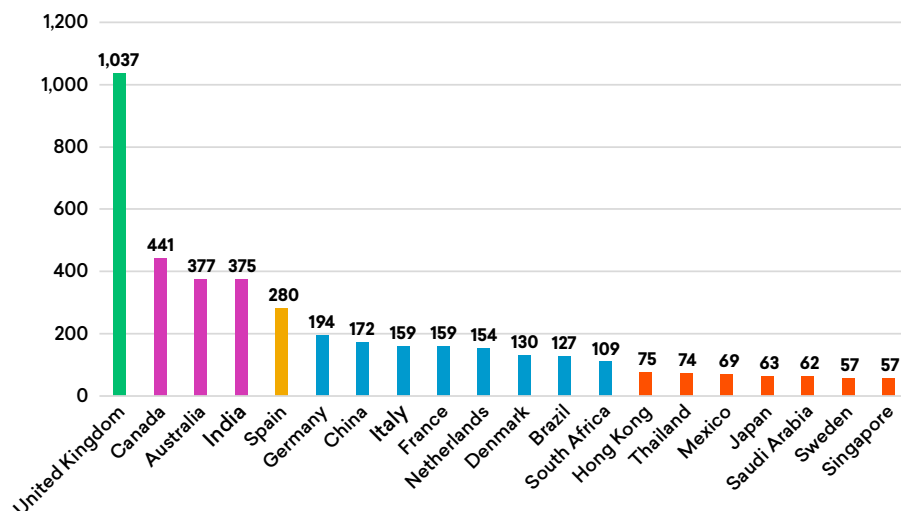
When it comes to **foreign talent attraction**, the region should target the UK, Canada, Australia, and India as these have the highest number of regional post-secondary alumni living abroad.

Figure 56: GLOBAL MAP OF RICHMOND REGION POST-SECONDARY ALUMNI INTENSITY



Source: Emsi Burning Glass Global Dataset

Figure 57: TOP RECIPIENT COUNTRIES OF RICHMOND REGION POST-SECONDARY ALUMNI



Source: Emsi Burning Glass Q2.2021 Dataset

As expected, most alumni tend to live in major metropolitan areas in these countries, with London topping the list. Toronto and Sydney have the 2nd and 3rd highest numbers of alumni. Copenhagen accounts for almost all alumni living in Denmark, just as Bangkok does for Thailand.

Table 20: TOP GLOBAL RECIPIENT CITIES OF RICHMOND REGION POST-SECONDARY ALUMNI

City	Country	Number of Non-US Profiles
London	United Kingdom	570
Toronto	Canada	187
Sydney	Australia	129
Copenhagen	Denmark	127
Bangalore	India	125
Madrid	Spain	114
Paris	France	95
Melbourne	Australia	92
Shanghai	China	92
Milan	Italy	87
Amsterdam	Netherlands	83
Barcelona	Spain	81
Bangkok	Thailand	68
Sao Paulo	Brazil	59
Johannesburg	South Africa	57

Source: Emsi Burning Glass Global Dataset

Targeting these markets with a broad brush is not recommended. It is best to understand the intricacies of the Richmond region's alumni networks first. For instance, some institutions have stronger alumni bases in certain countries over others. Talent attraction efforts should reflect these networks' nuances.¹⁵

¹⁵ To explore this data interactively and in greater detail, use the accompanying Tableau dashboard.



In terms of enrollment numbers, the University of Richmond is less than 1/7th the size of Virginia Commonwealth University. However, the number of global profiles the University of Richmond has is 3/4ths the amount that Virginia Commonwealth demonstrates. This suggests that the University of Richmond has either a higher concentration of foreign students or deeper global networks of employment opportunities. Furthermore, it has higher amounts of profiles in Spain, Italy, and Denmark whereas VCU has higher concentrations of profiles in Canada, Australia, and India.

Although Richard Bland College has far less global profiles, roughly 78% of its global alumni are in the United Kingdom, a higher concentration than any other Richmond institution. Bon Secours Memorial College of Nursing, on the other hand, has deeper connections to Asian markets, with over 36% of global profiles in India and another 22% in Thailand.

The type of institution may also influence its global reach. Although J Sargeant Reynolds Community College and John Tyler Community College are the area's 2nd and 3rd largest post-secondary institutions, they account for far fewer global profiles than smaller institutions such as Richard Bland College, Bon Secours, or Virginia State.

Languages Competencies

Many areas in the United States feature diasporas of certain national or ethnic communities because of a key social phenomenon called “chain migration.” Chain migration “describes a situation in which migrants from a particular place follow other migrants to a particular destination.”¹⁶ It is why Massachusetts has seen growing presence of Brazilian immigrants or why Miami has so many of Cuban origin.

One tactic of talent attraction could be to tap into the chain migration phenomenon to encourage immigrants with certain skills and qualifications to consider the Richmond region. For instance, almost 10% of Richmond's population speaks a foreign language at home. What countries could these foreign languages represent?

Just over 45% of foreign language speakers in the region speak Spanish. However, since Spanish is so widely spread, we cannot attribute this to any one country for chain migration, though surely some strong networks exist with certain countries.

Vietnamese is the second-most spoken foreign language in Richmond, representing 4.4% of foreign language speakers. However, residents of Vietnamese origin probably do not outnumber Indian residents in the region. India has such a plurality of languages spoken that English is an official language of the state along with Hindi. When considering the languages of Hindi, Gujarati, and Urdu, it is possible that Indians could represent up to 4.8% of foreign language speakers in the region. This is followed by Arabic (4.0%), Chinese (3.6%), German (3.5%), French (3.2%).¹⁷

¹⁶ <https://www.ozmentlaw.com/what-is-chain-migration/>

¹⁷ <https://www.census.gov/data/tables/2013/demo/2009-2013-lang-tables.html>

NON-LOCAL HIGHER EDUCATION TARGETS

A key feature of RVA NOW's initial performance measurement is to benchmark the institutions of William & Mary University, James Madison University, Virginia Tech, and the University of Virginia. How well does Richmond perform in attracting talent from these locations? Where else do alumni from these institutions go? What degree levels and program areas are coming to Richmond?

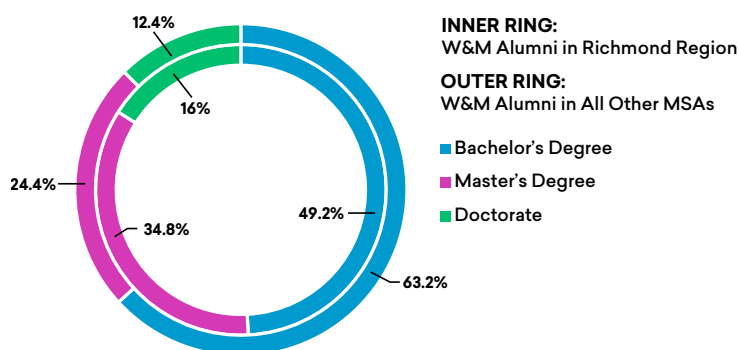
William & Mary

We found that 494 profiles of the 5,567 between 2015-2020 graduation years came to Richmond, meaning an attraction rate of 8.87%. This means the region attracts slightly more talent away from the Virginia Beach-Norfolk MSA than remain. While 63% of William & Mary profiles are bachelor's level, only 49% of W&M alumni in the Richmond region have this degree level. However, though only 24% of all profiles are master's level, 35% of W&M alumni in Richmond have this degree level. This means the region does a better job of attracting Master's-level talent from this institution.



WILLIAM
& MARY

Figure 58: TALENT ATTRACTION FROM W&M BY DEGREE LEVEL, 2015-2020 GRADUATION YEARS



Source: Source: Emsi Burning Glass Profile Data

The Richmond region tends to attract alumni in **accounting, law, and business administration** from William & Mary. Almost 11% of W&M alumni in the Richmond region graduate in accounting, with 85.2% of the profiles at the master's level. Another 10.5% of W&M profiles in Richmond studied law, 100% of which are at the doctorate level. A further 8.5% of W&M profiles in Richmond studied business administration, with 88.1% at the master's level.



Richmond is the 3rd highest recipient destination of W&M alumni. Washington DC leads, receiving 31.4% (or 1,749 profiles) of W&M alumni from 2015-2020 graduation years. Washington DC receives a smaller share of doctorate and master's degree level talent from this institution. Alumni in DC tend to study accounting (9.7% of profiles), economics (9.4% of profiles), and psychology or political science (each around 6% of W&M profiles in DC). Other W&M destinations include:

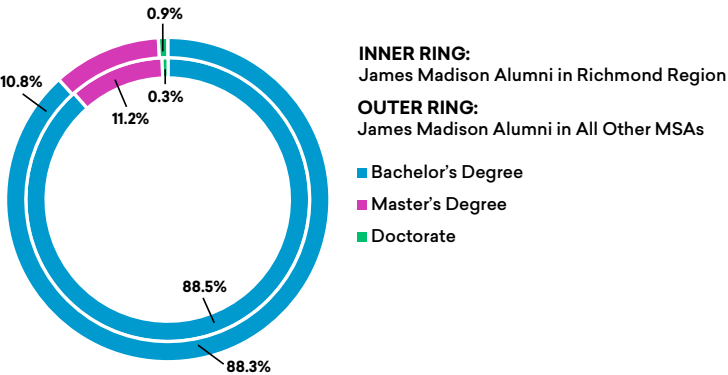
- **NYC:** 10.7% (or 595 profiles) of W&M alumni between 2015-2020 are located in NYC. Most W&M alumni in NYC are graduates in economics (11.9%), marketing (9.6%), and finance, law, and accounting with each around 7%.
- **Virginia Beach:** 8.6% of W&M alumni between 2015-2020 are located in Virginia Beach, slightly less than Richmond. These profiles are overwhelmingly centered around business administration, with 21.8% of all W&M profiles in the MSA.
- **Boston:** 2.9% (or 161 profiles) of W&M alumni between 2015 and 2020 are located in Boston. The largest programs of study for these alumni are economics (11.2%) and computer science (8.1%).
- **Baltimore:** 2.7% (or 150 profiles) of W&M alumni between 2015 and 2020 are located in Baltimore. 10.7% of these profiles studied economics, with another 9.3% studying marketing.

James Madison University

Emsi Burning Glass identified 965 of 10,774 alumni profiles of James Madison University that are in Richmond, meaning the region has attracted 8.96% of graduates between 2015 and 2020 graduation years. Almost 90% of alumni from this university living in Richmond have a bachelor's degree, followed by 11.2% at a master's level, and just 0.3% at the doctorate level. These levels are very close to the average distribution of James Madison profiles by degree level, regardless of location, as demonstrated by the donut chart below.



Figure 59: TALENT ATTRACTION FROM JAMES MADISON UNIVERSITY BY DEGREE LEVEL, 2015-2020 GRADUATION YEARS



Source: Source: Emsi Burning Glass Profile Data



The Richmond region tends to attract talent from James Madison in areas of **business administration, communications, marketing, and health services**. Almost 11% of James Madison alumni living in Richmond graduated in business administration, 96.2% of which hold a bachelor's degree. Around 8.3% of Richmond region profiles from James Madison studied communications & media studies, with 96.3% of these profiles holding a bachelor's degree. A further 5.8% of James Madison alumni in Richmond studied marketing, 100% of which at the bachelor's level. Finally, 5.5% of James Madison alumni in the Richmond region studied in health services/allied health/general health sciences, also with 100% at the bachelor's level.

The Richmond region is the third largest recipient of James Madison alumni. Washington DC leads, with 3,600 profiles from 2015-2020 graduation years. This represents 33.4% of the total profile count for that period. Only 9.3% of James Madison profiles in Washington DC have a master's degree, so Richmond actually attracts a higher share of master's talent. Business administration (11.2%) and computer engineering (9.3%) are the largest program categories of James Madison talent in DC. Other top destinations of alumni are:

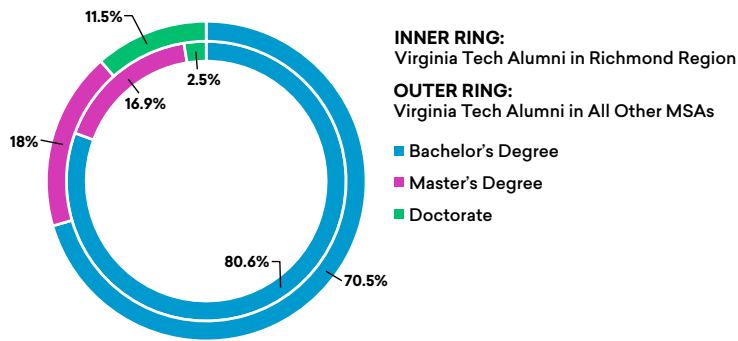
- **Harrisonburg:** 1,309 profiles or 12.1% of alumni between 2015 and 2020 have stayed in Harrisonburg. Business administration (15.7%) and Psychology (7.5%) are the largest program categories of alumni.
- **NYC:** 957 profiles or 8.9% of alumni between 2015 and 2020 have gone to New York. Communications (11.6%) and business administration (10.7%) are the largest program categories of James Madison alumni in NYC.
- **Baltimore:** 454 profiles or 4.2% of James Madison alumni between 2015 and 2020 have located in Baltimore. Again, the largest program categories are business administration (11.1%) and communications (8.2%).
- **Charlottesville:** 406 profiles or 3.8% of alumni between 2015 and 2020 have located in Charlottesville. 11.8% of these alumni studied business administration, while another 6.9% studied psychology.

Virginia Tech

Emsi Burning Glass identified 1,216 profiles of the total 18,454 profiles associated with Virginia Tech as living/working in the Richmond region, meaning the region attracted 6.59% of Virginia Tech alumni from 2015-2020 graduation years. Richmond does a poor job of attracting higher degree level alumni from Virginia Tech. Although 11.5% of Virginia Tech alumni profiles are at the doctorate level, just 2.5% of Virginia Tech alumni in the Richmond region have this degree level. Similarly, the region also lags in attracting master's level alumni from this institution. Instead, over 80% of Virginia Tech alumni in the Richmond region have just a bachelor's degree.



Figure 60: TALENT ATTRACTION FROM VIRGINIA TECH BY DEGREE LEVEL, 2015-2020 GRADUATION YEARS



Source: Source: Emsi Burning Glass Profile Data

The Richmond region tends to attract talent from Virginia Tech in areas of **business administration, accounting, general engineering, marketing, and nutrition sciences**. About 7.3% of Virginia Tech alumni living in Richmond graduated in business administration, 84.3% of which hold a bachelor's degree. Around 6.6% of Richmond region profiles from Virginia Tech studied accounting, with 80.0% of these profiles holding a bachelor's degree. A further 4.7% of Virginia Tech alumni in Richmond studied general engineering, 82.5% of which are at the bachelor's level. Finally, around 4.0% each studied marketing or nutrition sciences, with the majority holding bachelor's degrees.

The Richmond region is the third largest recipient of Virginia Tech alumni. Washington DC leads, with 4,854 profiles from 2015-2020 graduation years. This represents 26.3% of the total profile count for that period. Business & Commerce (8.1%), engineering (7.3%) and business administration (7.0%) are the largest program categories of Virginia Tech talent in DC. Other top destinations of alumni are:

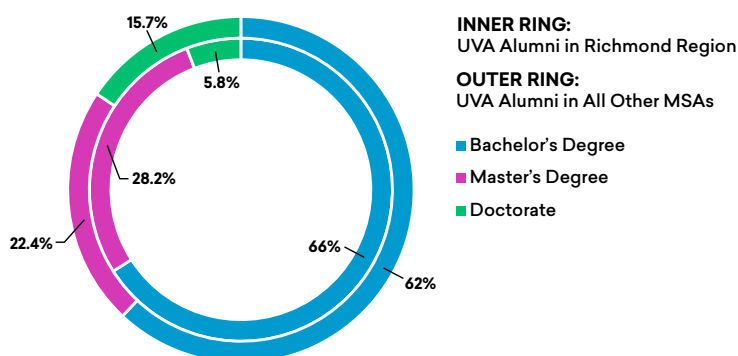
- **Blacksburg-Christiansburg:** 3,046 profiles or 16.5% of Virginia Tech alumni between 2015 and 2020 have stayed in the region of Blacksburg-Christiansburg. 9.7% of these alumni studied general engineering, with another 8.8% studying philosophy.
- **NYC:** 799 profiles or 4.3% of Virginia Tech alumni between 2015 and 2020 are located in NYC. 6.6% of these alumni studied marketing, 6.6% studied business administration, and another 6.3% studied general engineering.
- **Baltimore:** 590 profiles or 3.2% of Virginia Tech alumni between 2015 and 2020 are located in Baltimore. About 7.5% of these alumni studied general engineering with another 6.9% studying business administration.
- **Virginia Beach:** 586 profiles or 3.2% of Virginia Tech alumni between 2015 and 2020 are located in the Virginia Beach-Norfolk area. 15.5% of these alumni studied business administration, 15% studied general engineering, and 11.9% studied mechanical engineering.

University of Virginia

Emsi Burning Glass identified 705 profiles out of 14,616 associated with the University of Virginia (UVA) as currently in the Richmond region, so the region attracts just 4.8% of UVA alumni from 2015-2020 graduation years. Again, Richmond does a poor job of attracting doctorate level alumni: 15.7% of UVA profiles have this degree level, but just 5.8% of UVA alumni in Richmond have this degree level. That said, the region does attract a higher share of master's level talent, as it does with bachelor's level talent.



Figure 61: TALENT ATTRACTION FROM UVA BY DEGREE LEVEL, 2015-2020 GRADUATION YEARS



Source: Source: Emsi Burning Glass Profile Data

The Richmond region tends to attract talent from UVA in areas of **economics, business administration, psychology, and biology**. About 8.7% of UVA alumni living in Richmond graduated in economics, 96.7% of which hold a bachelor's degree. Around 6.4% of Richmond region profiles from UVA studied business administration. Interestingly, 91.1% of these profiles hold a master's degree. A further 5.2% of UVA alumni in Richmond studied psychology, 97.3% of which are at the bachelor's level. Finally, around 4.7% studied biology, all of which hold a bachelor's degree.

The Richmond region is the 4th largest recipient of UVA alumni. Washington DC leads, with 3,836 profiles from 2015-2020 graduation years. This represents 26.2% of the total profile count for that period. Economics (11.7%) and computer science (8.0%) are the largest program categories of UVA talent in DC. Other top destinations of alumni are:

- **Charlottesville:** 19.9% of alumni between 2015 and 2020 are currently in Charlottesville. A large portion of these alumni hold a doctorate degree. 7.0% of alumni that stayed studied philosophy, with another 6.8% studying economics.

- **NYC:** 1,777 profiles or 12.2% of UVA alumni between 2015 and 2020 are located in New York City. 14.9% of these studied economics with another 10.2% studying business administration.
- **San Francisco:** 3.4% of UVA alumni between 2015 and 2020 have located in the San Francisco MSA. 12.4% hold a degree in computer science with another 9.6% having studied economics.
- **Boston:** 351 profiles or 2.4% of UVA alumni of the 2015-2020 graduation years are located in Boston. An impressive 21.4% of these profiles have a doctorate level degree, so Boston does an excellent job of attracting high tier education levels. 10.3% of profiles studied economics. Business administration, computer science, law, and philosophy each account for around 5.5% of UVA alumni in the region.



RYAN TAYLOR

ROLE:

Assistant Project Manager at Hourigan

INDUSTRY:

Construction

EDUCATION:

BA in Construction Management Engineering from NC State, Associates in Science from Richmond Community College in Hamlet, NC



Profile

When I moved, I didn't have any personal connection with the Richmond area and had practically never heard of it... When I visited, I didn't quite know what I was going to see as I drove in. I was really surprised to see a city with such a dense downtown and the fact that it was so close but so unfamiliar to me was mind-boggling.

When exiting school, I knew I wanted to be in an urban environment and RVA was just as great as Raleigh for all of the factors I mentioned previously. I didn't have a big draw to any location as my family was already pretty spread out... At some point I was weighing my options between Charlotte, DC, Raleigh, and Richmond. I chose Richmond.

I think young professionals like myself should more seriously consider Richmond and establishing a career here as it is once more on a large upswing. The population is growing but not overpopulated, and quality jobs seem to be fairly abundant. There is plenty of opportunity along the entire spectrum—it's not a city that is more geared towards just college kids, young adults, working families, or retirees but everyone alike.

It feels easier than other locations to establish a career, buy a home, create a family, and reside in the RVA area for a long time—something that is worthwhile if your family doesn't already have solid roots elsewhere. In my short time here, just over 3 years, I've been able to buy a house just 4 miles away from downtown, something that you can't accomplish as a young professional in most cities across the country, let alone one of RVA's size. There are plenty of things to do and see outside of work and if that's not satisfying enough, you're only a short drive away from the mountains, the beach, and visiting other cities like DC, Charlottesville, and Raleigh.



Recommendations & Conclusion





Based on our analysis of the Richmond region's labor market as well its migration data, we recommend the Chamber's RVA NOW program focus on the following:



Everyone talks about Millennials, but don't forget about Gen Z. As the report noted, two generations' populations *declined* in the Richmond region between 2015 and 2020: Gen X and Gen Z. Gen Z is the current generation entering the workforce. Coupled with the higher-than-average median age of 38.8, Richmond must focus on retaining and attracting young talent to ensure an adequate supply of talent for the future.



Maintain progress in Labor Force Participation Rates for young people. Prior to the pandemic, Richmond was making impressive progress in labor force participation across most age groups. Rates increased particularly so for younger workers between 16-29 years of age. This increased engagement was a good sign and one that Richmond will need to focus on during the recovery. It means the region is helping young people find employment and therefore reduces the risk of talent migration.



Underemployment is a nation-wide problem, but one that could be contributing to talent migration out of Richmond. Roughly 26% of Richmond's population could be underemployed due to too few jobs available for people with a graduate level education. On the other hand, there is a surplus of jobs that do not require a college degree. Such a dynamic can cause attrition of talent with higher education levels.



Some sub-regions may need more attention than others. When observing both population growth trends and income levels, the Richmond region is very much split in half. The northern part of the region is growing with healthy income levels, while the southern part has a stagnant or declining population coupled with lower incomes. This portion of the region is more likely to leak talent and therefore requires greater attention from RVA NOW.



Pay attention to talent gaps. Logistics-related occupations are projected to grow significantly, but there are gaps between relevant degree completions and job availability. For instance, the average annual job openings for logisticians are far higher than the annual educational completions for logisticians. Since Logistics is a target sector for Richmond, this should be a point of concern. For that matter, if information & communication technology is also a target sector, there is a talent gap for software developers as well.



Connect alumni with further education opportunities *within* the region. In general, as the degree level increases from bachelor's to master's & doctorate level degrees, the retention rate also increases. Yet only 1 in 5 profiles that have further education choose to pursue these additional studies in-region. By improving this metric, retention rates should also increase accordingly.



Engineer a comeback. Engineering degrees, whether generalized or specialized, frequently demonstrate higher retention rates for the region. Explore the demand and job growth for engineering occupations in the region and encourage area institutions to expand these program offerings to increase retention. Also inform talent entering college of opportunities in the engineering field to help increase interest in this high-retention field.



Biotechnology talent needs a look. The region has low retention in biology talent. Biology completions have doubled since 2009 and there is a surplus of biochemists. Yet biotechnology is a strong cluster in the region with an LQ above 3 for NAICS 325199 (Other Basic Organic Chemical Manufacturing). This retention issue will need more exploration by RVA NOW.



Focus on retention opportunity at University of Richmond. The University of Richmond draws more out of state talent to the region, while other area institutions draw from within the state and region. However, this makes talent retention more challenging. Business administration alumni from the University of Richmond are among the largest category for the institution, yet regional retention rates are very low. At the same time, business occupations are projected to increase in the Richmond region. Opportunities exist, but there might be a disconnect. If this could be reversed, the Richmond region could see noticeable improvement in its overall retention rates.



Talent Attraction Targets. Based on the analysis of occupations, MSAs, and countries, Emsi Burning Glass recommends the following targets:

- **Occupations:** Software developers, financial services sales agents, & logisticians (among others detailed in report)
- **MSAs:** Washington DC, NYC, Los Angeles, Baltimore, Chicago, Virginia Beach-Norfolk, Miami, Philadelphia, Boston, and Phoenix
- **Countries:** UK, Canada, Australia, India





Capitalize on this moment. The Covid-19 pandemic has caused migration patterns to shift across the United States. It is no accident that the Richmond region's population growth rate spiked in 2020 during the pandemic. As the pandemic continues, RVA NOW still has time to capitalize on a once-in-a-generation opportunity to capture people's attention for talent attraction. Never have people been so willing to move on from their current jobs; to escape enormous and expensive cities. Richmond can offer the solution: a medium-sized metro area with plenty of amenities while not too overwhelming; a moment in time where labor has more leverage and therefore can find great opportunities in markets they otherwise would not have considered.



You have the data. Now begin the outreach. Utilizing the data presented in this report as well as the accompanying Tableau dashboard, RVA NOW has the information it needs to begin targeting specific strategies and tactics to increase retention and gain footing in talent attraction. With that, data alone cannot reveal the full story. Data is strongest when accompanied by market validation. RVA NOW should accompany this report with ongoing outreach to engage retained talent, as well as talent that left the region, to find out why they stayed or left. This will further inform RVA NOW's programming. During its startup phase in 2020, RVA NOW conducted detailed research into GenZ perceptions of the Richmond region.¹⁸ We recommend that this component of their research continues. What perceptions prevent talent from coming to Richmond? What misconceptions cause regional talent to leave upon graduation? Only continued outreach can ensure this feedback stays current and accurate.



¹⁸ See Appendix for report on GenZ survey results.

APPENDIX 1: TARGET INDUSTRY DETAIL

APPENDICES

Appendix Table 1: GROWTH

NAICS	Description	2015 Jobs	2020 Jobs	2015-2020 Change	2015-2020 % Change	2015 LQ	2020 LQ
521	Monetary Authorities-Central Bank	1,881	1,911	30	2%	23.68	21.86
491	Postal Service	27	193	165	603%	0.61	3.20
999	Unclassified Industry	313	1,729	1,416	452%	0.30	2.71
312	Beverage and Tobacco Product Manufacturing	2,379	2,954	575	24%	2.41	2.43
551	Management of Companies and Enterprises	21,466	22,092	626	3%	2.25	2.19
522	Credit Intermediation and Related Activities	20,138	21,339	1,201	6%	1.80	1.85
325	Chemical Manufacturing	5,116	5,348	232	5%	1.45	1.46
901	Federal Government	29,674	30,926	1,251	4%	1.43	1.45
493	Warehousing and Storage	8,212	8,756	544	7%	2.27	1.45
492	Couriers and Messengers	3,922	5,777	1,855	47%	1.41	1.39
713	Amusement, Gambling, and Recreation Industries	8,632	8,723	91	1%	1.19	1.34
221	Utilities	2,734	2,892	158	6%	1.13	1.22

Source: Emsi Burning Glass Q2.2021 Dataset

Appendix Table 2: REQUIRES ATTENTION

NAICS	Description	2015 Jobs	2020 Jobs	2015-2020 Change	2015-2020 % Change	2015 LQ	2020 LQ
902	State Government	41,356	41,205	(151)	(0%)	1.78	1.77
322	Paper Manufacturing	2,523	2,473	(51)	(2%)	1.56	1.60
454	Nonstore Retailers	4,362	2,211	(2,150)	(49%)	1.53	0.70
524	Insurance Carriers and Related Activities	15,929	15,609	(320)	(2%)	1.37	1.23
813	Religious, Grantmaking, Civic, Professional, and Similar Organizations	15,825	14,290	(1,535)	(10%)	1.26	1.17
237	Heavy and Civil Engineering Construction	5,160	4,563	(597)	(12%)	1.21	0.96
525	Funds, Trusts, and Other Financial Vehicles	37	32	(5)	(13%)	1.16	0.40
812	Personal and Laundry Services	10,129	9,674	(455)	(4%)	1.11	1.08
321	Wood Product Manufacturing	1,921	1,624	(297)	(15%)	1.10	0.90
492	Couriers and Messengers	3,922	5,777	1,855	47%	1.41	1.39
713	Amusement, Gambling, and Recreation Industries	8,632	8,723	91	1%	1.19	1.34
221	Utilities	2,734	2,892	158	6%	1.13	1.22

Source: Emsi Burning Glass Q2.2021 Dataset

Appendix Table 3: EMERGING INDUSTRIES

NAICS	Description	2015 Jobs	2020 Jobs	2015–2020 Change	2015–2020 % Change	2015 LQ	2020 LQ
445	Food and Beverage Stores	12,450	13,294	844	7%	0.91	0.98
621	Ambulatory Health Care Services	30,648	33,211	2,563	8%	0.97	0.97
541	Professional, Scientific, and Technical Services	41,987	44,469	2,482	6%	0.97	0.96
236	Construction of Buildings	7,704	8,843	1,139	15%	0.92	0.94
531	Real Estate	7,785	8,726	941	12%	0.89	0.92
485	Transit and Ground Passenger Transportation	1,718	2,583	865	50%	0.65	0.91
444	Building Material and Garden Equipment and Supplies Dealers	5,036	5,356	320	6%	0.91	0.91
903	Local Government	52,299	52,574	274	1%	0.86	0.87
321	Wood Product Manufacturing	1,921	1,624	(297)	(15%)	1.10	0.90
492	Couriers and Messengers	3,922	5,777	1,855	47%	1.41	1.39
713	Amusement, Gambling, and Recreation Industries	8,632	8,723	91	1%	1.19	1.34
221	Utilities	2,734	2,892	158	6%	1.13	1.22

Source: Emsi Burning Glass Q2.2021 Dataset

Report: RICHMOND REGION PERCEPTIONS AMONG TARGET GROUPS



RVA NOW YRVA 2020 Survey Results

April 2, 2021

Table of Contents

- I. Background, Objectives, and Methodology
- II. Respondent Profile
- III. Key Findings
- IV. Summary



I. Background, Objectives, and Methodology

3



Background and Objectives

Building on the initial 2012 YRVA study, an initiative of Richmond's Future, SIR and RVA NOW collaborated to conduct a survey to see how perceptions of RVA have changed over time, identify opportunities for the region, and determine how RVA NOW might make an impact in promoting the capital region as an attractive place to live, work, and play, supporting the region's goal of retaining Virginia's recent college graduates and young professionals.

The overall goals of this project are to understand the following:

- Why do young people come to RVA?
- Why do they stay?
- Why do they leave?
- What would attract their peers, and what would cause them to stay?
- What, specifically, do we need to do in RVA to attract and retain the world's best and brightest young people?

4



Methodology

ONLINE SURVEY

- Fielded August 19-26, 2020 among Young Professionals (ages 18-40) living in the Richmond region.
 - NOTE: the timing of this survey fell a few months after George Floyd's murder and the resulting social unrest, as well as during the middle of the COVID-19 pandemic, both of which should be kept in mind when viewing these results
- On average the respondents took 13 minutes to complete the survey.
- Two sources for respondents were used:
 1. Online research panel, n=204
 - As a representative sample of the RVA region, this sample was used for most of the analysis shown in this report
 2. Convenience sample, n=252, obtained by sharing a survey link with project teams and media organizations
 - To understand how some findings have changed over time, this convenience sample was combined with the panel sample for consistency when comparing against results from a similar survey of Young Professionals fielded November 6, 2012 through January 31, 2013

5



II. Respondent Profile

6



Respondent gender, age, orientation

DEMOGRAPHIC	GROUP	SAMPLE PROPORTION
GENDER	Female	67%
	Male	32%
	Other	0.5%
AGE	18 - 24	26%
	25 - 29	24%
	30 - 34	21%
	35 - 40	28%
IDENTIFY AS LGBTQIA+	No	76%
	Yes	22%
	Prefer not to answer	3%

7

Q49: Are you...? Q45: In what year were you born?
Q54: Do you personally identify as lesbian, gay, bisexual, transgender, or queer (LGBTQIA+)?

n = 204



Respondent ethnicity, race and marital status

DEMOGRAPHIC	GROUP	SAMPLE PROPORTION
HISPANIC ETHNICITY	Not Hispanic or Latino	92%
	Hispanic or Latino	8%
RACE	White	70%
	Black or African-American	21%
	Asian	4%
	American Indian or Alaska Native	1%
	Native Hawaiian or Pacific Islander	1%
	Other	4%
MARITAL STATUS	Single	48%
	Married	31%
	Living with partner	18%
	Separated	2%
	Divorced	2%

8

Q50: Are you of Hispanic or Latino origin? Q51: Which of these do you consider yourself to be? Select all that apply.
Q53: What is your marital status?

n = 204



Respondent employment status and income

DEMOGRAPHIC	GROUP	SAMPLE PROPORTION
EMPLOYMENT	Employed full-time	56%
	Employed part-time	21%
	Unemployed, furloughed or temporarily laid off (COVID-19 related)	7%
	Homemaker/Stay at home parent	6%
	Self-employed/Freelancer/Entrepreneur	5%
	Unemployed or temporarily laid off (non-COVID-19 related)	2%
	Part time student and employed part-or full-time	1%
	Other	1%
ANNUAL HOUSEHOLD INCOME	Less than \$50,000	43%
	\$50,000-\$99,999	36%
	\$100,000-\$149,999	16%
	\$150,000+	5%

9

Q1: What is your current employment status?
Q52: Which of the following best represents your total combined annual household income?

n = 204



Respondent education and company size

DEMOGRAPHIC	GROUP	SAMPLE PROPORTION
EDUCATION	High school graduate or equivalent	25%
	Some college, no degree	22%
	Associate degree	10%
	Bachelor's degree	31%
	Master's degree	10%
	Doctorate	2%
COMPANY SIZE	Self-employed	5%
	Less than 25	18%
	26-50	11%
	51-100	12%
	101-250	10%
	251-1,000	12%
	Over 1,000	25%
	Don't know	6%

10

Q48: What is the highest level of education you have completed?
Q47: How many people work in your company?

n = 204



Respondent occupation industry

INDUSTRY	SAMPLE PROPORTION
Healthcare	12%
Financial sector	8%
Food/restaurant	8%
Education	6%
Retail	6%
Government	6%
Advertising/marketing/PR	5%
Non-profit	5%
IT/technology/computers	4%
Manufacturing	4%
Engineering	4%
Art/design	3%

INDUSTRY	SAMPLE PROPORTION
Consulting	3%
Musician	2%
Insurance	2%
Legal	2%
Computer programming	2%
Biotech	1%
Real estate	1%
Sports	1%
Media (TV, newspaper, radio)	1%
Research	1%
Science	1%
Writer	1%

11 Q46: In what industry do you work?

n = 204



III. Key Findings

12



5

This section is
organized around
5 key insights.

13



CHOOSING RVA

14



1

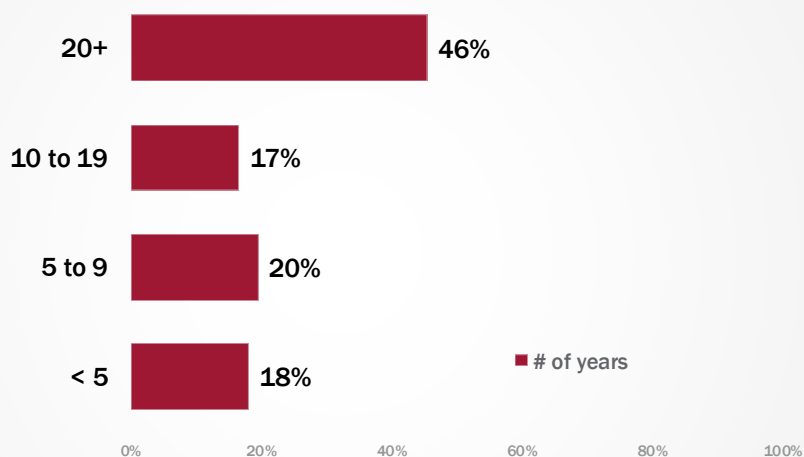
While location and job are important, many local young professionals chose to live in RVA to be near friends and family.

15



RELATIONSHIP TO RVA

On average respondents have lived in RVA 17 years, with nearly half living in the area for 20 or more years



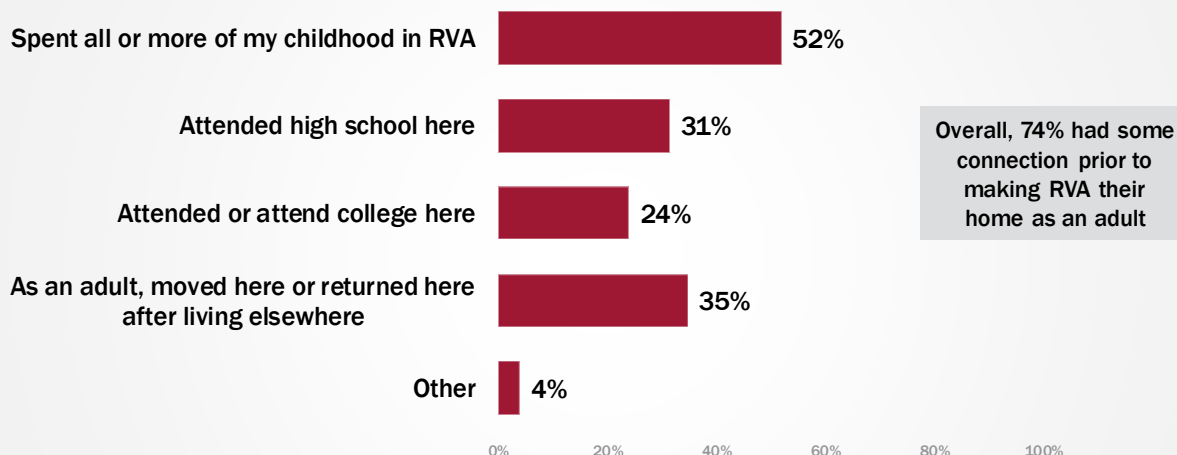
16

Q4: How long have you lived in the Richmond region?



RELATIONSHIP TO RVA

Many have a prior connection to RVA, with just over half having grown up here, and a quarter attending college in RVA



17

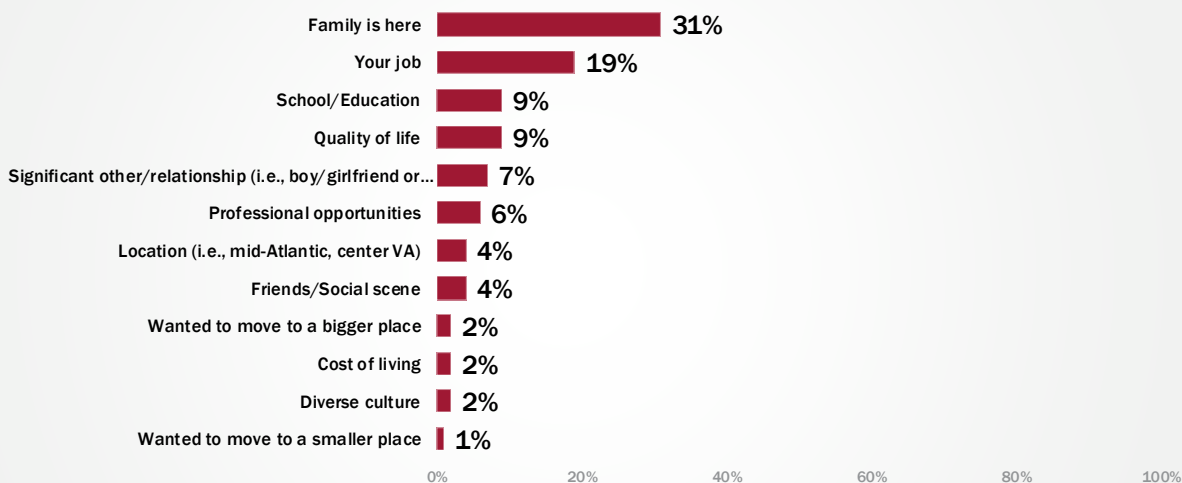
Q5: Which of the following best describes your history living in the Richmond region? Select all that apply.

n = 204



CHOOSING RVA

For nearly half, family is the primary reason for deciding to live in RVA, with education and their job as distant second reasons



18

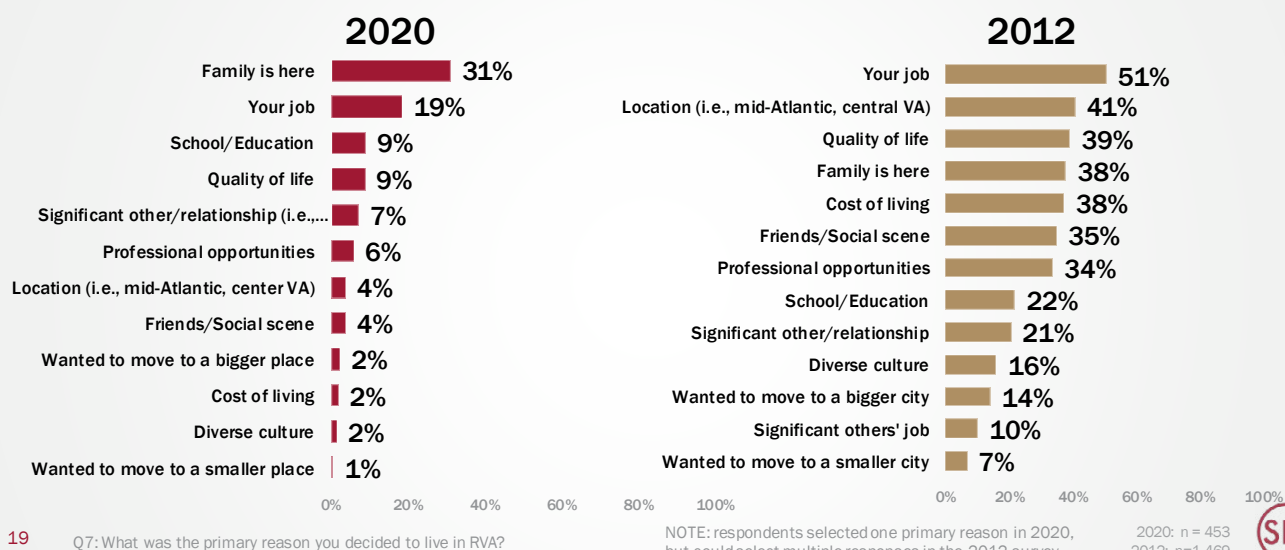
Q7: What was the primary reason you decided to live in RVA?

n = 204



CHOOSING RVA

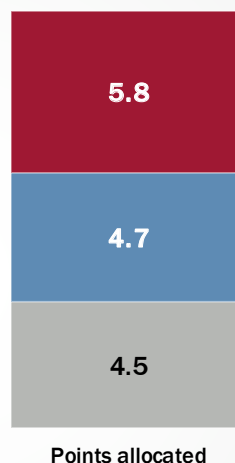
Job and location were at the top of the list of reasons for living in RVA in 2012, while family tops the list in 2020, followed by their job



CHOOSING RVA

While location and job are also very important, being near friends and family is most important in choosing a place to live

- People first – I focused my decision more on being near family, friends, and/or significant other
- Location first – I focused my decision more on the city and then finding a job there
- Job first – I focused on a job and then made the city work for me



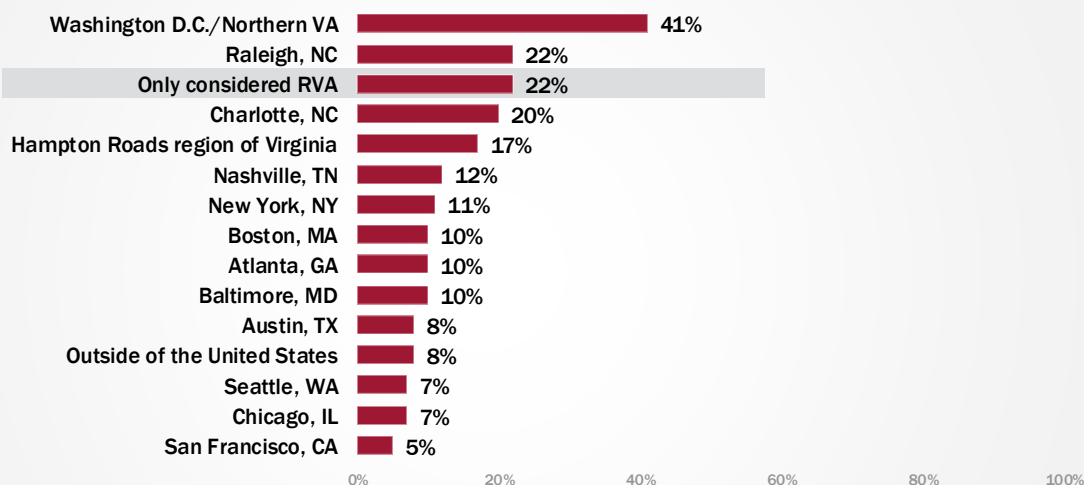
20 Q19: Thinking about that last time you made a decision on a location to live, or thinking about your next decision, how important are each of the following in your decision-making process? Please assign a total of 15 points across each of the three options below

n = 204



CHOOSING RVA

While nearly a quarter only considered RVA as a place to live, NOVA, Raleigh, Charlotte, and the 757 are strong competitors



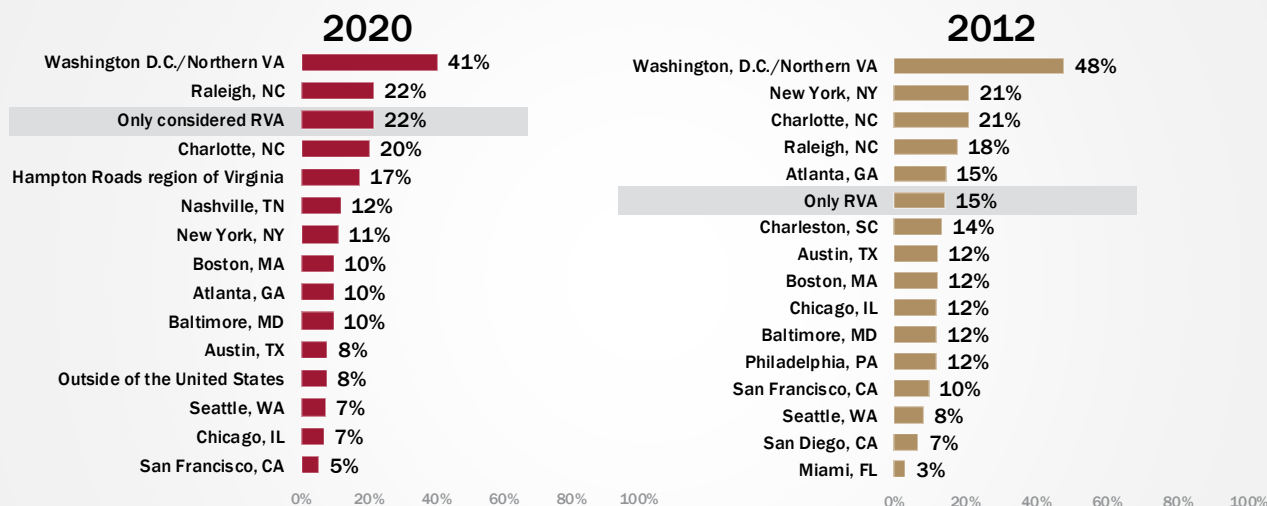
21 Q18: When you were deciding to live in or stay in RVA, what other cities did you consider? Select all that apply.

n = 387



CHOOSING RVA

The percent only considering RVA has significantly increased from 2012, yet NOVA continues to be the region's primary competitor



22 Q18: When you were deciding to live in or stay in RVA, what other cities did you consider? Select all that apply.

2020: n = 387
2012: n = 1,469



1 IMPLICATION

Celebrate RVA's success in increasing the percentage of young professionals only considering Richmond as a place to live! The region appears to have a unique draw for those who grew up here and have desire to be near their family. However, we can't rest on our laurels. There continues to be stiff competition with our close neighbors. Ensuring that RVA delivers on what young professionals are looking for will be key.

23



OVERALL SATISFACTION WITH RVA

24



2

RVA is seen as a diverse, history-rich, and fun river city. Overall, the region receives positive scores, but some opportunities to improve satisfaction are appearing.

25



PERCEPTIONS OF RVA

Young professionals associate RVA with history, diversity, fun, and beauty

WHEN YOU THINK OF RICHMOND



WHEN COMPARED TO OTHER PLACES



26 Q8. What three words come to mind when you think about the Richmond region?

Q9. From your perspective, what three words best describe the Richmond region as compared to other places?

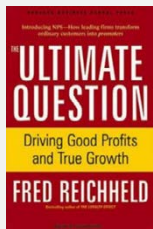


NET PROMOTER SCORE™

27 NPS is the trademark of Bain & Company.



NET PROMOTER SCORE™ calculation



The percentage of
visitors, customers, respondents
who are “**promoters**”
(highly likely to recommend you)

% of Promoters
(Rating 9 or 10)

minus the percentage
who are “**detractors**”
(less likely to recommend you)

% of Detractors
(Rating 0 to 6)

NET PROMOTER SCORE™

28 NPS is the trademark of Bain & Company.



NET PROMOTER SCORE

Young professionals give RVA an overall NPS™ of **+24**

Percentage of Promoters
(Rating 9 or 10) 43%

Percentage of Detractors
(Rating 0 to 6) 19%

NET PROMOTER SCORE™ +24

29

NPS is the trademark of Bain & Company.

*Source: <https://www.lipmanhearn.com/the-ultimate-question-how-do-you-measure-up>

n = 204

**NET PROMOTER SCORE**

RVA's NPS™ in 2020 was up slightly from 2012 due to a small drop in Detractors

2012

Percentage of Promoters
(Rating 9 or 10) 43%

Percentage of Detractors
(Rating 0 to 6) 22%

NET PROMOTER SCORE™ +21

2020

Percentage of Promoters
(Rating 9 or 10) 43%

Percentage of Detractors
(Rating 0 to 6) 19%

NET PROMOTER SCORE™ +24

30

NPS is the trademark of Bain & Company.

*Source: <https://www.lipmanhearn.com/the-ultimate-question-how-do-you-measure-up>2020: n = 453
2012: n=1,469

PLACE SCORE

31



SIR's "PLACE" Score: A measure of a "quality place"

SIR has developed a proprietary **PLACE score**, which incorporates ratings of five elements of a quality place into one measure.

"PLACE" is an acronym that stands for:



32



PLACE score input questions

All questions are on a 1 to 5 scale, with 5 being the highest



33 Notes: Includes "Don't know" options



How to calculate a PLACE score

1. Remove "don't know" responses from the input questions.

2. Add up the percentages of the "4" and "5" ratings for each input question.

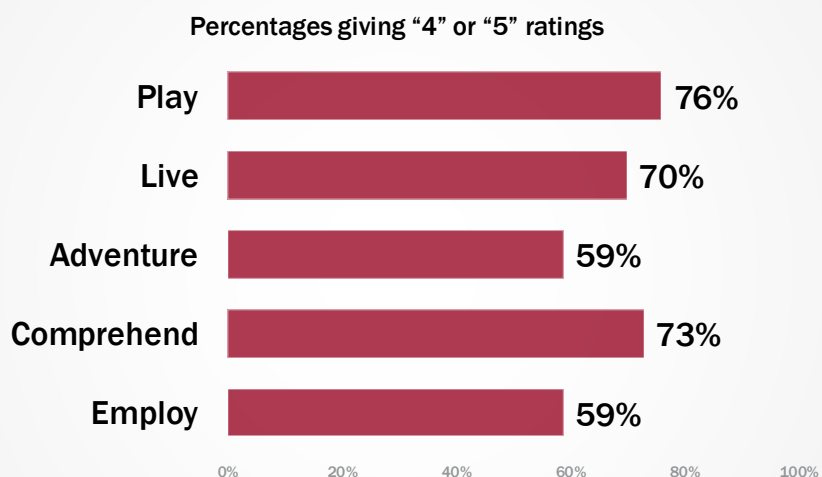
3. Find the average (arithmetic mean) of these top-line percentages.

Using this method, each input question receives equal weight in the overall score calculation.

34



The input question results below were used to calculate RVA's
PLACE score



35 Note: "Don't know" responses have been removed from the revised n.

n = 204



RVA's
2020
online survey
PLACE
score

67%

Out of a potential
score of 100%

36



PLACE SCORE

Compared with residents of all kinds in other cities, RVA's PLACE Score among YPs shows opportunity for improvement

MEASURE	FORT WORTH	CITY X	MINNEAPOLIS	NASHVILLE	COLUMBUS	RICHMOND OVERALL	RVA YPs
PLAY	76%	57%	86%	80%	71%	70%	75%
LIVE	85%	54%	82%	73%	77%	72%	70%
ADVENTURE	71%	60%	74%	80%	58%	70%	59%
CAREERS	75%	43%	78%	75%	81%	64%	73%
EDUCATION	79%	58%	81%	73%	77%	57%	59%
PLACE SCORE	77%	54%	80%	76%	73%	68%	67%

37 SIR Research

 = Highest Score



PLACE SCORE

Overall, those who have no prior connection to RVA and those who are over the age of 30 give higher PLACE Scores

MEASURE	Prior RVA connection		Age		RVA YPs
	Yes	No	<30	30+	
PLAY	74%	81%	72%	81%	75%
LIVE	68%	77%	64%	76%	70%
ADVENTURE	59%	60%	58%	60%	59%
CAREERS	57%	64%	52%	65%	73%
EDUCATION	70%	81%	67%	78%	59%
PLACE SCORE	65%	73%	63%	72%	67%

38

Statistically higher,
90% confidence

n = 204



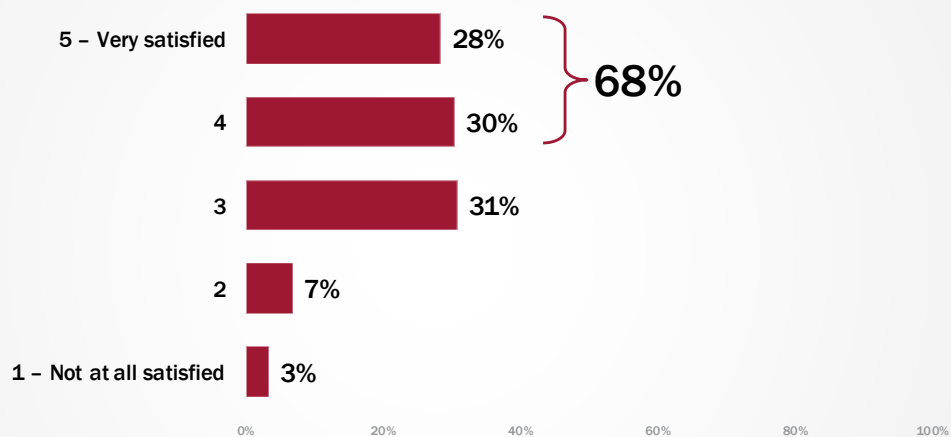
SATISFACTION WITH WORK

39



RVA WORKPLACE

Recall, over two-thirds are satisfied with employment opportunities in RVA



n = 204

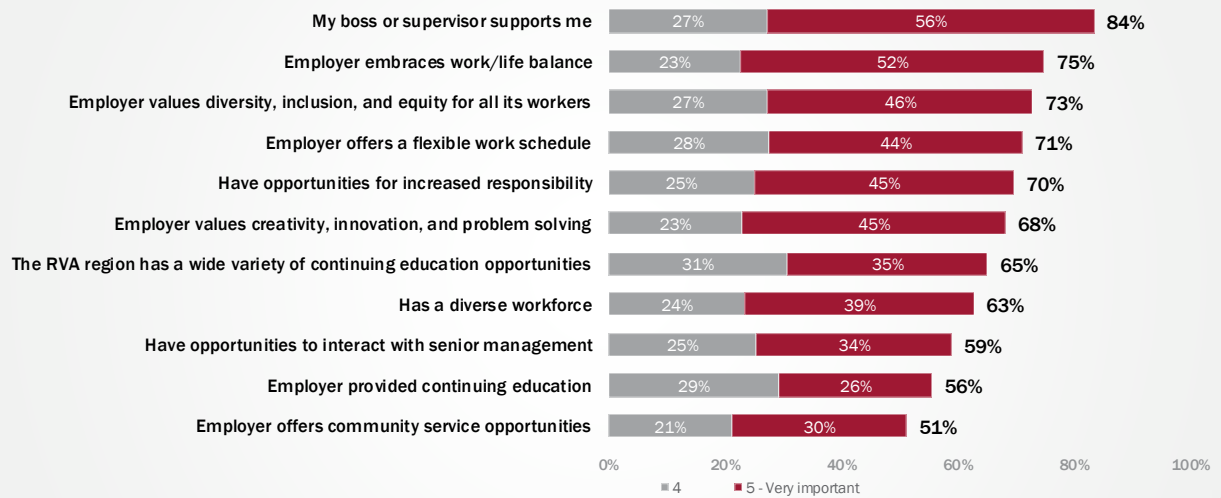
40

Q13: Overall, how satisfied are you with the employment opportunities available to you in the Richmond region?



RVA WORKPLACE

Having a supportive boss, work/life balance, and an employer who values diversity and inclusion are most important



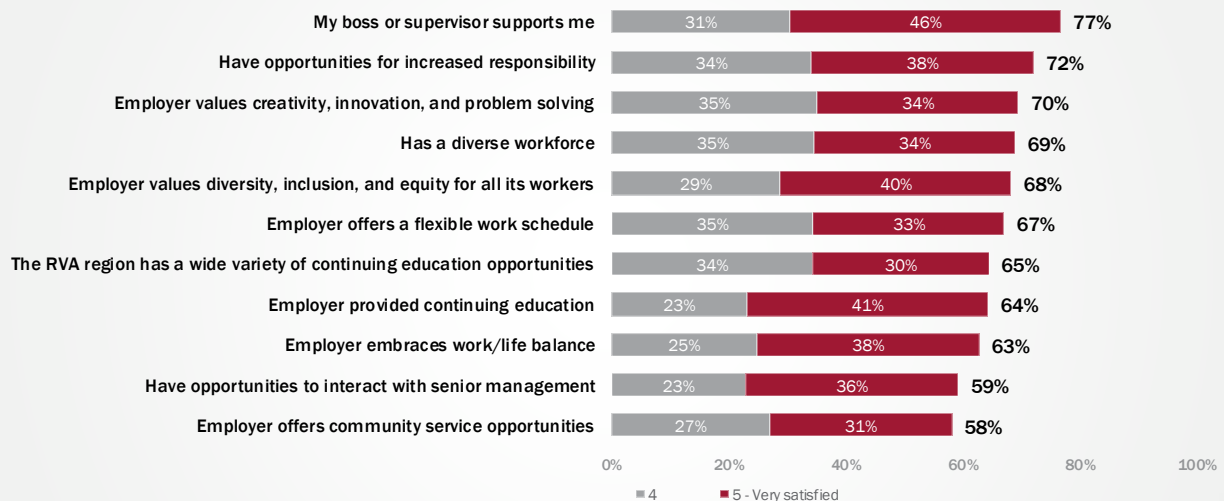
41

Q16: In thinking about your work situation, how important are each of the following to you?

BASE: those employed full/part time
n = 158

RVA WORKPLACE

Employees are most satisfied with their supportive boss, opportunities for increased responsibility, and being valued for creativity and problem solving



42

Q17: How would you rate your current employer at offering each of the following?

BASE: those employed full/part time
n = 158

RVA WORKPLACE

RVA employers are meeting employees' expectations on most attributes, although employers embracing work/life balance shows some opportunity for improvement

ATTRIBUTE	IMPORTANCE	PERFORMANCE	GAP SCORE	
Employer embraces work/life balance	4.3	3.9	91%	
My boss or supervisor supports me	4.4	4.1	94%	
Employer offers a flexible work schedule	4.1	3.9	95%	
Employer values diversity, inclusion, and equity for all its workers	4.1	4.0	98%	
Have opportunities for increased responsibility	4.1	4.0	98%	
The RVA region has a wide variety of continuing education opportunities	3.9	3.9	99%	
Employer values creativity, innovation, and problem solving	4.0	4.0	99%	
Have opportunities to interact with senior management	3.7	3.8	101%	
Has a diverse workforce	3.9	4.0	101%	
Employer offers community service opportunities	3.5	3.6	102%	
Employer provided continuing education	3.7	3.8	103%	

100%
Perfect
alignment

Below 90%
Below
expectations

Above 110%
Above
expectations

43

Q16: In thinking about your work situation, how important are each of the following to you?
Q17: How would you rate your current employer at offering each of the following?

BASE: those employed full/part time
n = 158



2

IMPLICATION

Satisfaction with RVA as a place seems to be improving as seen with it's increased NPS. Moreover, YPs tend to be satisfied with the region especially as a place to play, live, and work. However, they are slightly less satisfied with RVA as a place to learn and visit, which may be a product of these YPs not yet having a full sense of all there is to see and experience in the region. This may demonstrate a great opportunity for RVA NOW to help students fully appreciate the great place that is RVA.

44



3

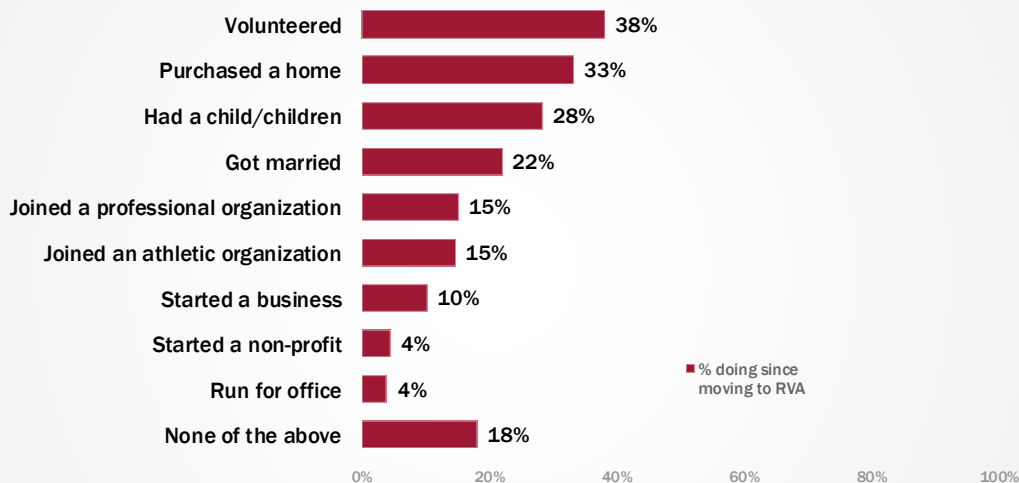
RVA appears to be an accepting community — but maybe not one where all people feel they can belong.

45



COMMUNITY IN RVA

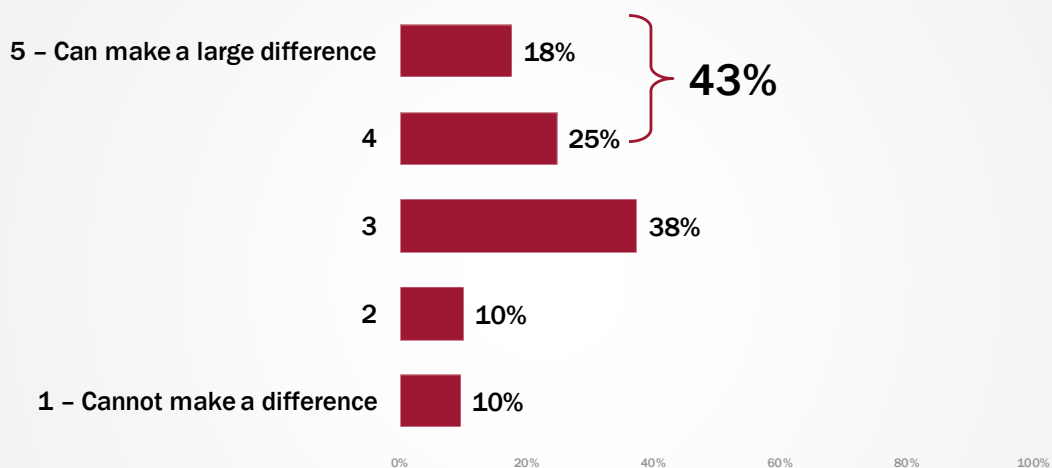
Many have volunteered, a third have purchased a home, over a quarter have had children, and nearly a quarter have gotten married since settling in RVA



46 Q35: Have you done any of the following since moving here? If you never moved away from the region, think in terms of your adult/professional life. Select all that apply.

n = 204



COMMUNITY IN RVA**Two in five feel they can make a difference in the community**

47 Q27: How much of a difference do you feel you can make in this community?

n = 204



BELONG SCORE

48

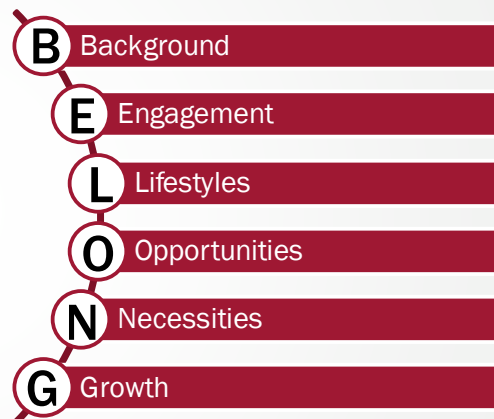


SIR's "BELONG" Score:

A measure of diverse, equitable, and inclusive communities and organizations

SIR has developed a proprietary **BELONG score**, which incorporates ratings of six elements of a diverse, equitable, and inclusive community into one measure.

"BELONG" is an acronym that stands for:



49



BELONG score input questions

All questions are on a 1 to 5 scale, with 5 being the highest



50 Note: Questions include "Don't know" options.



How to calculate a **BELONG** score

1. Remove “don’t know” responses from the input questions.

2. Add up the percentages of the “4” and “5” ratings for each input question.

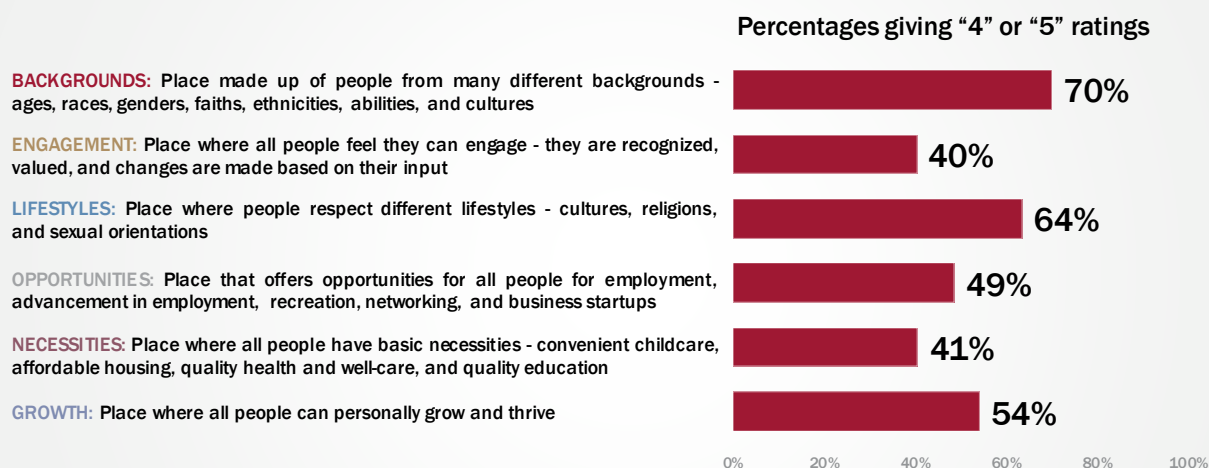
3. Find the average (arithmetic mean) of these topline percentages.

Using this method, each input question receives equal weight in the overall score calculation.

51



The input question results below were used to calculate RVA'S **BELONG** score



52 Note: “Don’t know” responses have been removed from the revised n.



RVA's
2020
 online survey
BELONG
 score

53%

Out of a potential
 score of 100%

53



PLACE SCORE

Overall, those who have lived in RVA less than 20 years and those who are female have higher BELONG Scores

MEASURE	Years in RVA		Gender		RVA YPs
	<20	20+	Male	Female	
BACKGROUNDS	72%	68%	75%	69%	70%
ENGAGEMENT	46%	43%	33%	52%	40%
LIFESTYLES	70%	58%	60%	68%	64%
OPPORTUNITIES	51%	46%	52%	48%	49%
NECESSITIES	44%	43%	34%	48%	41%
GROWTH	60%	52%	51%	60%	54%
BELONG SCORE	57%	52%	51%	57%	53%

Statistically higher,
 90% confidence

n = 204



54

3

IMPLICATION

We should celebrate that RVA is seen among YPs as a place that's very accepting of other backgrounds and lifestyles. However, they do not seem to feel RVA is a great place where people can engage, that there are opportunities for all, that basic necessities are always met, or that it's a place where all can personally grow and thrive. These are big challenges and not necessarily in RVA NOW's purview. The key will be showcasing how people can get involved and actually make a difference in helping RVA be a great place for ALL people.

55



4

YPs in RVA are looking for a place that is safe, has quality and affordable housing, a great food scene, and feels like home. RVA, however, does not always deliver.

56



Assessing the rational and emotional elements of a quality place to live

A quality place will meet both the rational and emotional needs of its residents



- In order to assess these needs and how they are (or are not) being met, respondents were shown two lists describing:

- **RATIONAL** attributes of a place to live (e.g., has good public schools)
- **EMOTIONAL** attributes of a place to live (e.g., feels like home)

- For each list, respondents were asked to rate both the **importance** of each attribute and RVA's **performance** on a 1-5 scale (with 5 being the high end).

57



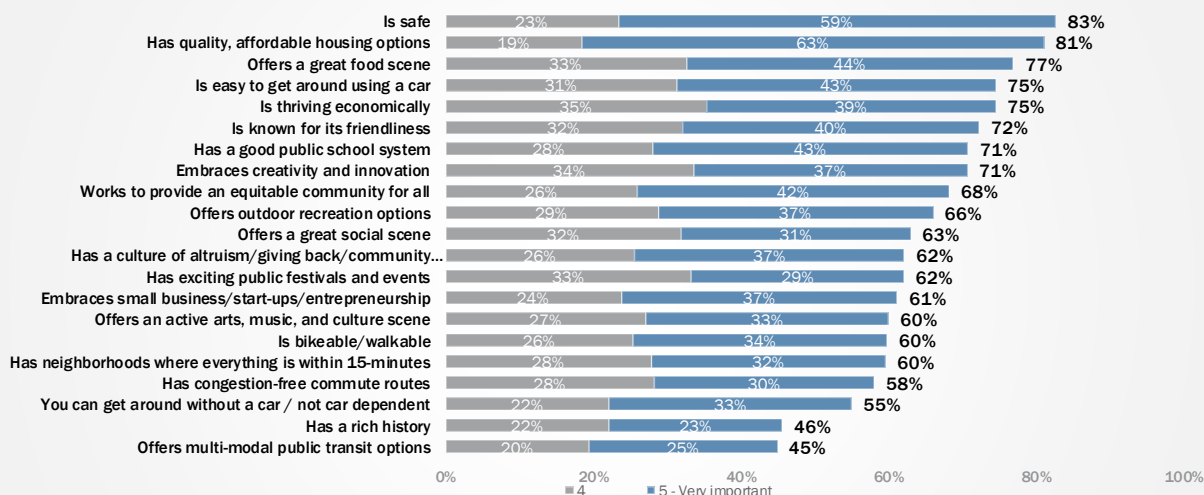
EXPECTATIONS

58



PLACE EXPECTATIONS – RATIONAL ATTRIBUTES

Safety and affordable housing top the list of most important factors in choosing a place to live



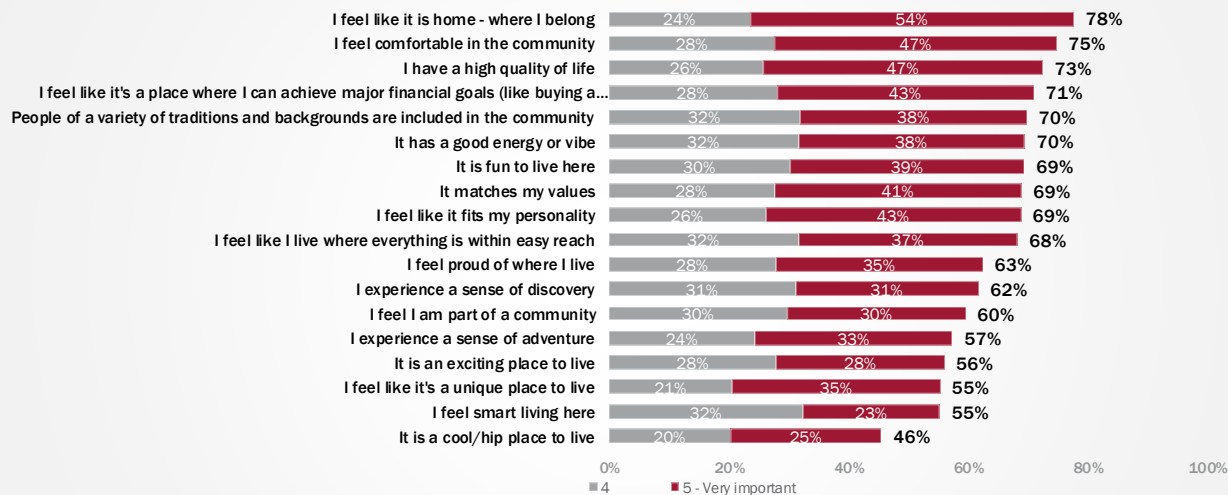
59 Q21: When you think about a place you'd really want to live, how important are each of the following to you? A place that...

n = 204



PLACE EXPECTATIONS – EMOTIONAL ATTRIBUTES

YPs feel it's important for a locality to feel like home and be somewhere they can feel comfortable and have a high quality of life



60 Q22: When thinking about your ideal locality, how important is it that a location evoke the following feelings?

n = 204



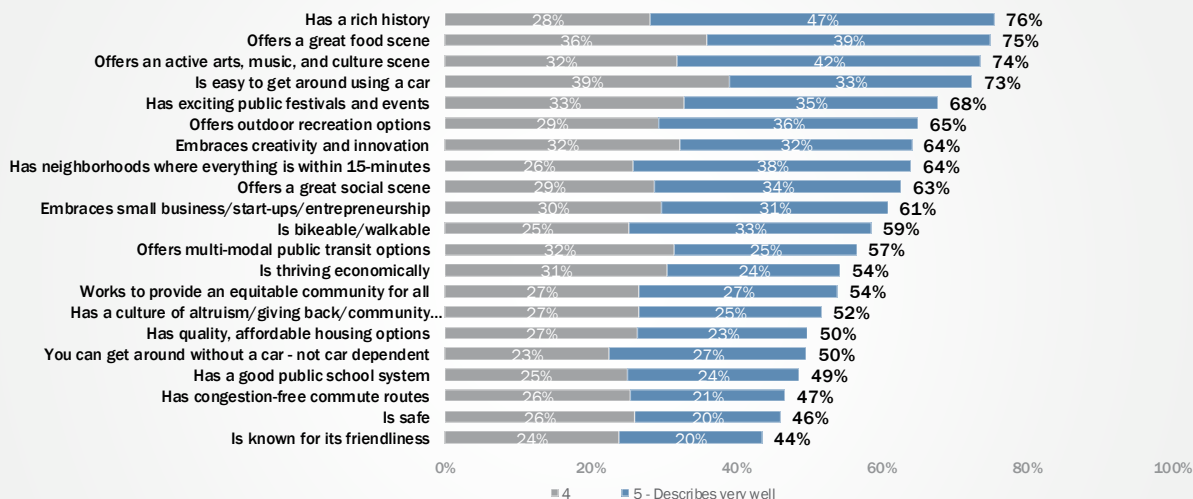
RVA'S PERFORMANCE

61



PLACE PERFORMANCE – RATIONAL ATTRIBUTES

RVA rates well on having a rich history, have a great food, arts, music and cultural scene, and being easy to get around using a car



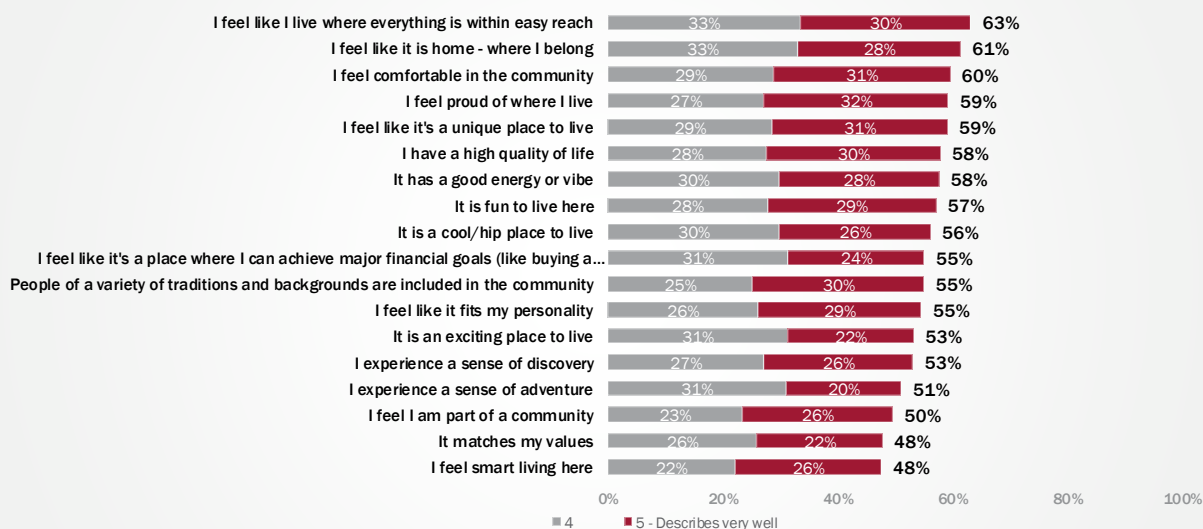
62 Q23: Now let's think about these items and the Richmond region, specifically.
How well do you think the following attributes describe the Richmond region?

n = 204



PLACE PERFORMANCE – EMOTIONAL ATTRIBUTES

Three in five say RVA feels like home and that it's a place where everything is within easy reach and where they feel comfortable in the community



GAP ANALYSIS

Understanding gap analysis

Expectation vs. performance

The first step in identifying areas of opportunity is to look at **gap analysis**. This gathers ratings of what respondents find **important** when it comes to a community — their **expectation**.

The process then follows up by asking respondents how **satisfied** they are with a community's ability to deliver against those various attributes — its **performance**.

$$\begin{array}{c} \text{AVERAGE} \\ \text{PERFORMANCE} \\ \text{of attribute} \end{array} \div \begin{array}{c} \text{AVERAGE} \\ \text{IMPORTANCE} \\ \text{of attribute} \end{array} = \text{GAP SCORE}$$

65



PLACE EXPECTATIONS – RATIONAL ATTRIBUTES

While RVA outperforms on having a rich history, it trails on safety, affordable housing, friendliness, and having a thriving economy

ATTRIBUTE	IMPORTANCE	PERFORMANCE	GAP SCORE	ATTRIBUTE	IMPORTANCE	PERFORMANCE	GAP SCORE
Is safe	4.4	3.5	79%	Embraces small business/start-ups/entrepreneurship	3.9	3.8	99%
Has quality, affordable housing options	4.4	3.6	81%	Has exciting public festivals and events	3.8	4.0	104%
Offers a great food scene	4.2	4.1	99%	Offers an active arts, music, and culture scene	3.8	4.1	107%
Is known for its friendliness	4.1	3.5	85%	Is bikeable/walkable	3.8	3.8	99%
Is thriving economically	4.1	3.7	89%	Has neighborhoods where everything is within 15-minutes	3.8	3.9	104%
Is easy to get around using a car	4.1	3.9	96%	Has congestion-free commute routes	3.8	3.4	89%
Works to provide an equitable community for all	4.1	3.7	91%	Offers a great social scene	3.8	3.8	102%
Embraces creativity and innovation	4.0	3.9	97%	You can get around without a car – not car dependent	3.5	3.5	98%
Offers outdoor recreation options	4.0	4.0	100%	Has a rich history	3.4	4.2	122%
Has a good public-school system	3.9	3.5	88%	Offers multi-modal public transit options	3.3	3.7	111%
Has a culture of altruism/giving back/community engagement	3.9	3.6	93%	Embraces small business/start-ups/entrepreneurship	3.9	3.8	99%

100%
Perfect alignment

Below 90%
Below expectations

Above 110%
Above expectations

n = 204

66

Q21: When you think about a place you'd really want to live, how important are each of the following to you? A place that...

Q23: Now let's think about these items and the Richmond region, specifically. How well do you think the following attributes describe the Richmond region?



PLACE EXPECTATIONS – EMOTIONAL ATTRIBUTES

While RVA outperforms on being a hip place to live, there's room to improve on being a place that feels like home – where their values are met, and goals can be achieved

ATTRIBUTE	IMPORTANCE	PERFORMANCE	GAP SCORE	ATTRIBUTE	IMPORTANCE	PERFORMANCE	GAP SCORE
I feel like it is home – where I belong	4.3	3.7	87%	I feel like I live where everything is within easy reach	3.9	3.9	98%
I feel comfortable in the community	4.2	3.8	90%	I feel proud of where I live	3.9	3.8	97%
I have a high quality of life	4.1	3.8	92%	I experience a sense of discovery	3.8	3.6	95%
I feel like it's a place where I can achieve major financial goals like buying a house	4.1	3.6	89%	I experience a sense of adventure	3.8	3.5	92%
It is fun to live here	4.1	3.8	92%	I feel I am part of a community	3.8	3.5	92%
I feel like it fits my personality	4.0	3.6	90%	I feel like it's a unique place to live	3.8	3.7	98%
It matches my values	4.0	3.5	87%	It is an exciting place to live	3.7	3.6	96%
It has a good energy or vibe	4.0	3.7	92%	I feel smart living here	3.6	3.5	98%
People of a variety of traditions and backgrounds are included in the community	4.0	3.8	95%	It is a cool/hip place to live	3.3	3.7	110%

100%
Perfect alignment

Below 90%
Below expectations

Above 110%
Above expectations

67

Q22: When thinking about your ideal locality, how important is it that a location evoke the following feelings?
Q24: How well does the Richmond region evoke the following feelings?

n = 204



OPPORTUNITY MAPPING

68



Understanding Opportunity Mapping

- Similar to Gap Analysis, **OPPORTUNITY MAPPING** is another way to look at importance and performance attributes.
- Using a four-quadrant map, average Top 2 Box ratings for importance and performance for each attribute are mapped based off their relationship to overall question averages.



Attributes with:

1. Higher than average importance
2. Lower than average performance

=

your best
GROWTH OPPORTUNITIES

69



OPPORTUNITY MAP RATIONAL PLACE ATTRIBUTES

Growth opportunities are important to respondents but not rated highly; this is where Virginia should focus for the greatest ROI.

IMPORTANCE ↑

BEST GROWTH OPPORTUNITY

- Is safe
- Has quality, affordable housing options
- Is known for its friendliness
- Has a good public school system
- Is thriving economically
- Works to provide an equitable community for all

REINFORCE

- Embraces creativity and innovation
- Is easy to get around using a car
- Offers outdoor recreation options
- Offers a great food scene

VALUE-ADD SATISFIERS

- Has congestion-free commute routes
- Has a culture of altruism/giving back/community engagement
- You can get around without a car – not car dependent
- Is bikeable/walkable
- Offers multi-modal public transit options

ALREADY WORKING

- Embraces small business/start-ups/entrepreneurship
- Offers a great social scene
- Has neighborhoods where everything is within 15-minutes
- Has exciting public festivals and events
- Offers an active arts, music, and culture scene
- Has a rich history

PERFORMANCE →

70



OPPORTUNITY MAP EMOTIONAL PLACE ATTRIBUTES

Growth opportunities are important to respondents but not rated highly; this is where Virginia should focus for the greatest ROI.

IMPORTANCE

BEST GROWTH OPPORTUNITY

- It matches my values
- I feel like it fits my personality
- People of a variety of traditions and backgrounds are included in the community
- I feel like it's a place where I can achieve major financial goals (like buying a house)

REINFORCE

- I feel like I live where everything is within easy reach
- It has a good energy or vibe
- It is fun to live here
- I have a high quality of life
- I feel comfortable in the community
- I feel like it is home - where I belong

VALUE-ADD SATISFIERS

- It is an exciting place to live
- I experience a sense of adventure
- I feel smart living here
- I experience a sense of discovery
- I feel I am part of a community

ALREADY WORKING

- It is a cool/hip place to live
- I feel like it's a unique place to live
- I feel proud of where I live

PERFORMANCE



71

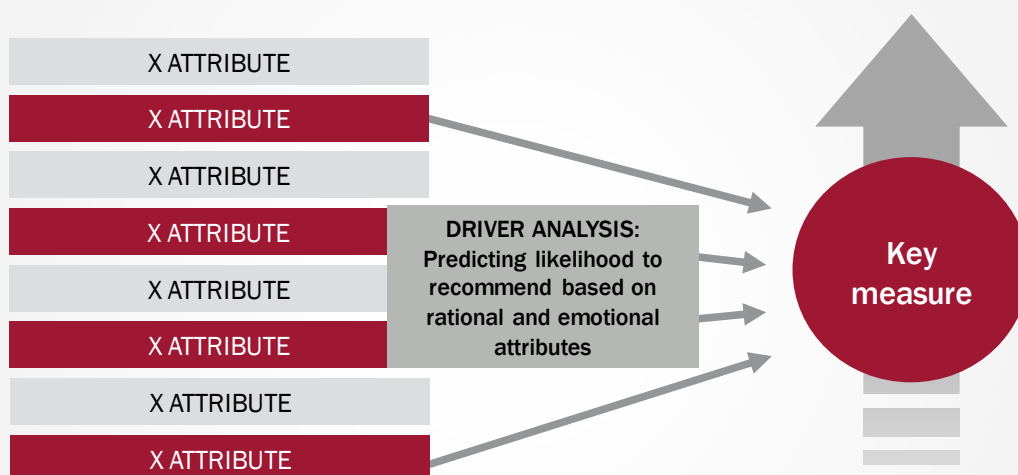
DRIVER ANALYSIS



72

DRIVER ANALYSIS

Identifies the specific attributes driving a key measure — as the ratings of those attributes increase, so should the overall key measure rating

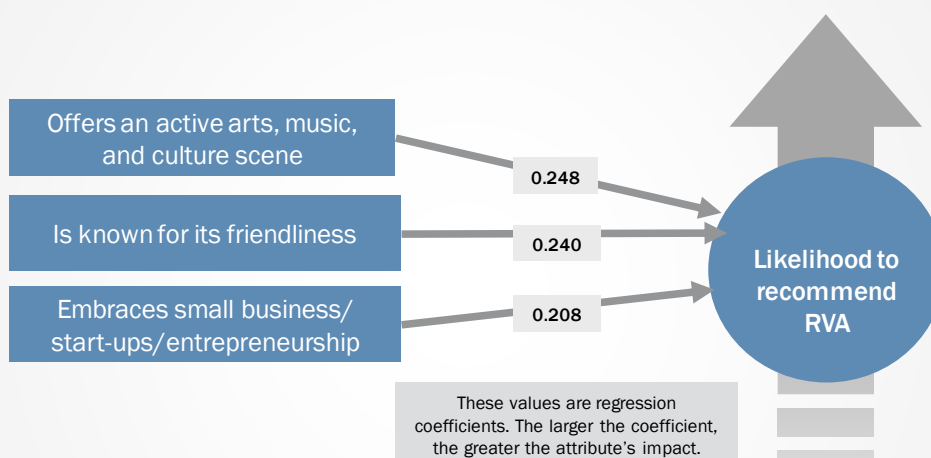


73



RATIONAL PLACE ATTRIBUTE DRIVER ANALYSIS

Offering an active art/music/culture scene, being known for its friendliness and embracing start-ups/entrepreneurship are the top drivers for recommending RVA

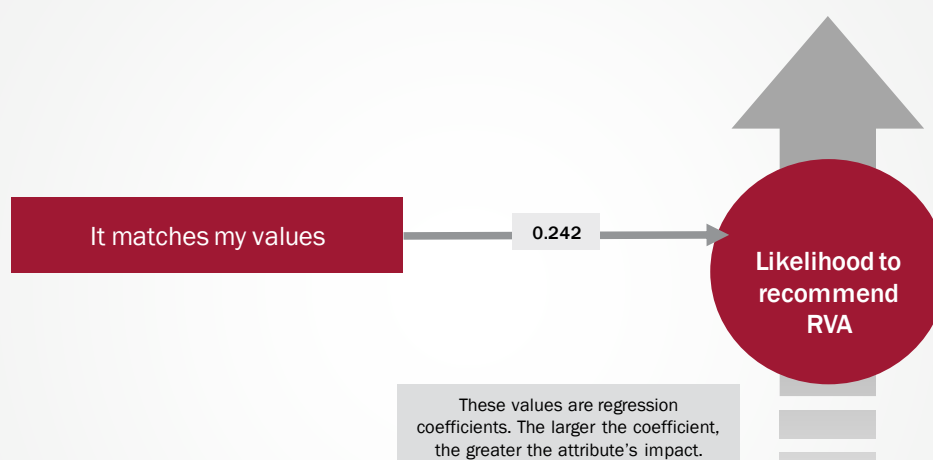


74 Note: Q22 responses were used to predict Q11 responses.



EMOTIONAL PLACE ATTRIBUTE DRIVER ANALYSIS

Matching my values is the top driver of recommending for RVA



75 Note: Q23 responses were used to predict Q11 responses.



RATIONAL PLACE ATTRIBUTE SUMMARY

RVA Young Professionals find rational value in a community that's safe, has quality, affordable housing, is known for its friendliness, and is thriving economically

GAP ANALYSIS	GROWTH OPPORTUNITIES	DRIVER ANALYSIS
Is safe	Is safe	Offers an active arts, music, and culture scene
Has quality, affordable housing options	Has quality, affordable housing options	Is known for its friendliness
Is known for its friendliness	Is known for its friendliness	Embraces small business/start-ups/entrepreneurship
Is thriving economically	Is thriving economically	
Has congestion-free commute routes	Has a good public school system	
	Works to provide an equitable community for all	

76



EMOTIONAL PLACE ATTRIBUTE SUMMARY

RVA Young Professionals find emotional value in a place that matches their values and provides opportunities to achieve their major financial goals, like home ownership

GAP ANALYSIS	GROWTH OPPORTUNITIES	DRIVER ANALYSIS
It matches my values	It matches my values	It matches my values
I feel like it's a place where I can achieve major financial goals (like buying a house)	I feel like it's a place where I can achieve major financial goals (like buying a house)	
I feel like it is home – where I belong	People of a variety of traditions and backgrounds are included in the community	
	I feel like it fits my personality	

77



4

IMPLICATION

While RVA is exceeding expectations on some attributes, there are opportunities for improvement. These opportunities include addressing both the perception and reality of some very table-stakes rational attributes of a place — that's its safe, friendly, affordable and thriving. It will also be important to help young professionals feel that RVA is a place that matches their values and provides opportunities to achieve their goals. Touching on these messages throughout communications may begin to shift perceptions and make RVA a more appealing place to live and ultimately plant roots.

78



5

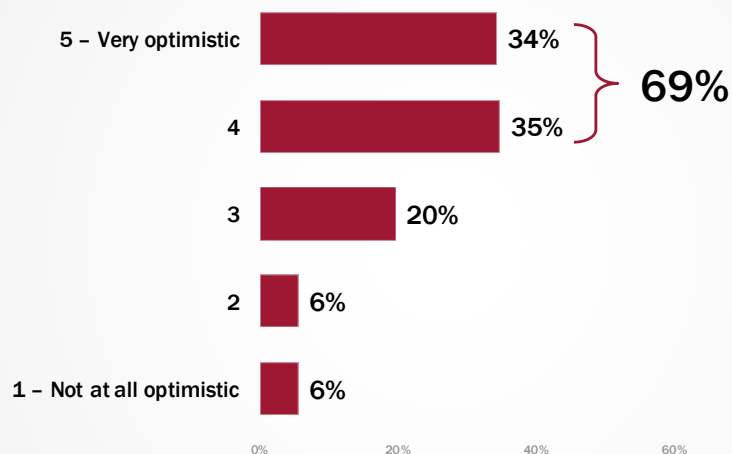
The majority say they are optimistic about RVA's future and would choose RVA all over again.

79



EXPERIENCING RVA

Two-thirds feel optimistic about RVA's future as a place to live, work and play



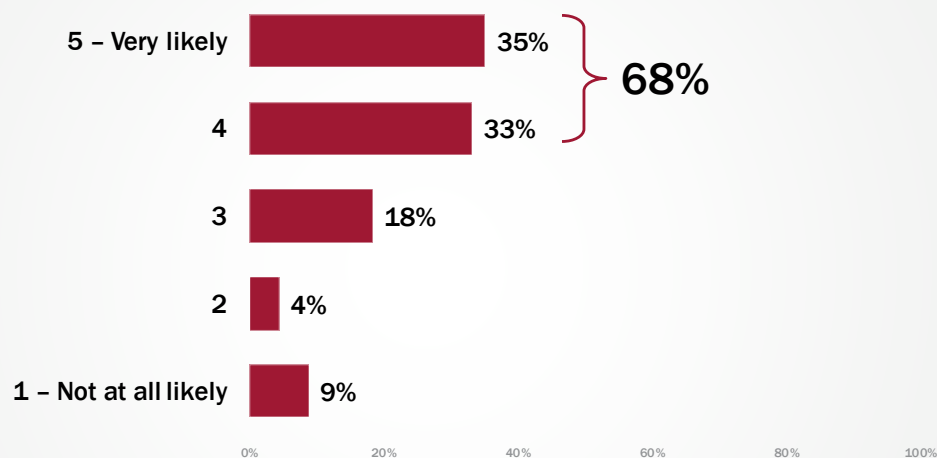
80 Q33: Overall, how do you feel about the future of the Richmond region as a place to live, work, play, and visit?

n = 204



EXPERIENCING RVA

Over two-thirds would choose RVA again if they had to do it all over



81

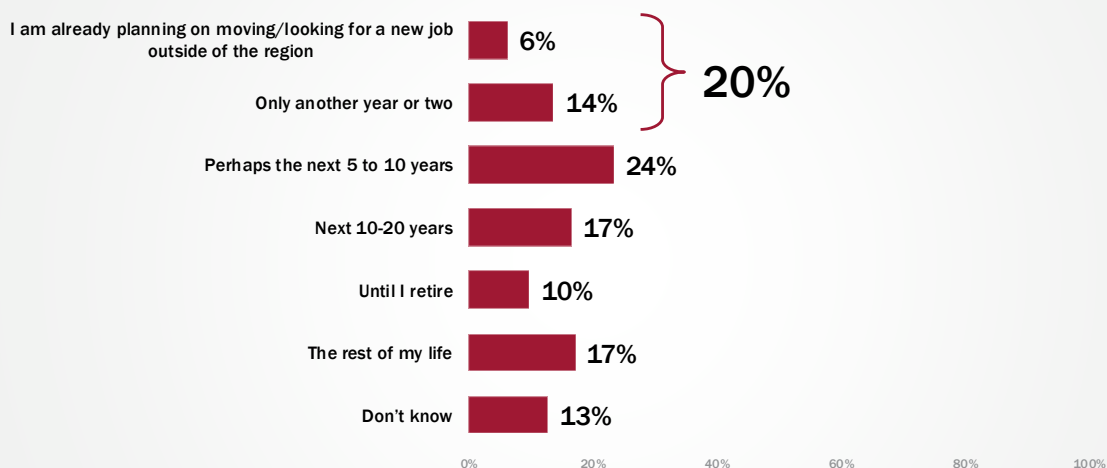
Q28: If you had to make your decision to live in the Richmond region all over again, how likely would you be to choose Richmond, knowing what you know now?

n = 204



EXPERIENCING RVA

One in five young professionals are planning to leave the RVA region within the next two years



82

Q29: How much longer do you think you'll live in the Richmond region?

n = 204



EXPERIENCING RVA

Illustrative open-end reasons given for considering leaving RVA

NEW EXPERIENCE

- *It's where I grew up and I want a change*
- *I want to see what somewhere else is like*
- *I plan to travel the world, nothing personal*
- *Because I want to start a new chapter*
- *Because I was born here & just want to experience something different*
- *I've always wanted to live in North Carolina*

AVOIDING CRIME/VIOLENCE

- *Too much killing and violence in the area*
- *To much violence for having small children*
- *Safer environment*
- *Crime*
- *Too much rioting, looting, and complaining*
- *I want to move somewhere I feel more safe*
- *BLM is causing the city to go downhill*

JOB/CAREER OPPORTUNITIES

- *Maybe moving for professional reasons, it depends*
- *job opportunity*
- *Better opportunities*
- *because of my work*
- *More career/housing/lifestyle options*

83 Q30: Why do you want to leave the Richmond region?



5

IMPLICATION

As we look to the future, the good news is many are happy with their choice to move to RVA, would make it again, and are hopeful for the future. Yet, there are a portion of people considering leaving. This underscores the importance of not only attraction but also retention. How do we make sure RVA continues to meet their expectations and needs? How do we help people who grew up here experience a “new side” of RVA? Finally, though safety will be an important metric to track, perceptions could have been overly influenced by the events taking place during the survey fieldwork.

84



IV. Summary

85



RECAP: Key Findings and Implications

#	KEY FINDING	IMPLICATION
1	While location and job are important, many local young professionals chose to live in RVA to be near friends and family.	Celebrate RVA's success in increasing the percentage of young professionals only considering Richmond as a place to live! The region appears to have a unique draw for those who grew up here and have desire to be near their family. However, we can't rest on our laurels. There continues to be stiff competition with our close neighbors. Ensuring that RVA delivers on what young professionals are looking for will be key.
2	RVA is seen as a diverse, history-rich, and fun river city. Overall, the region receives positive scores, but some opportunities to improve satisfaction are appearing.	Satisfaction with RVA as a place seems to be improving as seen with it's increased NPS. Moreover, YPs tend to be satisfied with the region especially as a place to play, live, and work. However, they are slightly less satisfied with RVA as a place to learn and visit, which may be a product of these YPs not yet having a full sense of all there is to see and experience in the region. This may demonstrate a great opportunity for RVA NOW to help students fully appreciate the great place that is RVA.
3	RVA appears to be an accepting community — but maybe not one where all people feel they can belong.	We should celebrate that RVA is seen among YPs as a place that's very accepting of other backgrounds and lifestyles. However, they do not seem to feel RVA is a great place where people can engage, that there are opportunities for all, that basic necessities are always met, or that it's a place where all can personally grow and thrive. These are big challenges and not necessarily in RVA NOW's purview. The key will be showcasing how people can get involved and actually make a difference in helping RVA be a great place for ALL people.

86



RECAP: Key Findings and Implications

#	KEY FINDING	IMPLICATION
4	YPs in RVA are looking for a place that is safe, has quality and affordable housing, a great food scene, and feels like home. RVA, however, does not always deliver.	While RVA is exceeding expectations on some attributes, there are opportunities for improvement. This opportunities include addressing both the perception and reality of some very table-stakes rational attributes of a place — that's its safe, friendly, affordable and thriving. It will also be important to help young professionals feel that RVA is a place that matches their values and provides opportunities to achieve their goals. Touching on these messages throughout communications may begin to shift perceptions and make RVA a more appealing place to live and ultimately plant roots.
5	The majority say they are optimistic about RVA's future and would choose RVA all over again.	As we look to the future, the good news is many are happy with their choice to move to RVA, would make it again, and are hopeful for the future. Yet, there are a portion of people considering leaving. This underscores the importance of not only attraction but also retention. How do we make sure RVA continues to meet their expectations and needs? How do we help people who grew up here experience a "new side" of RVA? Finally, though safety will be an important metric to track, perceptions could have been overly influenced by the events taking place during the survey fieldwork.

87



V. Appendix: Care Ownership Media Consumption Racial Equity & Social Justice

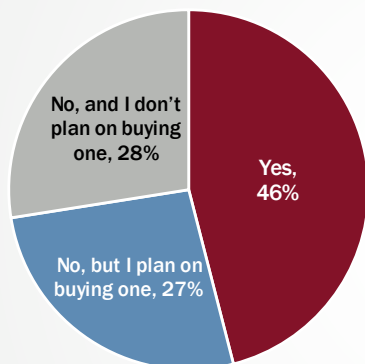
88



EXPERIENCING RVA

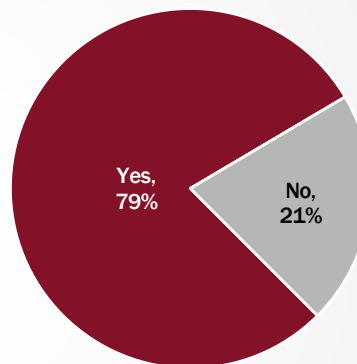
Most young professionals in RVA own a car, and many own a home or are planning to buy one

HOME OWNERSHIP



89 Q36: Do you own a home in the Richmond region?

CAR OWNERSHIP



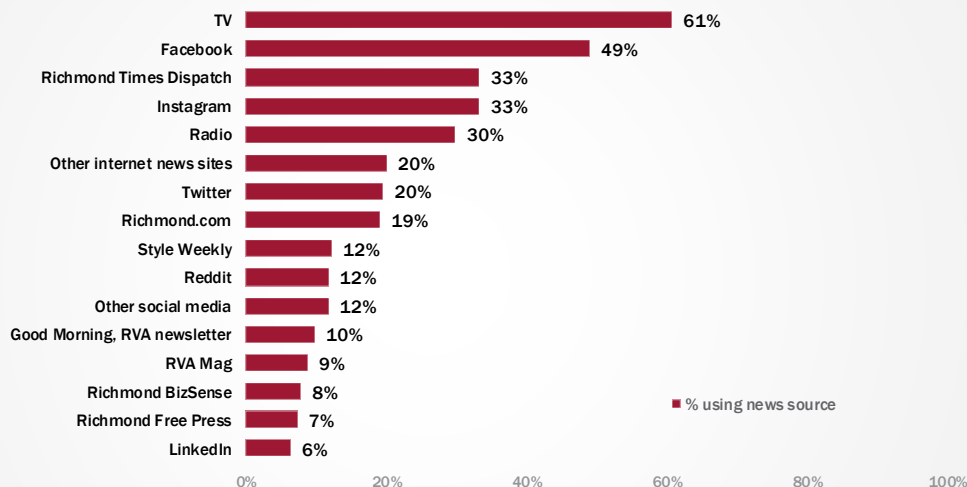
Q37: Do you own or lease a car?

n = 204



EXPERIENCING RVA

Young professionals use a wide range of both traditional and social media channels for local news



90 Q38: Where do you turn for local Richmond region news, happenings, and things to do? Select all that apply. - Selected Choice

n = 204



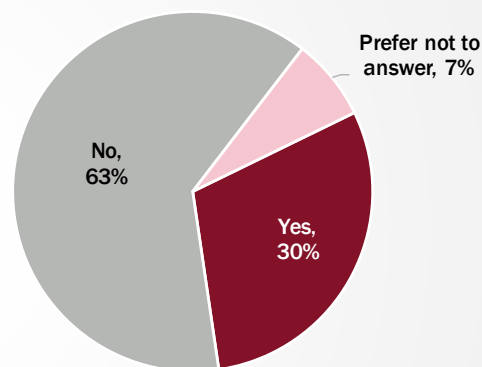
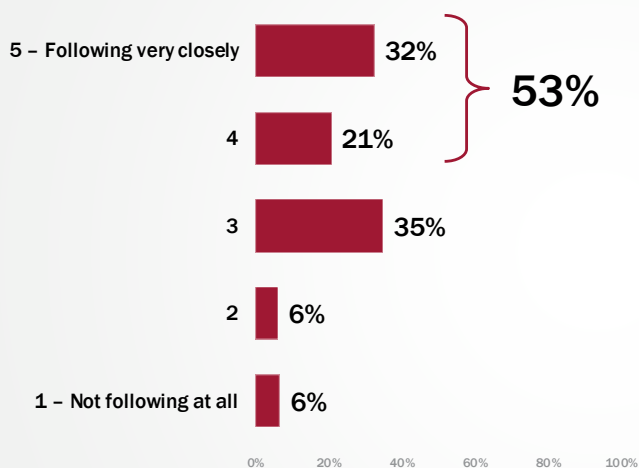
RACIAL EQUITY & SOCIAL JUSTICE

91



RACIAL EQUITY & SOCIAL JUSTICE

Half have been closely following the racial equity and social justice movement taking place during the summer of 2020, and less than a third have attended an event or gathering



n = 204

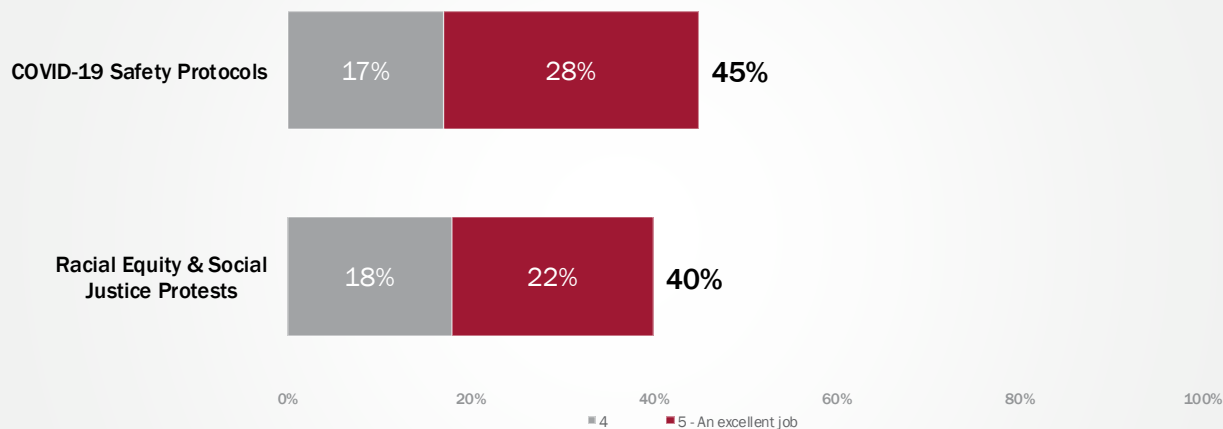
92 Q39: How closely have you been following the current racial equity and social justice movement taking place in the Richmond region?

Q40: Have you attended any events or gatherings in the Richmond region related to the racial equity and social justice movement?



RACIAL EQUITY & SOCIAL JUSTICE

Only around two in five believe RVA did an excellent job handling COVID-19 and the racial equity and social justice protests



93

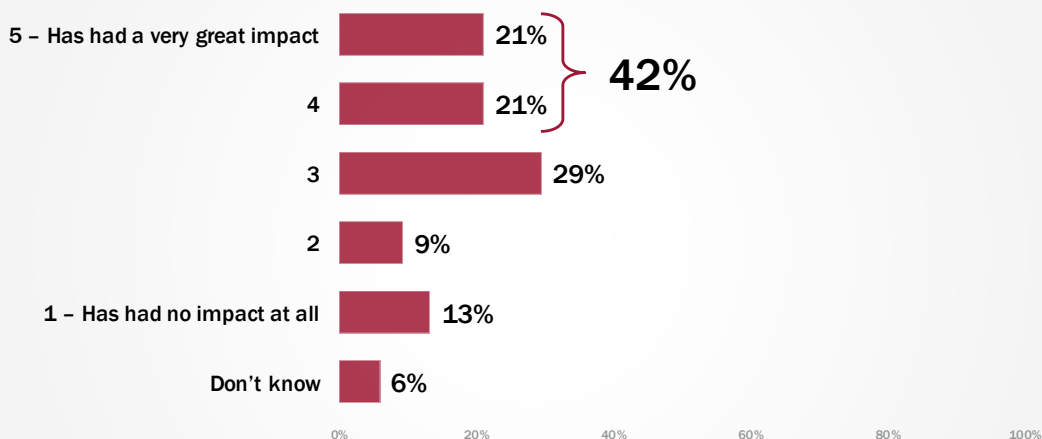
Q:41 Thinking about the current situations we are experiencing throughout the region, the nation, and the world: How would you rate Richmond's response to each of the following? Knowing these are very big and complicated issues, please think in a broad scope.

n = 204



RACIAL EQUITY & SOCIAL JUSTICE

Two in five say the racial equity and social justice protests have had a great impact on how feel about living or staying in the RVA region



n = 204

94

Q43: To what degree has the racial equity and social justice protests and the region's reaction to it impacted your feelings on living or staying in the Richmond region?

