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Martin, Bailey C.

Monterey, CA; Naval Postgraduate School

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**NAVAL  
POSTGRADUATE  
SCHOOL**

**MONTEREY, CALIFORNIA**

**THESIS**

**DIVERSITY IN THE FIRE SERVICE:  
BEYOND BASIC DEMOGRAPHICS**

by

Bailey C. Martin

June 2019

Co-Advisors:

Anders Strindberg (contractor)  
Carolyn C. Halladay

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**DIVERSITY IN THE FIRE SERVICE: BEYOND BASIC DEMOGRAPHICS**

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Submitted in partial fulfillment of the  
requirements for the degree of

**MASTER OF ARTS IN SECURITY STUDIES  
(HOMELAND SECURITY AND DEFENSE)**

from the

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## **ABSTRACT**

Research in diversity has failed to study the unique challenges that the fire service's schedule, stress, and culture of tradition pose for diverse workforces. There has also been a lack of depth when researchers have studied demographics in the fire service. This case study uses the history and demographics of the Richmond (VA) Department of Fire and Emergency Services (RFES) to answer the following research question: What can homeland security agencies learn about diversity from the successes and challenges of the City of Richmond's Department of Fire and Emergency Services? This research consists of a qualitative and quantitative study of this fire department. The qualitative study evaluates the factors that had the greatest impact on the work environment. The quantitative study compares RFES to other career departments in Virginia and nationally. The results reveal a large gap, beyond basic demographics, in promotion opportunities for minorities and women in Virginia and national datasets. These same demographic groups in RFES, however, were promoted at rates higher than or equal to their counterparts.



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# TABLE OF CONTENTS

<b>I.</b>	<b>OVERVIEW</b> .....	<b>1</b>
<b>A.</b>	<b>RESEARCH QUESTION</b> .....	<b>2</b>
<b>B.</b>	<b>LITERATURE REVIEW</b> .....	<b>2</b>
<b>1.</b>	<b>Social Identity Theory</b> .....	<b>3</b>
<b>2.</b>	<b>Information/Decision Making</b> .....	<b>7</b>
<b>3.</b>	<b>Categorization Elaboration Model</b> .....	<b>9</b>
<b>4.</b>	<b>Practical Implications for Organizations</b> .....	<b>11</b>
<b>5.</b>	<b>Conclusion</b> .....	<b>13</b>
<b>C.</b>	<b>RESEARCH DESIGN</b> .....	<b>14</b>
<b>D.</b>	<b>CHAPTER OUTLINE</b> .....	<b>14</b>
<b>II.</b>	<b>RESEARCH DESIGN</b> .....	<b>15</b>
<b>A.</b>	<b>QUALITATIVE RESEARCH DESIGN</b> .....	<b>15</b>
<b>B.</b>	<b>QUANTITATIVE RESEARCH DESIGN</b> .....	<b>16</b>
<b>C.</b>	<b>CONCLUSION</b> .....	<b>18</b>
<b>III.</b>	<b>QUALITATIVE STUDY OF RICHMOND</b> .....	<b>21</b>
<b>A.</b>	<b>HISTORICAL PROFILE OF RICHMOND, VIRGINIA</b> .....	<b>21</b>
<b>B.</b>	<b>RICHMOND FIRE AND EMERGENCY SERVICES</b> .....	<b>23</b>
<b>1.</b>	<b>Push for Equality</b> .....	<b>25</b>
<b>2.</b>	<b>Building Bridges Study</b> .....	<b>27</b>
<b>3.</b>	<b>Analysis of the Qualitative Data</b> .....	<b>29</b>
<b>IV.</b>	<b>DEMOGRAPHICS</b> .....	<b>35</b>
<b>A.</b>	<b>RFES DEMOGRAPHICS</b> .....	<b>35</b>
<b>B.</b>	<b>RESULTS OF DATA CALL FOR CAREER DEPARTMENTS IN VIRGINIA</b> .....	<b>36</b>
<b>1.</b>	<b>Detailed Results Related to Women</b> .....	<b>37</b>
<b>2.</b>	<b>Advancement Opportunities in Virginia Departments</b> .....	<b>38</b>
<b>C.</b>	<b>RESULTS FROM NATIONAL DATA CALL</b> .....	<b>38</b>
<b>1.</b>	<b>Results Related to Women</b> .....	<b>40</b>
<b>2.</b>	<b>Advancement Opportunities in National Departments</b> .....	<b>41</b>
<b>D.</b>	<b>CONCLUSION</b> .....	<b>41</b>
<b>V.</b>	<b>QUANTITATIVE ANALYSIS</b> .....	<b>43</b>
<b>A.</b>	<b>ANALYSIS OF DATA RELATED TO MINORITIES IN THE VIRGINIA DATA CALL</b> .....	<b>43</b>

B.	ANALYSIS OF DATA RELATED TO WOMEN IN THE VIRGINIA DATA CALL.....	45
C.	ANALYSIS OF DATA RELATED TO MINORITIES IN THE NATIONAL DATA CALL.....	47
D.	ANALYSIS OF DATA RELATED TO WOMEN IN THE NATIONAL DATA CALL.....	49
E.	COMPARISONS OF RFES AND BOTH DATASETS .....	50
VI.	CONCLUSION .....	53
A.	FINDINGS .....	53
B.	RECOMMENDATIONS.....	55
C.	FUTURE RESEARCH.....	56
	LIST OF REFERENCES.....	61
	INITIAL DISTRIBUTION LIST .....	67

## LIST OF FIGURES

Figure 1.	Comparison of Minority Percentages .....	51
Figure 2.	Comparison of Female Percentages.....	52

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## LIST OF TABLES

Table 1.	Position Distribution and Promotion Rates for Caucasians and Minorities in the Virginia Dataset.....	45
Table 2.	Position Distribution and Promotion Rates for Caucasians and Minorities in RFES .....	45
Table 3.	Position and Promotion Rates for Male and Female Firefighters in the Virginia Dataset .....	46
Table 4.	Position and Promotion Rates for Male and Female Firefighters in RFES .....	46
Table 5.	Position Distribution and Promotion Rates for Caucasians and Minorities in the National Dataset .....	49
Table 6.	National Dataset Position Distribution of Men and Women .....	50

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## **LIST OF ACRONYMS AND ABBREVIATIONS**

CEM	categorization elaboration model
DHS	Department of Homeland Security
EEO	equal employment opportunity
RFES	Richmond Fire and Emergency Services
SCT	self-categorization theory
SIT	social identity theory



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## EXECUTIVE SUMMARY

The City of Richmond, Virginia, Department of Fire and Emergency Services has a history of integration that dates back to the 1950s. This department's history of hiring minorities and women has been progressive for many years and ranks among the most diverse in its field in the state. The evaluation of this organization's practices and its employee experiences can teach others in the field of homeland security about what work conditions exist in a diverse environment. Moreover, Richmond's Department of Fire and Emergency Services can provide context and insight into diverse environments that have yet to be fully explored by team diversity research.

At the local level, police and fire organizations continue to struggle to recruit diverse workforces. Nationally, law enforcement agencies are composed of 21 percent minorities and 13.3 percent women.<sup>1</sup> In the fire service, the numbers are even lower with minorities and women comprising only 14.5 percent and 4.9 percent, respectively.<sup>2</sup>

Homeland security organizations are looking for ways to create more diverse workforces and inclusive work environments. Court mandates, political pressure, public outcry, and the industry's recognition of diversity's benefits have all contributed to this drive to hire more diverse homeland security professionals, which became a point of emphasis in the Department of Homeland Security (DHS) in 2009.<sup>3</sup>

The diversity research community has been studying the elements of the workplace that either improve or detract from productivity and employee experience. The scholarship of these moderators has not extended the study into homeland security agencies.<sup>4</sup> There

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<sup>1</sup> "Police Officers," Data USA, accessed March 26, 2019, <https://datausa.io/profile/soc/333050/#demographics>.

<sup>2</sup> "Firefighters," Data USA, accessed October 17, 2018, <https://datausa.io/profile/soc/332011/>.

<sup>3</sup> *Diversity at the Department of Homeland Security: Continuing Challenges and New Opportunities: Hearing before the Committee on Homeland Security, House of Representatives, 111th Cong., 1st sess., October 14, 2009*, <https://www.gpo.gov/fdsys/pkg/CHRG-111hhr55020/pdf/CHRG-111hhr55020.pdf>.

<sup>4</sup> Yves R. F. Guillaume et al., "Harnessing Demographic Differences in Organizations: What Moderates the Effects of Workplace Diversity?," *Journal of Organizational Behavior* 38, no. 2 (February 2017): 276–303, <https://doi.org/10.1002/job.2040>.

has been little research on how unique work schedules, the type of work, and traditions of these professions create interactions unique to this field when they become more diverse. If homeland security leaders focus solely on the numbers and fail to address the effects of diversity in their agencies, it could damage their organizations in the form of human resource issues, more conflict, low morale, and other negative effects. This thesis answered the following question: What can homeland security agencies learn about diversity from the successes and challenges of the City of Richmond's Department of Fire and Emergency Services?

This study evaluates the history of Richmond Fire and Emergency Services using a mixed method approach.<sup>5</sup> The first part of the study was a qualitative analysis of the organization using the categorization elaboration model to determine the factors that have had the most influence on the work environment. The purpose of the qualitative research was to identify the challenges and successes of the organization, so other entities might better understand how to manage diverse workforces.

The second part of the study was quantitative. This portion of the research examined the demographics of Richmond Fire and Emergency Services (RFES) as well as its peers in Virginia and nationally. The purpose of this research was to better understand how RFES differs from its counterparts and to identify any trends that may exist in the fire service beyond the basic demographics typically reported.

The history of RFES offers a unique perspective into the roots of diversity in the fire service. The organization's integration of women and minorities mirrors national trends, creating a unique work environment. An analysis of this history through the lens of CEM shows that elements of social categorization are still present in the organization.<sup>6</sup> There is evidence of intergroup conflict and bias going back many decades. The data also show that the organization has been able to harness many of the benefits of diversity to

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<sup>5</sup> John W. Creswell, *Research Design: Qualitative, Quantitative, and Mixed Methods Approaches*, 3rd ed. (Thousand Oaks, CA: SAGE Publications, 2008), 228.

<sup>6</sup> Daan van Knippenberg, Carsten K. W. de Dreu, and Astrid C. Homan, "Work Group Diversity and Group Performance: An Integrative Model and Research Agenda," *Journal of Applied Psychology* 89, no. 6 (December 2004): 1008–22, <https://doi.org/10.1037/0021-9010.89.6.1008>.

provide better service to its communities. The moderators that have been most impactful in this environment include human resource practices, culture, and leadership. These moderators have contributed to both the negative and positive aspects of diversity in RFES but have been the key factors in dictating how the organization views diversity and uses it to meet its mission.

The differences between RFES and its peers are substantial. In terms of minorities, RFES is well above the averages in at every level. Diversity has been a point of emphasis in Richmond for almost 70 years. By looking closer at its numbers—not merely the number of sworn minorities—it is evident that the organization values diversity, and marginalized groups have had a say at every level of the organization. The data for women are also interesting because, when looking at only the raw numbers, RFES differs little from its peers and is actually lower than the average in the Virginia dataset. However, at the next two levels of leadership, RFES separates itself from the groups in terms of opportunities for women to advance.

The analysis of the quantitative data showed that despite its challenges, the RFES's commitment to diversity has established the organization as a leader in measuring basic demographics. Even more revealing is that RFES has achieved diversity in ways that run counter to the trends displayed by its peers in the region and nationally. It is difficult to determine an exact cause for the drastic differences between RFES and the datasets, but it is clear that the organization has created an environment in which marginalized groups succeed and which many other organizations have not duplicated.

Organizations that are dedicated to creating a more diverse and inclusive work environment can look at certain cues from the research to assess their own organizations. The evaluations of their own organizations can include qualitative evaluations to identify the element of social categorization and group bias. Quantitative evaluations can help determine negative trends in the hiring or promotion processes. These evaluations of the organization can identify obstacles to diversity and inclusion and help leaders fix processes and systems to create better work environments.

There is still much to learn about how to recruit diverse workforces and create work environments that harness the benefits of diversity. Improved demographic reporting, more qualitative studies on the effects of diversity, and focused research on women in the fire service could all have an impact on improving diversity in the fire service. This information could go a long way toward improving the recruitment and promotion opportunities for marginalized groups in a profession that remains largely homogenous.

This research shows that inequities still exist in the fire service. There is still much to do in order to break down existing barriers if the fire service wants to reap the benefits that diversity provides. This project identifies the need for leaders to evaluate their own organizations and decide whether they are striving for diversity and inclusion or merely focusing on attaining the minimum demographics to appear diverse.

## ACKNOWLEDGMENTS

I would first like to thank my wife, Christy. She has gracefully managed the household in my absence. I am grateful for her understanding and constant support during my time away and in the hours of work on this project that have forced her to pick up some of my slack. She is my best friend and the type of person I strive to be. I could not love you more.

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I would not be where I am today without the help of my grandmother, Lena Martin. You were always there for me when I felt like I had no one else. You taught me the value of education and showed me how to love. I wish that you could be here to see me complete this program. I miss you daily and know how much this would have meant to you. Your memory drives me to become more knowledgeable and seek out opportunities to provide a better life for those I love.

I would like to thank the faculty and staff at the Center for Homeland Defense and Security. I have had an incredible learning experience. I have experienced some challenges in my personal life during this time, but everyone has been so supportive. They have also

challenged me to think more critically and ask more questions. Without their insight, this project would not have been possible. I would especially like to thank my advisors, Carolyn Halladay and Anders Strindberg, for their support and input on what was a bumpy process at times. You are both incredible, and I am thankful for your contributions and help in bringing this project to fruition. I would like to thank my editor, Noel Yucuis, for helping bring some professionalism and order to my project under some tight time constraints. I would also like to thank Lauren Wollman and Chris Bellavita for helping get this project off the ground before it was a project. You both challenged me to become a better writer and thinker. You also helped me develop my initial thoughts about the project and encouraged me to study something I was passionate about.

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I would also like to thank the members of the Richmond Department of Fire and Emergency Services. I am so proud to be part of this organization. There are so many people to thank that I can't begin to name them. So many of you have supported me and encouraged me through this endeavor. You have all shaped how I look at the fire service and helped me become a better firefighter and officer. I am constantly impressed by the energy, ingenuity, commitment to service, and acts of bravery and kindness that you display. I appreciate all the support I received from my colleagues at the Virginia Department of Fire Programs. You have motivated me and allowed me the time off necessary to complete this program. Your support has been great.

I would also like to thank the career departments that participated in the data call. Your willingness to share information about your organizations gave this project a depth that would not have been possible otherwise. Diversity is a hard subject to face at times. I appreciate these organizations and their willingness to participate in the hopes of a better fire service. They are all listed below in alphabetical order:

- Chesapeake Fire Department, VA
- Chesterfield County Fire and EMS, VA
- Des Moines Fire Department, IA
- Fauquier County Fire and Rescue, VA
- Fayetteville Fire/Emergency Management, NC
- Garland Fire Department, TX
- Gilbert Fire and Rescue Department, AZ
- Goochland Fire and Rescue, VA
- City of Laredo Fire Department, TX
- City of Madison Fire Department, WI
- Montgomery Fire-Rescue, AL
- Norfolk Fire-Rescue, VA
- Prince William County Department of Fire and Rescue, VA
- Roanoke Fire and EMS, VA
- San Bernadino County Fire, CA
- Shenandoah County Department of Fire and Rescue, VA
- Shreveport Fire Department, LA
- Stafford County Fire and Rescue, VA
- Tallahassee Fire Department, FL



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## I. OVERVIEW

The City of Richmond, Virginia, Department of Fire and Emergency Services has a history of integration that dates back to the 1950s. This department's history of hiring minorities and women has been progressive for many years and ranks among the most diverse in its field in the state. The evaluation of this organization's practices and its employee experiences can teach others in the field of homeland security about what work conditions exist in a diverse environment. Moreover, Richmond's Department of Fire and Emergency Services can provide context and insight into diverse environments that have yet to be fully explored by team diversity research.

At the local level, police and fire organizations continue to struggle to recruit diverse workforces. Nationally, law enforcement agencies are composed of 21 percent minorities and 13.3 percent women.<sup>1</sup> In the fire service, the numbers are even lower with minorities and women comprising only 14.5 percent and 4.9 percent, respectively.<sup>2</sup>

Homeland security organizations are looking for ways to create more diverse workforces and inclusive work environments. Court mandates, political pressure, public outcry, and the industry's recognition of diversity's benefits have all contributed to this drive to hire more diverse homeland security professionals, which became a point of emphasis in the Department of Homeland Security (DHS) in 2009.<sup>3</sup>

Part of the challenge for agencies at all levels is trying to mirror a changing population in the United States. In 1900, one person in eight was of a race other than white; by 2000, it was one in four. In 2016, about 40 percent of the U.S. population was of a race

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<sup>1</sup> "Police Officers," Data USA, accessed March 26, 2019, <https://datausa.io/profile/soc/333050/#demographics>.

<sup>2</sup> "Firefighters," Data USA, accessed October 17, 2018, <https://datausa.io/profile/soc/332011/>.

<sup>3</sup> *Diversity at the Department of Homeland Security: Continuing Challenges and New Opportunities: Hearing before the Committee on Homeland Security*, House of Representatives, 111th Cong., 1st sess., October 14, 2009, <https://www.gpo.gov/fdsys/pkg/CHRG-111hhr55020/pdf/CHRG-111hhr55020.pdf>.

or ethnicity other than white.<sup>4</sup> It is projected that by 2045, minorities will outnumber whites in the United States.<sup>5</sup> DHS has made progress in its recruitment of minorities that closely mirror the U.S. population—minorities comprise 45.3 percent of its workforce.<sup>6</sup> The percentage of female employees, at 32.7 percent, is still below the national female population of 51.6 percent.<sup>7</sup>

The diversity research community has been studying the elements of the workplace that either improve or detract from productivity and employee experience. The scholarship of these moderators has not extended the study into homeland security agencies.<sup>8</sup> There has been little research on how unique work schedules, the type of work, and traditions of these professions create interactions unique to this field when they become more diverse. If homeland security leaders focus solely on the numbers and fail to address the effects of diversity in their agencies, they may damage their organizations, leading to human resource issues, more conflict, low morale, and other negative effects.

## **A. RESEARCH QUESTION**

What can homeland security agencies learn about diversity from the successes and challenges of the City of Richmond’s Department of Fire and Emergency Services?

## **B. LITERATURE REVIEW**

Researchers in sociology, psychology, and organizational behavior fields study team diversity from different perspectives. Since team diversity research originated in the 1950s, two tracks of research have prevailed: the social categorization perspective, largely within the framework of social identity theory (SIT), and the information decision-making

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<sup>4</sup> William H. Frey, “The US Will Become ‘Minority White’ in 2045, Census Projects,” Brookings, March 14, 2018, <https://www.brookings.edu/blog/the-avenue/2018/03/14/the-us-will-become-minority-white-in-2045-census-projects/>.

<sup>5</sup> Frey.

<sup>6</sup> “EEO Diversity Management,” Department of Homeland Security, December 9, 2011, <https://www.dhs.gov/dhs-diversity-planning>.

<sup>7</sup> Department of Homeland Security.

<sup>8</sup> Yves R. F. Guillaume et al., “Harnessing Demographic Differences in Organizations: What Moderates the Effects of Workplace Diversity?,” *Journal of Organizational Behavior* 38, no. 2 (February 2017): 276–303, <https://doi.org/10.1002/job.2040>.

perspective.<sup>9</sup> Scholars have used SIT to explore diversity and its effects on team dynamics.<sup>10</sup> Scholars from this group use SIT and its subsets to study how diversity can lead to conflicts that result in reduced productivity.<sup>11</sup> Another group of researchers that emerged later in the 1980s and 1990s focused on information/decision-making theory as the basis for its research. Researchers who study this aspect of diversity assert that diversity delivers the benefits of different knowledge bases and richer group creativity and information sharing.<sup>12</sup>

These two approaches to diversity research form what has been called a “double-edged sword” of diversity.<sup>13</sup> This term recognizes the challenges associated with increased group diversity as well as the benefits that can be reaped from diverse groups. Van Knippenberg, Dreu, and Homan recognize that research in the field has largely existed in silos and has rarely examined connections between the two approaches to diversity research.<sup>14</sup> The following sections examine each perspective, the ways in which these two approaches have heavily influenced research on diversity, and the accepted ideas about diversity’s positive and negative effects on work environments.

## 1. Social Identity Theory

Social identity theory is a theory introduced by Henry Tajfel.<sup>15</sup> It has been used as a basis for some team diversity research for over 40 years—since Tajfel’s article “Social

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<sup>9</sup> Daan van Knippenberg, Carsten K. W. de Dreu, and Astrid C. Homan, “Work Group Diversity and Group Performance: An Integrative Model and Research Agenda,” *Journal of Applied Psychology* 89, no. 6 (December 2004): 1009, <https://doi.org/10.1037/0021-9010.89.6.1008>.

<sup>10</sup> Henri Tajfel, ed., *Social Identity and Intergroup Relations*, reissue ed. (Cambridge: Cambridge University Press, 2010).

<sup>11</sup> Karen A. Jehn, Gregory B. Northcraft, and Margaret A. Neale, “Why Differences Make a Difference: A Field Study of Diversity, Conflict, and Performance in Workgroups,” *Administrative Science Quarterly* 44, no. 4 (December 1999): 759–60, <https://doi.org/10.2307/2667054>.

<sup>12</sup> Deborah H. Gruenfeld et al., “Group Composition and Decision Making: How Member Familiarity and Information Distribution Affect Process and Performance,” *Organizational Behavior and Human Decision Processes* 67, no. 1 (July 1996): 1–15, <https://doi.org/10.1006/obhd.1996.0061>.

<sup>13</sup> Frances J. Milliken and Luis L. Martins, “Searching for Common Threads: Understanding the Multiple Effects of Diversity in Organizational Groups,” *Academy of Management Review* 21, no. 2 (1996): 403, <https://doi.org/10.2307/258667>.

<sup>14</sup> Van Knippenberg, de Dreu, and Homan, “Work Group Diversity and Group Performance,” 1010.

<sup>15</sup> Tajfel, *Social Identity and Intergroup Relations*.

Categorization and Intergroup Behavior” was first published.<sup>16</sup> The theory was built partly on the findings of Gordon Allport, an American psychologist, who in 1954 claimed, “The human mind must think with the aid of categories (the term is equivalent here to generalizations). Once formed, categories are the basis for prejudice.”<sup>17</sup> Tajfel’s SIT expands on Allport’s assertion that people tend to categorize themselves and construct an identity based on how they view themselves within the context of groups.<sup>18</sup> Tajfel describes the central aspect of social identity as “that part of an individual’s self-concept which derives from his knowledge of membership in a social group (or groups) together with the value and emotional significance attached to that membership.”<sup>19</sup> A basic premise of the theory is that people stereotype themselves and others by embracing attributes associated with being a member of a certain group.<sup>20</sup> Embracing these attributes, a person improves self-esteem by deeming the attributes of their group as positive and attaching negative associations with members of other groups.<sup>21</sup> These perceptions define one of the key components of the theory—ingroups and outgroups, the ingroup being the group a person identifies with and the outgroup being those who are not members of the ingroup. This may also be more easily explained as “us” and “them.”<sup>22</sup>

McGarty identifies two critical parts of this theory. The first is that the processes of identification and comparison affect group dynamics. He summarizes Tajfel’s findings, saying that people attach part of their identity to a group and, as a result, feel compelled to compare their group to others as a form of building self-esteem.<sup>23</sup> Tajfel’s book, *Social*

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<sup>16</sup> Henri Tajfel et al., “Social Categorization and Intergroup Behaviour,” *European Journal of Social Psychology* 1, no. 2 (1971), <https://doi.org/10.1002/ejsp.2420010202>.

<sup>17</sup> Gordon Allport, *The Nature of Prejudice* (Reading, MA: Addison-Wesley, 1954), 20.

<sup>18</sup> Tajfel, *Social Identity and Intergroup Relations*.

<sup>19</sup> Tajfel, 2.

<sup>20</sup> Carol T. Kulik and Hugh T. J. Bainbridge, “Psychological Perspectives on Workplace Diversity,” in *Handbook of Workplace Diversity* (London: SAGE Publications, 2006), 28, <https://doi.org/10.4135/9781848608092>.

<sup>21</sup> Kulik and Bainbridge, 28.

<sup>22</sup> Tajfel et al., “Social Categorization and Intergroup Behaviour,” 151.

<sup>23</sup> Craig McGarty, *Categorization in Social Psychology* (London: SAGE Publications, 1999), 107, ProQuest.

*Identity and Intergroup Relations*, contains a section from one of his colleagues, John C. Turner that further explains this process of identification.<sup>24</sup> Turner's self-categorization theory (SCT) is an application of SIT that studies the impact of identification on how people think and interact within a social setting and its effect on group dynamics.<sup>25</sup> Turner asserts that people construct a perceived identity of themselves as individuals and group members. Turner asserts that a social group is composed of individuals who have a common category that is part of their self-concept.<sup>26</sup>

The second critical aspect of SIT that McCarty identifies is group comparison.<sup>27</sup> When ingroups categorize themselves in relation to outgroups, conflicts may arise. Riordan and Shore's findings—that a group's perception of its workgroup and advancement opportunities is more positive in homogenous groups—seem to conform with those of researchers who explore SIT and SCT.<sup>28</sup> This means, as Pelled explains, “within a workgroup then, demographic diversity variables that are more visible are more apt to trigger categorization than less visible diversity variables, and they should be stronger predictors of affective conflict.”<sup>29</sup>

Turner explores the two most common sources of conflict that arise from the categorization of groups.<sup>30</sup> One type of conflict arises from a group's need to improve self-perception through differentiation from an opposing group.<sup>31</sup> The goal of this type of conflict is to improve standing or justify the group's ideals, for example, the competition

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<sup>24</sup> Tajfel, *Social Identity and Intergroup Relations*.

<sup>25</sup> John C. Turner and Katherine J. Reynolds, “Self-Categorization Theory,” in *Handbook of Theories of Social Psychology*, vol. 2 (London: SAGE Publications, 2012), 399–417, <https://doi.org/10.4135/9781446249222>.

<sup>26</sup> Tajfel, *Social Identity and Intergroup Relations*, 36.

<sup>27</sup> McGarty, *Categorization in Social Psychology*, 107.

<sup>28</sup> Christine M. Riordan and Lynn McFarlane Shore, “Demographic Diversity and Employee Attitudes: An Empirical Examination of Relational Demography within Work Units,” *Journal of Applied Psychology*, 82, no. 3 (1997): 342.

<sup>29</sup> Lisa Hope Pelled, “Demographic Diversity, Conflict, and Work Group Outcomes: An Intervening Process Theory,” *Organization Science* 7, no. 6 (1996): 622, <https://doi.org/10.1287/orsc.7.6.615>.

<sup>30</sup> John C. Turner, “Social Comparison and Social Identity: Some Prospects for Intergroup Behaviour,” *European Journal of Social Psychology* 5, no. 1 (1975): 10–13, <https://doi.org/10.1002/ejsp.2420050102>.

<sup>31</sup> Turner, 10.

in space exploration between the United States and the Soviet Union to improve the perceptions of each country's political ideals and power rather than to promote specific material goals.<sup>32</sup>

Turner also identifies the other source of conflict: when groups compete for a common objective or limited resource. In other words, they seek the improvement of their group standing relative to other groups by achieving a particular objective or gaining a limited resource. The United States and the Soviet Union demonstrated such a conflict in the arms race of the 1950s and 1960s in which both countries sought military superiority.<sup>33</sup> In this case, both countries sought the same objective: to improve the perceptions of the group based on being the first to reach the goal or acquire an advantage over the other.

Advanced diversity scholarship in the use of these theories notes that social and self-categorization associated with outgroups in diverse environments can create “substantial negative social, economic, political and psychological consequences for the members of the oppressed or stigmatized groups.”<sup>34</sup> This means that in environments where people are categorized by groups, individuals in the outgroups are viewed negatively by their peers. Crocker and Major also explore the impact on members of outgroups and their self-esteem as they reconcile prejudice and discrimination as part of the outgroup.<sup>35</sup> They found that some of the negative consequences for members of an outgroup are limitations in opportunities compared to members of the dominant ingroup.

Donnalyn Pompper thoroughly discusses SIT in her book *Practical and Theoretical Implications of Successfully Doing Difference in Organizations*.<sup>36</sup> She argues that SIT can be applied to organizations and members of marginal groups to better understand how they

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<sup>32</sup> Dominic Abrams and Michael A. Hogg, *Social Identifications: A Social Psychology of Intergroup Relations and Group Processes* (New York: Taylor & Francis, 2006), 43, ProQuest.

<sup>33</sup> Abrams and Hogg, 42.

<sup>34</sup> Jennifer Crocker and Brenda Major, “Social Stigma and Self-Esteem: The Self-Protective Properties of Stigma,” *Psychological Review* 96, no. 4 (October 1989): 609, <http://dx.doi.org/10.1037/0033-295X.96.4.608>.

<sup>35</sup> Crocker and Major, 624.

<sup>36</sup> Donnalyn Pompper, ed., *Practical and Theoretical Implications of Successfully Doing Difference in Organizations*, vol. 1 of *International Perspectives on Equality, Diversity and Inclusion* (Bingley, UK: Emerald Group Publishing, 2014), [https://doi.org/10.1108/S2051-2333\(2014\)1](https://doi.org/10.1108/S2051-2333(2014)1).

carry themselves and react to certain situations based on the culture of the ingroup of a particular organization. Pompper asserts that minorities and women constantly manage aspects of their identity to reflect positively within the ingroup.<sup>37</sup> Pompper claims that employees may feel they have to act differently at work than they would at home or around friends. Employees may talk less, hide opinions, speak differently, or not disclose parts of their personal lives for fear of negative treatment from a perceived ingroup.<sup>38</sup>

## 2. Information/Decision Making

In a different approach to diversity research, another group of researchers explores how diversity is organizationally beneficial. This portion of diversity scholarship has its basis in Herbert Simon's decision-making research.<sup>39</sup> Gruenfeld et al. and other researchers have explored how the composition of a group can affect information sharing and performance.<sup>40</sup> They assert that when homogeneous groups possess similar information, they lack a diversity of perspective needed to process the information thoroughly.<sup>41</sup>

The general findings of researchers of this approach suggest that teams composed of members from diverse backgrounds have access to more information outside the affected workgroup to make better decisions.<sup>42</sup> For example, a marketing team composed entirely of men has neither information about what types or aspects of a given product appeal to women nor understands what elements of an ad might motivate women to buy the product. Having female members on the marketing team would give it access to information that would be difficult for a homogenous male team to obtain. This is the essence of information decision-making theory. Williams and O'Reilly summarize this point: "Diversity is valuable when it adds new information. Clearly this positive impact of

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<sup>37</sup> Pompper, 8.

<sup>38</sup> Pompper, 9–11.

<sup>39</sup> Herbert A. Simon, *Administrative Behavior*, 4th ed. (New York: Simon and Schuster, 2013).

<sup>40</sup> Gruenfeld et al., "Group Composition and Decision Making."

<sup>41</sup> Gruenfeld et al., 4.

<sup>42</sup> Katherine Y. Williams and Charles A. O'Reilly III, "Demography and Diversity in Organizations: A Review of 40 Years of Research," *Research in Organizational Behavior* 20 (1998): 86.



diversity can be expected when the task can benefit from multiple perspectives and diverse knowledge, such as innovations, complex problems, or product design.”<sup>43</sup>

A subsection of this type of research is information elaboration. Van Knippenberg, Dreu, and Homan describe information/decision-making scholarship as focusing on an exchange of perspectives, feedback, and the group’s processing of individual feedback, which lead to discussions and the integration of ideas into a group solution. The hypothesis of this theory is that diversity of viewpoints adds to elaboration. Van Knippenberg, Dreu, and Homan assert that elaboration in decision-making processes engenders the benefits of diverse group performance. A study on team reflexivity by Schippers, Hartog, and Koopman seems to confirm this perspective.<sup>44</sup>

Other researchers focus on the benefits of diversity and its ability to provide creative options and, in turn, increase productivity. Zheng and Wei expand this approach by investigating the equality of majority and minority members of a group as a channel for information, finding that “the degree to which both majority and minority members serve as conduits of information is a key indication of equality between majority and minority members, which is predictive of performance outcomes.”<sup>45</sup> Zheng and Wei assert that when all members are involved in the decision-making processes of the group and are able to contribute, the group’s productivity improves. Groups that limit the participation of certain group members may not reach their full productivity potential.<sup>46</sup>

Research by Pieterse et al. further supports the general findings of this theory: “Limiting diversity is not only unfair and unwise, because organizations miss out on valuable employees, but may also cause organizations to pass up the competitive advantage

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<sup>43</sup> Williams and O’Reilly, 87.

<sup>44</sup> Michaéla C. Schippers, Deanne N. Den Hartog, and Paul L. Koopman, “Reflexivity in Teams: A Measure and Correlates,” *Applied Psychology* 56, no. 2 (2007): 189–211, <https://doi.org/10.1111/j.1464-0597.2006.00250.x>.

<sup>45</sup> Wei Zheng and Jun Wei, “Linking Ethnic Composition and Performance: Information Integration between Majority and Minority Members,” *Small Group Research* 49, no. 3 (June 2018): 378, <https://doi.org/10.1177/1046496417749727>.

<sup>46</sup> Zheng and Wei, 378.

cultural diversity may hold.”<sup>47</sup> Bantel and Jackson’s study of the banking industry seems to confirm other positive aspects of diversity. Their findings support the idea that heterogeneous groups are more innovative.<sup>48</sup> Fiol identifies that one of the implications of this line of research is that managers must promote the debate of opposing views in teams, but within the framework of the issues facing the group as a whole. Therefore, to achieve the best outcomes, a team must develop and work through opposing views on the same problem to identify the best solutions.<sup>49</sup>

### 3. Categorization Elaboration Model

In 2004, Van Knippenberg, Dreu, and Homan developed the categorization elaboration model (CEM) to account for the positive and negative effects of diversity and integrated perspectives associated with both social categorization and information/decision-making approaches.<sup>50</sup> Van Knippenberg, Dreu, and Homan identified that the two prevailing tracks of diversity research had studied the effects of diversity using one framework or another but had not considered that elements of the two theories could occur simultaneously.<sup>51</sup> Van Knippenberg developed the CEM model to examine how social categorization and the effects of ingroup/outgroup relationships and intergroup bias might affect information and elaboration within an organization.<sup>52</sup> This tool helps researchers evaluate diversity in organizations based on several moderators. Palmer tested the model in 2006, and his findings corroborate Van Knippenberg, Dreu, and Homan’s assertion that the effects of diversity are curvilinear between performance and

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<sup>47</sup> Anne Nederveen Pieterse, Daan van Knippenberg, and Dirk van Dierendonck, “Cultural Diversity and Team Performance: The Role of Team Member Goal Orientation,” *Academy of Management Journal* 56, no. 3 (June 2013): 798, <https://doi.org/10.5465/amj.2010.0992>.

<sup>48</sup> Karen A. Bantel and Susan E. Jackson, “Top Management and Innovations in Banking: Does the Composition of the Top Team Make a Difference?,” *Strategic Management Journal* 10, no. S1 (June 1989): 107, <https://doi.org/10.1002/smj.4250100709>.

<sup>49</sup> C. Marlene Fiol, “Consensus, Diversity, and Learning in Organizations,” *Organization Science* 5, no. 3 (1994): 418, <http://www.jstor.org/stable/2635138>.

<sup>50</sup> Van Knippenberg, Dreu, and Homan, “Work Group Diversity and Group Performance,” 1009.

<sup>51</sup> Van Knippenberg, Dreu, and Homan, 1010.

<sup>52</sup> Van Knippenberg, Dreu, and Homan.

diversity.<sup>53</sup> The model supports the idea that decision making and team elaboration do not take place in a vacuum. It recognizes that elements of social categorization can affect a team's cohesion and commitment, creating conflict that might affect the decision-making process.<sup>54</sup>

Ellis, Mai, and Christian used CEM to evaluate the effects of goal fault lines in groups. Fault lines are hypothetical divisions that further divide a group into smaller groups.<sup>55</sup> Using this model helped this group of researchers to examine the impact of goal setting from social categorization and information/elaboration perspectives.<sup>56</sup>

Guillaume et al. identify a need for research to include CEM as a means for evaluating the moderators of diversity. They assert that this would allow for a better understanding of diversity's effects on social integration and performance-based outcomes at different levels of organizations.<sup>57</sup> The moderators they identified include group strategy, unit design, human resource practices, leadership, climate and culture, and individual differences.<sup>58</sup> By evaluating several factors that influence an organization, researchers acknowledge that diversity is not a result of a single factor but a combination of actions, perceptions, and facets.<sup>59</sup> Guillaume et al. assert that researching these factors can lead to an increased understanding of diverse workgroups.<sup>60</sup>

CEM merges the two dominant approaches of diversity research: social categorization theory and information/decision making. For years, researchers have

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<sup>53</sup> Victor Palmer, "Simulation of the Categorization-Elaboration Model of Diversity and Work-Group Performance," *Journal of Artificial Societies and Social Simulation* 9, no. 3 (2006), <http://jasss.soc.surrey.ac.uk/9/3/3.html>.

<sup>54</sup> Van Knippenberg, Dreu, and Homan, "Work Group Diversity and Group Performance," 1010.

<sup>55</sup> Aleksander P. J. Ellis, Ke Michael Mai, and Jessica Siegel Christian, "Examining the Asymmetrical Effects of Goal Faultlines in Groups: A Categorization-Elaboration Approach," *Journal of Applied Psychology* 98, no. 6 (November 2013): 948–61. <https://doi.org/10.1037/a0033725>.

<sup>56</sup> Ellis, Mai, and Christian, 948.

<sup>57</sup> Guillaume et al., "Harnessing Demographic Differences in Organizations," 280.

<sup>58</sup> Guillaume et al., 290.

<sup>59</sup> Van Knippenberg, Dreu, and Homan, "Work Group Diversity and Group Performance," 1010.

<sup>60</sup> Guillaume et al., "Harnessing Demographic Differences in Organizations," 293.

pursued either perspective without exploring their connection.<sup>61</sup> In this thesis, using CEM allows for the identification of moderators that have had the greatest impact on RFES's work environment, history, culture, and climate since integration.

#### 4. Practical Implications for Organizations

Leadership is one of many moderators identified by Van Knippenberg, Dreu, and Homan that should be evaluated when looking at the effects of diversity.<sup>62</sup> Bernardo Ferdman and Barbara Deane address the role of leadership of diverse organizations: “[It] involves not only paying attention to how differences are managed in organizations, but also supporting the conditions that increase the likelihood that those differences will be noticed, valued and welcomed.”<sup>63</sup>

Mitchell Rice contends in his book that leaders often fail at supporting such conditions or, even worse, ignore them completely. He asserts that some leaders use their diversity policies as a means to hide inequality in the organization. Rice calls for a need to question not only policies but also the commitment of leaders to uphold the diversity values they publicly endorse.<sup>64</sup> Rice further asserts that although leaders know and publicly embrace the concepts that harness the benefits of diversity, they may not truly want to employ them. Mitchell et al. also offer a perspective on the qualities of good leaders.<sup>65</sup> They write, “Inclusive leaders have the potential to lessen the destructive perception that professional differences and contributions are not respected, thereby reducing the negative consequences of compositional diversity.”<sup>66</sup> Some of the qualities and abilities that are important for an effective leader in a diverse environment include interpersonal skills, a

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<sup>61</sup> Van Knippenberg, Dreu, and Homan, “Work Group Diversity and Group Performance.”

<sup>62</sup> Guillaume et al., “Harnessing Demographic Differences in Organizations,” 292–93.

<sup>63</sup> Bernardo M. Ferdman and Barbara R. Deane, eds., *Diversity at Work: The Practice of Inclusion* (San Francisco: Jossey-Bass, 2014), 180, <https://onlinelibrary.wiley.com/doi/book/10.1002/9781118764282?campaign=NP>.

<sup>64</sup> Mitchell Rice, *Diversity and Public Administration* (New York: Routledge, 2015), 40–41.

<sup>65</sup> Rebecca Mitchell et al., “Managing Inclusiveness and Diversity in Teams: How Leader Inclusiveness Affects Performance through Status and Team Identity,” *Human Resource Management* 54, no. 2 (March 2015): 230, <https://doi.org/10.1002/hrm.21658>.

<sup>66</sup> Mitchell et al., 232.

commitment to diversity, multicultural experience, critical-thinking and problem-solving skills, and a knowledge of diversity laws and practices.<sup>67</sup>

Pieterse, Van Knippenberg, and Van Dierendonck advise employers to limit the negative effects of diversity by “emphasizing the importance of team and personal development, de-emphasizing competition, and creating an environment where employees feel secure and mistakes are seen as learning opportunities and not punished.”<sup>68</sup> Research by Hoch also demonstrates the value of changing leadership styles and structures through the idea of shared leadership.<sup>69</sup> This form of leadership de-emphasizes the hierarchal approach to goals, instead, giving each stakeholder more access to decision making. This study asserts that such a leadership style can yield positive benefits for diverse organizations.<sup>70</sup>

Researchers also suggest that a commitment to training employees on diversity and expressing organizational values is beneficial to organizations. Berry-James suggests that to prevent the destructive consequences of conflict sometimes associated with diversity, “managers and employees must be taught that when differences are valued, discrimination and employee turnover decrease, and productivity and employee respect increase.”<sup>71</sup> Borrego and Johnson suggest that this education should start with addressing diversity as early as employee orientation. These authors highlight the importance of orientation: “[It] lays the foundation for diversity by explaining that diversity is valued and that leveraging diversity creates a highly performing organization. Employees are supported in their efforts to leverage diversity through education and training.”<sup>72</sup> This point suggests that sharing

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<sup>67</sup> Maria Lytell et al., *Diversity Leadership in the U.S. Department of Defense: Analysis of the Key Roles, Responsibilities, and Attributes of Diversity Leaders* (Santa Monica, CA: RAND Corporation, 2016), xiii, <https://doi.org/10.7249/RR1148>.

<sup>68</sup> Pieterse, Van Knippenberg, and Van Dierendonck, “Cultural Diversity and Team Performance,” 798.

<sup>69</sup> Julia E. Hoch, “Shared Leadership, Diversity, and Information Sharing in Teams,” *Journal of Managerial Psychology* 29, no. 5 (2014): 541–64, <https://doi.org/10.1108/JMP-02-2012-0053>.

<sup>70</sup> Hoch.

<sup>71</sup> RaJade M. Berry-James, “Managing Diversity: Moving beyond Organizational Conflict,” in *Diversity and Public Administration*, ed. Mitchell Rice (New York: Routledge, 2015), 73.

<sup>72</sup> Espiridion Borrego and Richard Gregory Johnson III, *Cultural Competence for Public Managers: Managing Diversity in Today’s World* (New York: Routledge, 2011), 219, <https://doi.org/10.1201/b11095>.

and educating employees on their organizations' diversity values and culture are the key to the successful integration of organizations.

Measuring inclusion—the ability of an organization to engage all employees and utilize people across all differences—is also covered in the literature.<sup>73</sup> Characteristics of inclusive organizations involve employees feeling safe and involved in the workgroup, feeling respected and valued, having an influence on decision making, being able to bring the whole self to work, and recognizing and honoring diversity.<sup>74</sup> Ferdman and Deane discuss the specific concept of allowing employees to “bring their whole self to work.”<sup>75</sup> They explain that this concept means employees can be themselves and feel no pressure to hide aspects of their identity to fit in. Ferdman and Deane discuss that organizations achieve this by creating an environment that values differences in people.<sup>76</sup> Another indication of inclusion is that an employee feels he or she is a part of the organization's ingroup.<sup>77</sup> In their study, Downey et al. suggest that trust is enhanced when employees feel included, which can lead to increased performance and productive relationships.<sup>78</sup>

## 5. Conclusion

This literature review has outlined the prevalent theories in diversity research. It has detailed how CEM attempts to account for the double-edged sword of diversity and gives researchers a framework to account for both social categorization and information/elaboration theories.<sup>79</sup> Practical research in the field has focused on leadership and education as well as the positive impact of inclusion on diversity. These are all

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<sup>73</sup> Ferdman and Deane, *Diversity at Work*, 4.

<sup>74</sup> Ferdman and Deane, 37–38.

<sup>75</sup> Ferdman and Deane, 37–38.

<sup>76</sup> Ferdman and Deane, 39–41.

<sup>77</sup> Stephanie N. Downey et al., “The Role of Diversity Practices and Inclusion in Promoting Trust and Employee Engagement,” *Journal of Applied Social Psychology* 45, no. 1 (2015): 35–44, <https://doi.org/10.1111/jasp.12273>.

<sup>78</sup> Downey et al.

<sup>79</sup> Williams and O'Reilly, “Demography and Diversity in Organizations.”

important points to consider when evaluating the RFES and determining the effect of diversity on its organization.

### **C. RESEARCH DESIGN**

This study evaluates the history of Richmond Fire and Emergency Services using a mixed method approach.<sup>80</sup> The first part of the study is a qualitative analysis of the organization using CEM to determine the factors that have had the most influence on the work environment. The purpose of the qualitative research is to identify the challenges and successes of the organization, so other entities might better understand how to manage diverse workforces.

The second part of the study is quantitative. This portion of the research examines the demographics of RFES as well as its peers in Virginia and nationally. The purpose of this research is to better understand how RFES differs from its counterparts and to identify any trends that may exist in the fire service beyond the basic demographics typically reported.

### **D. CHAPTER OUTLINE**

Chapter II describes the research design in more detail. It discusses the methods chosen and specific information about the design and collection of data. Chapter III presents the qualitative data collected about Richmond, Virginia, and RFES. It also includes the analysis of that data and identifies the key challenges and successes of the organization's experience with diversity. Chapter IV describes the RFES demographic data and the results from the data calls. Chapter V analyzes the quantitative data and identifies trends. It also compares the data from RFES with those of the organizations participating in the data call. Chapter VI summarizes the findings of the study and offers recommendations for organizations and future researchers.

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<sup>80</sup> Creswell, *Research Design*, 228.

## II. RESEARCH DESIGN

The purpose of this chapter is to provide information on the method used for this study and to explain the structure of the data collection. This study used a mixed method approach for data collection. As Creswell discusses in his book, *Research Design: Qualitative, Quantitative and Mixed Methods*, mixed method approaches are commonly used to explore topics related to marginalized groups.<sup>81</sup> Qualitative and quantitative data were used to analyze this case. This chapter is broken into two parts. The first section describes the collection of qualitative data related to RFES, the historical background related to diversity, and the results of a study on the organization in 2008.<sup>82</sup> The second section describes the design of the quantitative portion of the study, which was used to compare Richmond to its peers in Virginia and departments of similarly sized cities nationally.

### A. QUALITATIVE RESEARCH DESIGN

The City of Richmond Department of Fire and Emergency Services is the subject of this case study.<sup>83</sup> The department's long history makes it an interesting case. RFES was homogenous for almost 100 years. During that time, it was composed entirely of white males. The organization was entrenched in tradition. Change was thrust on it by the civil rights movement in the United States and changes to city government. The department's focus on diversity for the last seven decades provides more than enough information to study the effects of diversity on a workforce beyond the simple numbers. The object of the qualitative study was to look at the experiences and practices of RFES through the framework of CEM.<sup>84</sup>

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<sup>81</sup> Creswell, *Research Design*, 228.

<sup>82</sup> System Planning Corporation, TriData Division "Building Bridges: An Assessment and Action Plan for the City of Richmond Fire Department" (Unpublished report, May 2009).

<sup>83</sup> Gary Thomas and Kevin Myers, *The Anatomy of the Case Study* (London: SAGE, 2018), 53, <https://doi.org/10.4135/9781473920156>.

<sup>84</sup> Van Knippenberg, Dreu, and Homan, "Work Group Diversity and Group Performance."



The qualitative portion of the research analyzed historical and qualitative data collected from RFES as well as other literature that details its historical approach to diversity. This portion of the research also included a review of a study of the organization collected by an independent consultant in 2008. The historical data helped to detail how RFES has become diverse, which practices have been successful, and what challenges the organization encountered. The analysis of this data was interpretive, as described by Creswell.<sup>85</sup> Interpretive analysis means that the collected information was grouped based on similarities and patterns. These patterns were based on the moderators described by Van Knippenberg, Dreu, and Homan.<sup>86</sup>

The data helped to determine which of the moderators have had the greatest impact on RFES's workforce. The level of the moderators' impact varied. This portion of the research helped to answer the research question in terms of the work environment at RFES, thus framing the issues with integration as well as the benefits for the organization so other agencies can learn from these experiences.

## **B. QUANTITATIVE RESEARCH DESIGN**

The second group of data came from historical and demographic data collected from departments similar to RFES. A data call for demographic information was sent to career departments across the country. This part of the research included other career departments in Virginia as they have recruited in a similar environment. The data call asked for basic demographic information about the organization, especially about minority and female employees.

Many studies have identified the basic demographic profile of fire departments, but information about the promotions and supervisors in the fire service has been limited. Moreover, few if any departments have tracked the achievement of certain "firsts" demographically. These data are not published at the local, state, or national level for fire departments. Therefore, the data call requested dates when departments first hired and

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<sup>85</sup> Creswell, *Research Design*, 176.

<sup>86</sup> Van Knippenberg, Dreu, and Homan, "Work Group Diversity and Group Performance."

promoted minorities and women. Departments were also asked to note when minorities or women were promoted to certain ranks, if ever. This information was used to see how the organizations compare with RFES in terms of timelines and to determine whether such data factor into diversity. The question was whether Richmond had success because it integrated sooner or because other factors were involved. This level of scrutiny helped to establish how Richmond is unique from its peers.

As fire departments struggle to fill their ranks with more diverse members, women remain more difficult to attract than minorities. If communities want their fire services to reflect their demographics, there is still much to be done to improve the percentage of women who serve those communities. The data call requested historical data about when departments first hired and promoted women as well as the number of women at each rank in the organizations.

My perspective as an RFES employee led me to believe that RFES is quite different from its peers. The most notable difference is that women and minorities serve in leadership positions. This type of demographic data is not available for the fire service or many other homeland security agencies. I requested information about basic demographics to first confirm the validity of the samples. If the basic demographics were similar to the published data regarding diversity in the fire service, it would stand to reason that any trends related to promotions for these departments likely reflected trends in the fire service as a whole. This part of the study evaluated demographics that are not usually reported to uncover patterns and problems facing diversity.

The organizations that were asked to participate in the data call were selected for specific reasons. The first group of quantitative data was from other career fire departments in the state of Virginia, so RFES could be compared to peer organizations that recruit minorities and women in the same region and in a similar cultural environment. National departments were selected based on their similarity in population and diversity to Richmond. Both groups were asked to provide data about current employees including the total number of sworn positions broken down by rank and the number of minorities and women who fill positions at each level. The data call was sent to approximately 100 career departments. The requests were evenly split between career departments in Virginia and

career departments outside Virginia with a similar size to Richmond. These data, when compiled and compared with those of RFES and the dataset, could show if and how Richmond was different demographically. Moreover, these data could also provide a basis for future research because numbers regarding the advancement of minorities and women in the fire service are hard to find. The departments were also asked some basic historical questions including the age of the organization as well as the aforementioned milestones related to diversity.

One of the drivers of diverse workforces is employing members who resemble the localities they serve.<sup>87</sup> After workforce data was received from the data call, they were compared to the community's demographics to see how much of a gap there was between the department's demographics and that of the community. This calculation is often used by police forces across the country, but there were no such data available for fire departments.<sup>88</sup> The percentage point difference is measured using the difference between the minority fire department share—the percentage of minorities employed—and the minority population share—the percentage of minorities in that population.<sup>89</sup> For this measure, a negative number indicates the number of minorities in the fire department is less than the actual percentage in the community. A positive number indicates that the percentage of minorities in the department is greater than that of the community. If a department were trying to emulate the community, it would aim to be as close to zero as possible. The worst possible score is a negative percentage. This calculation is part of the analysis that was used to compare RFES to its peers.

### C. CONCLUSION

The combination of the qualitative data available about RFES and the analysis of the department's quantitative data against data from other organizations provided an

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<sup>87</sup> Samuel Johnson Jr., "How Fire Departments Could Look Like the Communities They Serve," *Governing*, November 30, 2016, <http://www.governing.com/gov-institute/voices/col-steps-improve-fire-department-diversity.html>.

<sup>88</sup> "Police Department Race and Ethnicity Demographic Data," *Governing*, accessed January 4, 2019, <http://www.governing.com/gov-data/safety-justice/police-department-officer-demographics-minority-representation.html>.

<sup>89</sup> "Police Department Race and Ethnicity."

answer to the central research question. Richmond's unique place in national history and its history of diversity in the fire service make it an important case to review. The department's story provides stakeholders in homeland security agencies and institutions with a better understanding of diverse work environments and ways to better manage diversity and promote inclusion in their own organizations.

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### **III. QUALITATIVE STUDY OF RICHMOND**

The purpose of this chapter is to present the history of Richmond, Virginia, and analyze the qualitative data specific to RFES. The data are composed of historical data that reveal the successes and challenges of a diverse fire department. The data compiled about RFES are then evaluated using CEM.<sup>90</sup> The use of CEM details the factors that have significantly influenced the organization's diversity culture.

#### **A. HISTORICAL PROFILE OF RICHMOND, VIRGINIA**

The Richmond, Virginia, is an old city with deep connections to local and national history. The city was first explored and settled shortly after the arrival of English settlers. It was chartered as a town in 1742.<sup>91</sup> Richmond was a central location during the Revolutionary War as Patrick Henry delivered his famous "Give me liberty or give me death" speech at St. John's Church.<sup>92</sup> It was also at the center of the Civil War. In the years leading up to the Civil War, Shockoe Bottom was a center for the slave trade. It is estimated that 350,000 slaves were sold there between 1800 and 1850.<sup>93</sup> Richmond was also named the capital of the Confederacy in 1861.<sup>94</sup> After the Civil War, in 1890, construction of Richmond's Monument Avenue began. Monument Avenue is a street with several statues of prominent figures of the Confederacy including Jefferson Davis, Robert E. Lee, and

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<sup>90</sup> Van Knippenberg, Dreu, and Homan, "Work Group Diversity and Group Performance," 1010.

<sup>91</sup> "History of Richmond, Virginia," United States History, accessed March 21, 2019, <http://www.u-s-history.com/pages/h3916.html>.

<sup>92</sup> "The Greatest Rallying Cry: Give Me Liberty or Give me Death," American Heritage, accessed March 21, 2019, <http://www.americanheritage.com/content/greatest-rallying-cry-give-me-liberty-or-give-me-death>.

<sup>93</sup> United States History, "History of Richmond, Virginia."

<sup>94</sup> Mary A. DeCredico, "Richmond: Capital of the Confederacy," Essential War Curriculum, accessed March 23, 2019, <http://www.essentialcivilwarcurriculum.com/richmond-capital-of-the-confederacy.html>.

Thomas “Stonewall” Jackson.<sup>95</sup> These monuments have become part of a public debate about race relations in the country.<sup>96</sup>

Richmond’s history makes it an important place regarding diversity. Despite Richmond’s role in the Civil War and history of slavery, it played a prominent role in the country’s civil rights movement. Richmond’s Jackson Ward, in the late 1800s and early 1900s, became the center for black business and culture. Ellen Pearlman notes, “There is a side of Richmond known as the cradle of black capitalism, despite the fact that just a few decades earlier, during the civil war, the city had served as the capital of the Confederacy.”<sup>97</sup> During this time, Richmond was home to many significant figures in black history. Maggie Walker, the first woman to charter and serve as president of a bank, and John Mitchell Jr, editor of the *Richmond Planet*, an African American newspaper, called Richmond home.<sup>98</sup> Famous tap dancer Bill “Bojangles” Robinson was also a prominent figure from Richmond during this time.<sup>99</sup> This area was also home to the Hippodrome, a theatre where famous African American musical artists like Ella Fitzgerald, Duke Ellington, and Cab Calloway performed.<sup>100</sup> The presence of all this culture and success led to Jackson Ward being dubbed the “Harlem of the South” or “Black Wall Street.”<sup>101</sup> Richmond’s history as a center for the slave trade, its role in the civil war, and its

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<sup>95</sup> “Monument Avenue Historic District,” National Park Service, accessed March 21, 2019, <https://www.nps.gov/nr/travel/richmond/monumentavehd.html>.

<sup>96</sup> Gregory S. Schneider, “In the Former Capital of the Confederacy, the Debate over Statues Is Personal and Painful,” *Washington Post*, August 27, 2017, [https://www.washingtonpost.com/local/virginia-politics/in-the-former-capital-of-the-confederacy-the-debate-over-statues-is-personal-and-painful/2017/08/27/87002bc4-8998-11e7-a94f-3139abce39f5\\_story.html?utm\\_term=.702a1a870b58](https://www.washingtonpost.com/local/virginia-politics/in-the-former-capital-of-the-confederacy-the-debate-over-statues-is-personal-and-painful/2017/08/27/87002bc4-8998-11e7-a94f-3139abce39f5_story.html?utm_term=.702a1a870b58).

<sup>97</sup> Ellen Pearlman, “Escapes: Tracing Black History in Richmond’s Jackson Ward Neighborhood,” *Washington Post*, January 27, 2012, [https://www.washingtonpost.com/lifestyle/travel/escapes-tracing-black-history-in-richmonds-jackson-ward-neighborhood/2012/01/27/gIQAwanMkQ\\_story.html](https://www.washingtonpost.com/lifestyle/travel/escapes-tracing-black-history-in-richmonds-jackson-ward-neighborhood/2012/01/27/gIQAwanMkQ_story.html).

<sup>98</sup> Virginia Foundation for the Humanities, “Jackson Ward Historic District,” African American Historic Sites Database, accessed January 16, 2019, <http://www.aahistoricsitesva.org/items/show/221?tour=14&index=17>.

<sup>99</sup> “Historic Jackson Ward: Revitalizing ‘Black Wall Street,’” Community Preservation and Development Corporation, accessed January 16, 2019, <https://www.cpdc.org/historic-jackson-ward-redeveloping-and-reviving-black-wall-street/>.

<sup>100</sup> Virginia Foundation for the Humanities, “Jackson Ward Historic District.”

<sup>101</sup> Community Preservation and Development Corporation, “Historic Jackson Ward.”

emergence as a city for empowering African Americans make it an interesting case to study. These events coincided with the growth of the fire service in Richmond.

## **B. RICHMOND FIRE AND EMERGENCY SERVICES**

Richmond's Department of Fire and Emergency Services has also been affected by the history of the city of Richmond and can trace its beginnings to the early 1800s. It is one of the oldest fire departments in the country. The roots of the department can be traced to a theater fire that broke out on Christmas Eve of 1811 and the Richmond Fire Society that formed in response a few years later. The fire killed 72 people, including the governor of Virginia.<sup>102</sup> Before that time, a variety of volunteer companies throughout the city had provided fire protection.<sup>103</sup>

The firefighting entities changed over the next 42 years with a mixture of professional and volunteer organizations. Established in October 1858, the RFES is the fifth oldest career department in the country. It was formed by an ordinance that allowed for six new fire companies to be overseen by the first fire chief in Richmond, John J. Fry. The ordinance also allowed each company to hire "not more than 10 ten slaves 'of good character' to man the pumps."<sup>104</sup> Thus, the same year that the department was officially created was its first exposure to diversity.

The department grew as the city grew. By 1958, the department had grown to 21 engine companies and seven ladder companies housed in 19 stations.<sup>105</sup> The first black career firefighters were hired in 1950.<sup>106</sup> They were also the first black career firefighters

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<sup>102</sup> Donald Lee Morecock, "A History of the Richmond, Virginia, Fire Department" (master's thesis, University of Richmond, 1958), 7, <https://scholarship.richmond.edu/cgi/viewcontent.cgi?article=1800&context=masters-theses>.

<sup>103</sup> Morecock, 6.

<sup>104</sup> Morecock, 16.

<sup>105</sup> Morecock, 36.

<sup>106</sup> Chuck Milligan and Ron Ballew, "History of Black Firefighters," *Mike Legeros* (blog), accessed January 16, 2019, <https://www.legeros.com/history/ebf/national.shtml#Richmond>.



in the state of Virginia.<sup>107</sup> When the department hired its first black firefighters, they were segregated from the white firefighters. Although the minimum qualifications to get the job were the same, black firefighters had different standards of training before being released for duty, and all were assigned to the same company, Engine 9, located in Jackson Ward.<sup>108</sup>

Still, the department was not integrated, and the life of black firefighters on the job was much different from that of their white counterparts. They were required to perform many job duties not required of white firefighters—having to wash the truck after every call and perform non-firefighting tasks like cutting grass and painting at other city properties unrelated to the fire department. They were also required to wear the dress uniform if they chose to sit in front of the fire station—which was not required for white firefighters.<sup>109</sup> Engine 9 was also forced to make rounds to other fire stations and collect damaged equipment and laundry.<sup>110</sup> Black firefighters were not allowed to enter three of the white stations, so they were forced to pick up items at the back door to perform their duties.<sup>111</sup>

Black firefighters were also not given the same opportunities for promotion. Once the first black firefighters had reached the three-year requirement to become engineers, the position was eliminated.<sup>112</sup> In the beginning, black firefighters were allowed to take the promotion exam but were promoted only if there was an opening at Engine 9.<sup>113</sup> In 1955, Harvey S. Hicks became the first black officer in the department, was promoted to lieutenant, and was assigned to Engine 9. It would be many more years before black officers were allowed to supervise white employees.

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<sup>107</sup> “Engine Company #9 and Associates, Inc., Pay Tribute to the City Richmond and the Commonwealth of Virginia’s First Black Firefighters,” Praise Richmond, July 2, 2018, <https://praiserichmond.com/1513117/engine-company-9-and-associates-inc-pay-tribute-to-the-city-richmond-and-the-commonwealth-of-virginias-first-black-firefighters/>.

<sup>108</sup> Milligan and Ballew, “History of Black Firefighters.”

<sup>109</sup> Milligan and Ballew.

<sup>110</sup> Milligan and Ballew.

<sup>111</sup> Milligan and Ballew.

<sup>112</sup> Milligan and Ballew.

<sup>113</sup> Milligan and Ballew.

An incident on June 14, 1963, changed the department's outlook on integration. While attempting to rescue a worker trapped in a hole, then-Captain Harvey Hicks and Douglas P. Evans, along with the worker, died. Another firefighter from Engine 9, Calvin Wade, was rescued from the hole and survived after receiving medical care. The administration recognized the potential public relations nightmare of losing many of its black firefighters in a single incident, and the department decided to fully integrate the workforce.<sup>114</sup> On July 6, 1963, black firefighters were assigned houses other than Station 9 to work alongside their white counterparts.<sup>115</sup>

### **1. Push for Equality**

Black firefighters continued to push for equal rights in the workplace, and in 1974, the Black Brothers Combined Professional Firefighters of Richmond Virginia Inc. was formed. At the time of its forming, the department had only two black officers and 78 black firefighters in a force of 510.<sup>116</sup> Later that year, the group filed a class action lawsuit alleging discrimination in hiring, assignments, transfers, and promotions.

Another key development during this time was that in 1977, Richmond's city council had majority black membership after a contentious special election.<sup>117</sup> This change in government leadership led to a push for diversity that had not been seen before in the city. The Brothers Combined lost the lawsuit in 1978, however. Despite the loss, things began to change for people of color in the department. In November that year, city leadership hired its first black fire chief, Ronald Lewis, from Philadelphia. The next year, the department hired its first woman, Barbara J. Hicks, who was also black.<sup>118</sup> That same year, the department promoted its first black officer to the rank of deputy battalion chief.

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<sup>114</sup> Milligan and Ballew.

<sup>115</sup> Milligan and Ballew.

<sup>116</sup> Milligan and Ballew.

<sup>117</sup> Ken Ringle, "Richmond: Blacks Capture Majority of Seats on City Council in Historic Election," *Washington Post*, March 3, 1977, [https://www.washingtonpost.com/archive/politics/1977/03/03/richmond-blacks-capture-majority-of-seats-on-city-council-in-historic-election/0fead50d-1bd8-4ea1-b2ea-2760f8af02d8/?noredirect=on&utm\\_term=.91fe44319517](https://www.washingtonpost.com/archive/politics/1977/03/03/richmond-blacks-capture-majority-of-seats-on-city-council-in-historic-election/0fead50d-1bd8-4ea1-b2ea-2760f8af02d8/?noredirect=on&utm_term=.91fe44319517).

<sup>118</sup> "Stop, Drop, and Roll: Firefighting in 20th Century Richmond," Google Arts & Culture, accessed January 16, 2019, <https://artsandculture.google.com/exhibit/QQtW4wIp>.

Arthur L. Page, one of the first 10 black firefighters hired by the city, was promoted on December 26, 1979.<sup>119</sup> The years under Chief Lewis’s leadership from 1978 to 1995 helped the department make strides in diversity.

Nine years passed before the department hired another woman, Tina Watkins. She would go on to become the first female lieutenant and captain. In 2002, Larry Tunstall became the first black fire chief to make it through the ranks and be promoted to the department’s top position. He served as fire chief until 2005. In 2008, the city hired its first female chief officer. Tracy Thomas was hired as a staff battalion chief to oversee the department’s EMS and safety division. Two years later, Tina Watkins was promoted to the rank of battalion chief along with Christine Richardson, making them the first two women to attain that rank from within the department. They were also the first black women to serve at that rank.

It should be noted that the Richmond Police Department, although not part of this study, also has a history of diversity. The department hired its first female officers in 1922 and its first minority officers in 1946.<sup>120</sup> In 1975, it became one of the first departments in the state to designate female officers to patrol assignments.<sup>121</sup> The department hired its first black chief in 1989. The Richmond Police department has since improved diversity at all levels of the organization. A 2017 human resources report shows that 47 percent of the police department’s supervisory roles are filled by minorities or women. They also have a high representation of minorities and women in senior leadership positions—with women or minorities filling 10 of the 19 positions at the rank of captain or higher.<sup>122</sup> The department also has the highest minority share in the area at 34.4 percent.<sup>123</sup>

Richmond’s police and fire departments, from an ethnic and gender perspective, were at the forefront of integration in their respective fields. Currently, both are more

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<sup>119</sup> Milligan and Ballew, “History of Black Firefighters.”

<sup>120</sup> “History of the Richmond Police Department,” City of Richmond, accessed January 17, 2019, <http://www.richmondgov.com/Police/HistoryPoliceDepartment.aspx>.

<sup>121</sup> City of Richmond.

<sup>122</sup> Richmond Police Department, “Human Resources Weekly Report” (unpublished data, 2017).

<sup>123</sup> “Police Department Race and Ethnicity.”

diverse than most of their counterparts in the region and the state. Since both departments became integrated, they have worked to build workforces that reflect the city's population despite several decades of population decline.<sup>124</sup> This diversity in both the police department and RFES illustrates the city of Richmond's commitment to diversity. The city's successes in recruiting a diverse workforce make Richmond an interesting case to study the experiences of the diverse workforce and community.

## 2. Building Bridges Study

Integration in RFES did not come without conflict. The previous historical data detail the events leading up to and following integration, but the treatment of minorities affected the organization. The department endured many years of distrust regarding promotions, hiring, and discipline. In 2008, recognizing this division in the department, Fire Chief Robert Creecy procured an outside consultant to study the organization and propose changes to improve employee satisfaction and organizational culture. TriData, a division of System Planning Corporation, secured the bid and began a study of RFES's culture and practices. This study is known as "Building Bridges."<sup>125</sup>

The study was conducted over the course of nearly a year. It combined various participatory evaluations of the organizations. The research included an intercultural development inventory, focus groups with affinity groups, community partners, and leadership. The study began with orientation sessions with all members of the department to outline the process and expectations. TriData chose this approach to encourage openness, dialogue, and buy-in for the study.<sup>126</sup>

The results of the data collection revealed a host of cultural and organizational issues within the department. There were complaints about communication, leadership, trust, fairness, and consistency.<sup>127</sup> Issues related to race and gender, however, were at the

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<sup>124</sup> Hamilton Lombard, "Richmond's Quiet Transformation," Stat Chat, University of Virginia, April 7, 2015, <http://statchatva.org/2015/04/07/richmonds-quiet-transformation/>.

<sup>125</sup> Melvin Carter, "Building Bridges—Thoughts from Year One," *Building Bridges*, April 2011, 18, [http://www.ci.richmond.va.us/fire/documents/BBArchive\\_April\\_2011.pdf](http://www.ci.richmond.va.us/fire/documents/BBArchive_April_2011.pdf).

<sup>126</sup> System Planning Corporation, "Building Bridges," 11.

<sup>127</sup> System Planning Corporation, 64.

forefront of problems facing the department. They are the focus of the executive summary in the final report with details that speak to the diversity and inclusion issues.<sup>128</sup> Minority participants shared that they were still fighting racism in the department. Although overt racism was not often witnessed, there were still instances of passive-aggressive behavior toward them.<sup>129</sup> TriData also noted that many mixed-race workgroups worked well together and had great chemistry. The report also identified that other such teams had struggled to function because of trust and performance issues.<sup>130</sup> Officers had also acknowledged that they were not trained to deal with certain issues related to race and gender, and they struggled as supervisors when presented with those types of problems.<sup>131</sup>

The results also revealed the perception among male firefighters that women were not as qualified as the men were. Female firefighters noted a lack of accommodations for separate sleeping quarters and restrooms in new fire stations as evidence that they were not wanted in the department. Both minorities and women noted that phrases like “lowering standards” were used as a way to express the department did not want them or did not want to promote them. These groups considered such language as subtle racism and sexism present in the organization.<sup>132</sup> TriData acknowledged that these issues, although serious, were common in fire organizations nationally and commended RFES for recognizing the issues and taking steps to improve them.

It has been nearly 10 years since this report was issued. In the meantime, the department sought to implement many of the 33 recommendations. As part of an effort to improve communication, it started a newsletter, and on the one-year anniversary of the report, then-Deputy Chief Melvin Carter celebrated the implementation of 10 recommendations and more in the works. He acknowledged that the process was slow but that the administration was committed to improving the issues noted in the report.<sup>133</sup>

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<sup>128</sup> System Planning Corporation, 4.

<sup>129</sup> System Planning Corporation, 16.

<sup>130</sup> System Planning Corporation, 16.

<sup>131</sup> System Planning Corporation, 4–5.

<sup>132</sup> System Planning Corporation, 16.

<sup>133</sup> Carter, “Building Bridges,” 1–2.

The department has addressed the disciplinary process with the development of a disciplinary matrix to ensure department members understand the processes and appropriate consequences for various actions. TriData had recommended that the equal employment opportunity (EEO) position be strengthened or changed to a professional staff position. The department now has several human resource representatives who handle personnel-related complaints of harassment, violence, and initial discipline reviews.

Melvin Carter became the fire chief of RFES in July 2017. He has since taken steps to address other recommendations. Members of the organization are currently working on a new promotion process, including possibly procuring a new vendor to oversee the process, in the hopes of quelling distrust. The department is also working to implement a professional development model to ensure that members of all ranks meet appropriate training and educational qualifications for their positions. RFES also recently hosted Virginia's Fire Equity and Diversity Conference, in which it has participated for years.<sup>134</sup>

The culture and morale of the organization are hard to measure without a study of similar depth as the TriData project. Further research to measure the progress of the organization would be appropriate at this time. Giving members a voice to discuss their impressions of the department would be the most reliable way to assess the current work environment. The organization does continue to embrace its diverse community and organization. RFES remains the most diverse fire department in the area, and the quantitative data display measurable ways in which the department has succeeded whereas its peers have not.

### **3. Analysis of the Qualitative Data**

An organization with a long history, such as RFES, requires an analysis of specific points in time but also of the key factors that have contributed to the current state of the organization. The history of the city itself has played a large role in the department's current state. It is impossible to evaluate the organization without considering the symbolism of Richmond's history as the former capital of the Confederacy. While Richmond is a symbol

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<sup>134</sup> "Home Page," Virginia Fire Equity & Diversity Conference, accessed February 28, 2019, <https://www.vfedconference.com>.

of oppression in the eyes of minorities, its place in African-American history also makes it a symbol of hope and empowerment. These conflicting narratives, combined with Richmond's record of hiring minorities and women and providing opportunities to them, offer other organizations information about the challenges of diversity and inclusion.

The TriData report makes evident that there were elements of social categorization taking place for a long time in the RFES.<sup>135</sup> The department's history of social categorization and conflict resulting from that process seems to reinforce the general findings of SIT scholars and the negative effects stemming from diversity.<sup>136</sup> Human resource practices contributed to this conflict. Diversity scholarship would expect a group that was homogenous for nearly 100 years might feel threatened by new members of the department who are not like them. It is clear that this sentiment was present in the beginning, and rather than trying to negate this bias, it was strengthened by the unit design and the separation of black firefighters from white ones—along with a separate set of rules for conduct, training, promotions, and job duties.<sup>137</sup>

These human resource practices also contributed to black firefighters feeling as the outgroup. They were discriminated against and forced to work under a different set of rules or risk losing an opportunity to be in the profession. It is evident that city leadership felt strongly about the need to integrate, but at the department level, it is unclear how much the fire chief position supported integration. The black firefighters' need to form their own union spoke to their feelings of being an outgroup. The lack of promotions and changes to promotion rules—despite black firefighters feeling they deserved promotions—created what could be deemed a negative challenge. When an outgroup feels its honor is being challenged by the ingroup, it requires a response to regain its honor or goal.<sup>138</sup> The lawsuit was a key point in the organization's timeline. Despite the dismissal of the lawsuit, the case seemed to force the city to evaluate and change some of its hiring and promotion practices.

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<sup>135</sup> System Planning Corporation, "Building Bridges."

<sup>136</sup> Williams and O'Reilly, "Demography and Diversity in Organizations," 85.

<sup>137</sup> Milligan and Ballew, "History of Black Firefighters."

<sup>138</sup> David Brannan, Darken Kristin, and Anders Strindberg, *A Practitioner's Way Forward: Terrorism Analysis* (Salinas, CA: Agile Press, 2014), 72.

As legal battles were brought to courts across the country regarding diversity, integration, and affirmative action throughout the 1970s and 1980s, Richmond's leadership structure changed.<sup>139</sup> The hiring of Chief Lewis and his leadership changed the environment in the department. Although, by the time the TriData study was conducted, there were still a host of issues related to diversity, Chief Lewis's leadership clearly became a moderator of diversity in the department. Even his rise to chief was a symbolic movement—that let the ingroup in this situation know that the values of the city and department were changing. The response by some of the white male firefighters was to resort to passive-aggressive tactics to undermine the validity of hiring and promoting minority and female firefighters. Having a minority at the top ensured that processes would change and diversity would be the norm. This leadership, along with a history of minority representation at the top levels of city government, has ensured that the City of Richmond not only values diversity but embraces it. This oversight by local government has been a proven moderator of the RFES organization and its approach to diversity.

Human resource practices during this time until the TriData study still did little to improve feelings of fairness in promotions, hiring, and discipline. The lack of concrete policies and the obvious subjectivity in some of its disciplinary, hiring, and promotion processes did not bring the department together. This structure continued to contribute to intergroup bias and feelings of mistrust between many groups within the organization. Despite several leadership changes after Chief Lewis, there remained issues with perceived fairness and equality.

The decision to have TriData conduct the study was most likely a result of known tension between racial and ethnic groups within the organization, but the study revealed other elements of ingroup/outgroup dynamics that had largely been ignored. The recruitment and treatment of female firefighters proved to be an issue that was equally contentious. Even with the intergroup bias between white firefighters and minorities, the study revealed they were somewhat united in their lack of support for women in the fire

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<sup>139</sup> Philip F. Rubio, *History of Affirmative Action, 1619–2000* (Jackson: University Press of Mississippi, 2001), 126–32, ProQuest.



service.<sup>140</sup> The results of the study showed that the department was not as tolerant or supportive of diversity as it perceived itself to be.<sup>141</sup> The shortcomings of the department's treatment of outgroups were most notable for women. For instance, there was no written policy at the time regarding pregnancy, and as noted in TriData's report, the infrastructure had not been enhanced to make women feel welcome in the department.

At the time of the TriData report, the department's human resource systems had a large impact on the organization. The recommendations of the TriData report exposed some of the flaws in these systems. The department used this information to improve its infrastructure and systems, thereby improving intercultural relations and gender issues. RFES implemented many of the recommendations and made improvements to infrastructure such as private sleeping areas in all stations. Renovations in many of the stations improved bathroom facilities, and the department made plans to fully renovate or replace the remainder. The department also developed and implemented a pregnancy policy. The city has recently instituted a family bonding leave allocation that gives new parents two months of leave after the birth of a child. This policy helps firefighters keep sick time for other uses—instead of the birth of a child.

The TriData report seems to reinforce the hypothesis of CEM. Elements of social categorization were still contributing to intergroup conflict and bias in the organization. It was reserved not only for racial issues but also for issues of gender, age, and experience level. Chief Creecy may have felt the intergroup conflict had become so prevalent that it threatened the department's ability to accomplish its mission.

Despite the conflict within the organization, the result was better customer service from the community's perspective. The report also suggests that members who did not categorize themselves along racial and gender boundaries worked hard to render some of these effects salient through the focus on the core mission of the department. This finding suggests that the culture of service was a key moderator at the time. The report also commends many of the department's members for having the courage to hold difficult

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<sup>140</sup> System Planning Corporation, "Building Bridges," 16.

<sup>141</sup> System Planning Corporation, 67.

conversations and improving relations between marginalized groups.<sup>142</sup> This sharing of information, perspectives, and training was critical for the organization to move forward.

The history of the RFES offers a unique perspective into the roots of diversity in the fire service. The organization's integration of women and minorities mirrors national trends, creating a unique work environment. The analysis of this history through the lens of CEM shows that ingroup and outgroup conflict most likely still exists in the organization.<sup>143</sup> There is evidence of intergroup conflict and bias going back many decades. The data also show that the organization has been able to harness many of the benefits of diversity to provide better service to its communities. The most effective moderators in this environment have been human resource practices, culture, and leadership. These moderators contributed to both the negative and positive aspects of diversity in RFES but were the key factors that have dictated how the organization views diversity and uses it to meet its mission.

Guillaume et al. identified other moderators that may affect diverse environments.<sup>144</sup> Unit design, strategy, and individual differences were evaluated, but there was insufficient evidence to suggest their role in moderating this environment. The unit design did play a role in the early stages of integration. The segregation of white and black firefighters contributed to some of the early instances of intergroup conflict but has not been an issue in the decades since. The strategy may have played a role during the early years of integration and with fire chiefs since segregation, but there were no data to analyze the evolution of the department's strategies. Individual differences are another moderator that lacks sufficient data to analyze. In this case, more first-hand perspectives from members may have provided a better understanding of how personal differences have influenced this organization's environment. Guillaume et al. acknowledge that personal differences are hard to study and that diversity scholarship as a whole lacks the ability to

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<sup>142</sup> System Planning Corporation, 19–20.

<sup>143</sup> Van Knippenberg, Dreu, and Homan, "Work Group Diversity and Group Performance."

<sup>144</sup> Guillaume et al., "Harnessing Demographic Differences in Organizations," 280.

study this moderator.<sup>145</sup> The analysis of quantitative data provides more information about the workforce demographics in Richmond compared to its peers.

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<sup>145</sup> Guillaume et al., 291.

## **IV. DEMOGRAPHICS**

This chapter presents the quantitative data collected from RFES and the two data calls. The first section describes RFES's demographics. The second section describes the data collected from other Virginia departments. The third section details the findings of the national data call. The data described in this chapter are the basis for the quantitative analysis of this study, which is described in Chapter V.

### **A. RFES DEMOGRAPHICS**

RFES currently has 425 sworn positions. There are 316 firefighter positions and 109 officer positions that start at the rank of lieutenant and progress through the ranks of captain, battalion chief, deputy chief, and the fire chief.

Minorities represent 39.2 percent of all sworn positions and 41.2 percent of officer ranks in RFES. At the executive level, defined as battalion chief or higher, minorities comprise 52.9 percent of positions. It is worth noting that the top three spots in this organization—two deputy chiefs and the fire chief—are filled by minorities.

The minority community share point difference for RFES is -20.9 percent, which is below average for both Virginia and national department datasets. Its minority community share point difference for officers improves to -18.92 percent. The minority community share for the executive minority leaders also shows an improvement to -7.3 percent. The organization's leadership most closely mirrors the community it serves out of all the work groups in the organization.

The department is currently composed of 6.1 percent women. This is above the national average and the national data call results but below the average of the department's Virginia counterparts. The percentage of female officers is 8.2 percent. This is higher than the averages in both datasets and all but two of the 21 respondents. Richmond's female percentage of executive officers is 23.5 percent, holding four of the 17 available positions at that level. This is also much higher than either of the datasets. Virginia departments averaged 5.74 percent while the national departments averaged 3.85 percent.

The evaluation of advancement opportunities within the organization shows that 25.6 percent of the positions in the department are officer positions. Executive roles account for 4 percent of all roles in the organization. This means that one in four employees should achieve some sort of leadership role in the organization. It also means that about one out of every 25 will achieve an executive-level role. Minorities in the organization are being promoted to officer ranks at approximately 26.9 percent, slightly above the suggested rate by position distribution. They are being promoted to the executive level at a rate of 5.3 percent. This percentage is also at a higher rate than the distribution of positions. Women in the organization are being promoted to the officer level at an even higher rate—34.6 percent—than their male counterparts, who are near the suggested line and being promoted at 25.1 percent. Despite no representation above battalion chief, they are still achieving executive-level promotions at a rate much higher than their male counterparts. Women in RFES have a 15.4 percent likelihood of being promoted to executive-level positions as opposed to 3.3 percent for men.

## **B. RESULTS OF DATA CALL FOR CAREER DEPARTMENTS IN VIRGINIA**

Data call results yielded responses from nine other Virginia career departments. The average size of sworn personnel for the group was 294. The average age of the departments was 54 years. The oldest was founded in 1871, and the newest in 2009. When looking at actual data for each sworn position identified by the nine departments, there were 2,651 sworn positions, of which 13.3 percent were filled by minorities and 7.8 percent by women. Minorities accounted for 8.29 percent of the officer positions. Only one department had a higher percentage of minorities in officer positions than its total minority percentage. All other departments showed a decrease from their basic minority percentage to their percentage of minority officers. Because the department sizes varied, executive-level positions were defined as battalion chief and higher. At the executive level, minorities filled 5.74 percent of the positions. Five of the nine departments had no minority representation at the rank of battalion chief or higher. None of the fire chief roles from the nine departments were filled by minorities.

Historical data from these departments revealed that the average year departments hired their first minority member was 1996, or an average of nine years after their founding (the two departments founded before 1950 were excluded from these calculations). Only three of the nine departments ever had a minority reach the rank of battalion chief or higher. Only two of the departments noted having a minority ever reach the rank of assistant chief or higher.

The cumulative results from the Virginia departments compared with the overall demographics of the state of Virginia shows that the minority fire department share was 13.35 percent, as previously stated, and the minority population share for Virginia was 36.9 percent. This results in a point percentage difference of -23.5 percent. For all departments, there was an average -25.08 percentage point difference. The numbers closest to zero were in homogenous communities with minority population shares of less than 25percent. The lowest scores were in communities with the greatest diversity. Thus, the more diverse the community, the wider the gap was between the workforce and the community. Seven of the nine departments were in a minority share of 8–17 percent, regardless of the minority community share.

This calculation was used to compare promotion numbers with the local demographics. The percentage point difference between the minority officer share and minority population share decreased. The mean dropped to -29.37 percent. At the executive level, the mean was 30.63 percent. This drop was minimized by the five departments that already had the lowest score possible for the officer calculation. This drop reflected the other four departments' decrease in point difference.

### **1. Detailed Results Related to Women**

Nine career departments in Virginia and 11 departments from outside the state all provided detailed data about women in their departments at various ranks. Historical data from the Virginia departments showed that the first woman was hired in 1979. A majority of the departments that responded in this category—two did not answer—hired their first female firefighters between 1996 and 2009. The agencies reported that the first woman achieved the rank of battalion chief in 1995. Three of the nine respondents in this category

promoted their first female battalion chief after 2012. Two departments reported never having a woman reach that rank. Only two departments reported ever having a woman fill the role of assistant chief or higher. None of the respondents currently had a female fire chief.

Women filled 5.57 percent of the officer ranks and 5.74 percent of battalion chief or higher in Virginia departments. The data showed that only one woman held a rank higher than battalion chief. Six of the seven female executives were at the battalion chief level.

## **2. Advancement Opportunities in Virginia Departments**

This distribution for promotion opportunities in the Virginia organizations shows that there were 2,651 total positions. Officer positions made up 26.4 percent of all sworn jobs. Executive-level ranks accounted for 4.6 percent of all positions. This means that employees should expect that one in four firefighters typically secure an officer role of some type. This also means that roughly 5 percent of all firefighters reach the executive level.

Virginia departments promoted white firefighters at a rate of 27.9 percent for all officer roles, and 5 percent for executive roles. These numbers aligned with the proportions of positions. Minorities were only promoted at a rate of 16.3 percent, well below the normal distribution. The promotion percentage for the executive level was less than expected at 1.9 percent.

Women in these same departments were promoted at slightly higher rates than minorities but still fell below the expected rate of promotion. Men in these departments were promoted in line with the expected rate of promotion. They were promoted to officer roles and executive roles at 27 percent and 4.7 percent, respectively. Women were promoted to the officer level at 18.6 percent. There were promoted to the executive level at a rate of 3.3 percent.

## **C. RESULTS FROM NATIONAL DATA CALL**

Eleven fire departments responded to the data call at the national level. These departments were selected because they serve cities similar in size to Richmond. The

demographics in these areas are also similar to Richmond with the lowest minority share at 25.2 percent and the highest at 96.5 percent. The populations of the localities that participated ranged from 188,000 to 2.1 million with the median being 226,000, which is close to Richmond's current population of 216,000. The mean number of sworn positions for these departments was 388, and the median size was 399. This meant the dataset compared well with Richmond in terms of community diversity, population, and department size. Because two of the respondents did not track promotion data related to minorities or women, their data were used solely to examine diversity at the organizational level and historical data.

All 11 of the departments provided some of the historical data related to minority and female firefighters, but not all departments responded to every question. As a result, some of the data may not include responses or averages from all 11 departments. The historical profiles of these departments showed that the average age of the departments was 111 years old. The first year a minority was hired among these departments was 1947 although most of the departments hired their first minority firefighters in the 1960s and 1970s. The first year a minority was promoted to battalion chief in any of these departments was 1980. Six of the 11 departments did not have a minority battalion chief until 1995 or later, and one still has never had a minority battalion chief. The earliest that any of these departments had a minority serve at the rank of assistant chief or higher was 1984. Seven of the respondents had their first minority fill the role of assistant chief after 1992, and two have never had a minority fill a position at that level.

Ten departments provided basic demographics about their organizations related to minorities. One of those ten provided only a total number of minorities with no information about minorities serving in leadership roles. Of the 4,267 total sworn positions of those departments, 22.38 percent were filled by minorities. The data related to officer positions showed that minorities filled 17.5 percent of officer positions. At the executive level, 16.83 percent of positions were filled by minorities. Three departments had minorities filling the top role in their organization at fire chief. Individually, only two departments had a higher percentage of minority officers than the percentage of minorities in their organization.



Every other department's minority officer percentage was lower than the percentage of minorities in their department.

The same measures for the Virginia departments were used for the national departments in representing their communities. The average community minority share was 51.1 percent. The average minority share was 19.9 percent. This meant the mean point difference was -31.17 percent (contrasted with the average point difference for police departments at -24.5 percent).<sup>146</sup> The gap increases for minority officer shares in the departments. The average point difference for minority officers was -35.72 percent.

### **1. Results Related to Women**

The departments that responded to the national data call all provided information about women in their agencies. The historical data for women in the departments were not as comprehensive as the data for minorities. Nearly all responded to the category that detailed the first female hire for the department. Three departments noted they hired their first women in 1978. That was the earliest date of the nine respondents in that category. The remaining departments' first female hires all took place before 1994. The earliest female battalion chief from this dataset was 1995. The other five answers ranged from 1996 to 2013. One acknowledged it had never had a female battalion chief, and five did not answer this question. For the question pertaining to the first woman to reach assistant chief or higher, four departments had women reach this level. The earliest was in 1996. Four departments acknowledged that no woman had ever reached that rank or higher, and three did not respond to the question.

The actual numbers showed that out of 4,267 sworn positions in all the departments combined, 196 were held by women. That equaled 4.59 percent. There were 1,489 officer positions in those departments, but only 40 were held by women (2.69 percent). At the next level of leadership, the numbers were higher with 3.85 percent of executive-level positions being held by women. There were no female fire chiefs in this dataset.

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<sup>146</sup> "Police Department Race and Ethnicity."

## **2. Advancement Opportunities in National Departments**

The promotion profile of the national participants showed a distribution of 34.9 percent officer positions and 4.9 percent executive-level positions. The percentage of officer positions was about 10 percent more than the Virginia dataset. White firefighters in these organizations were promoted at a rate of 42.8 percent for all officer positions and 5.8 percent for executive-level positions. Minorities in these departments were promoted at a rate of 24.1 percent for all officer roles. They were selected for 4.1 percent of executive-level positions.

These organizations promoted women to officer roles at a rate of 20.4 percent. Female members of these agencies achieved executive-level promotions at a rate of 4.1 percent. Men in these organizations were promoted at a rate in line with the position distribution. They were promoted at a rate of 35.6 percent for any officer position and 4.9 percent for executive-level positions.

### **D. CONCLUSION**

This has described the results of the quantitative data collected from the data two data calls and from RFES. The results from the two data calls showed similarities in both basic and detailed demographics. RFES showed some similarities to both sets yet some obvious differences, particularly in promotion opportunities for women. These data are used to compare RFES to its peers in Chapter V.

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## V. QUANTITATIVE ANALYSIS

The purpose of this chapter is to analyze the results of the data calls. The first section analyzes and compares the data from RFES and the Virginia data call. The next section evaluates the data from the national data call and draws comparisons to RFES. The final section provides side-by-side comparisons of data from RFES with other departments and a summary of the quantitative findings. This chapter concludes with trends in the fire service beyond the lack of diversity at the sworn employee level.

### A. ANALYSIS OF DATA RELATED TO MINORITIES IN THE VIRGINIA DATA CALL

A comparison of similar departments is essential for analyzing the demographics of RFES. The first dataset was composed of other career departments in Virginia. These departments recruit firefighters from similar demographics, cost of living, and historical contexts. The basic demographic profiles of Richmond and the Virginia departments had distinct differences. The minority share difference was noticeable. Richmond's minority share of 39.29 percent was much higher than the 13.35 percent of all sworn positions for other Virginia departments. The promotion information for minorities differed greatly for Richmond, whose minority officer percentage was much higher than that of the other departments. Minorities had filled only 8.29 percent of officer positions in Virginia departments whereas minorities had filled 41.2 percent of officer positions in Richmond. The gap continued to widen at the executive level—only 5.74 percent of executive-level positions were held by minorities among the other Virginia departments whereas 52.9 percent of executive-level positions in Richmond were held by minorities. Richmond had more minorities in executive-level positions (nine) than the Virginia dataset combined (seven). It is difficult to speculate why Richmond's numbers were so much higher than its peers in this area without having more specific information about each department's promotion requirements, the tenure of minority employees, and other factors. It does show that Richmond values diversity and has opened doors for minorities to be promoted and to become leaders. Chief Carter is a product of RFES and is the second minority member to advance from the firefighter rank to the top position in the organization.

Richmond's uniqueness in the area is evident when examining the difference between the department's minority share and the community's minority share. This measurement is designed to measure how much an organization looks like the community it serves. Although the department was lacking slightly in overall minorities, with a point difference of -20.91 percent, it was still the best score among any of the departments in the dataset with diverse communities (more than 25 percent minority). The officer ranks more closely mirrored the community, the scores improving to -18.92 percent and -7.30 percent for the officer and executive minority ranks, respectively. The averages for the departments in the dataset dropped steadily for diverse communities, from a -31.58 percent minority/community point difference to a -38.59 percent minority officer/community point difference to a -40.03 percent minority executive point difference.

Richmond was also different from its peers in basic promotion expectancy based on the distribution of positions. Tables 1 and 2 show the distributions of positions for the Virginia dataset and RFES. Each table also shows the percentages of minorities and Caucasian firefighters promoted to officer-level positions of any type and the percentage of executive-level positions each group filled. Table 1 displays the results of the Virginia dataset, and Table 2 shows the results for Richmond. The distribution of positions between the dataset and Richmond were similar, with 25.65 percent of all positions being officer positions of which 4 percent were executive positions. In the Virginia dataset, 26.41 percent of all positions were officer positions, and 4.6 percent were executive-level positions. Caucasians in both groups were promoted at close to the expected rates. Richmond's minorities were promoted at a slightly higher than expected rate for all officer positions (26.95 percent), but at the executive level, they were at 5.8 percent, which is nearly 50 percent more than the expected rate of 4 percent at that level. Minorities in the other Virginia agencies were promoted at lower than expected rates, 16.38 percent at the officer rank and 1.98 percent at the executive level.

Table 1. Position Distribution and Promotion Rates for Caucasians and Minorities in the Virginia Dataset

	Virginia Data Cumulative	Caucasian Firefighters	Minority Firefighters
Total Positions	2,561	2,297	354
% of Officer Positions	26.41%	27.95%	16.38%
% of Executive Positions	4.60%	5.01%	1.98%

Table 2. Position Distribution and Promotion Rates for Caucasians and Minorities in RFES

	RFES	Caucasian Firefighters	Minority Firefighters
Total Positions	425	258	167
% of Officer Positions	25.65%	24.81%	26.95%
% of Executive Positions	4.00%	3.10%	5.39%

**B. ANALYSIS OF DATA RELATED TO WOMEN IN THE VIRGINIA DATA CALL**

Richmond’s overall percentage of women was less than the average of its Virginia counterparts but still higher than the published national average of 4 percent.<sup>147</sup> Richmond’s percentage of women was 6.1 percent compared to 7.8 percent for other career departments in the Virginia dataset. Richmond, however, showed higher rates of promotion for women than its counterparts. Despite being below the average of the dataset for the percentage of total women, Richmond’s numbers improved to 8.25 percent of officer positions being held by women. The officer percentage for the Virginia departments was 5.57 percent and stayed mostly flat with 5.74 percent of executive positions being held by women. Richmond’s numbers made another jump at the executive level, where 23.5 percent of its executive positions were filled by women.

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<sup>147</sup> Corinne Bendersky, “Making U.S. Fire Departments More Diverse and Inclusive,” *Harvard Business Review*, December 7, 2018, <https://hbr.org/2018/12/making-u-s-fire-departments-more-diverse-and-inclusive>.

The trend regarding diminished promotion opportunities for minorities was also true for women. Tables 3 and 4 display the promotion expectancies from the Virginia dataset and RFES. They had the same distribution of positions for each group among male and female firefighters who were promoted. Male firefighters were promoted at or close to the expected rate. Women in the state dataset were promoted below the expected rate of promotion for all officer positions and the executive level. Richmond’s female members were promoted above the expected rate for both categories. Despite a smaller percentage of female firefighters, RFES female firefighters were promoted at a higher rate. This suggests that these women are given opportunities to excel in the work environment, have a large role in the organization despite their small numbers, and affect policies and decision making to improve the work environment.

Table 3. Position and Promotion Rates for Male and Female Firefighters in the Virginia Dataset

	Virginia Data Cumulative	Male Firefighters	Female Firefighters
Total Positions	2,651	2,442	209
% of Officer Positions	26.41%	27.07%	18.66%
% of Executive Positions	4.60%	4.71%	3.35%

Table 4. Position and Promotion Rates for Male and Female Firefighters in RFES

	RFES	Male Firefighters	Female Firefighters
Total Positions	425	399	26
% of Officer Positions	25.65%	25.06%	34.62%
% of Executive Positions	4.00%	3.26%	15.38%

There are factors to consider in examining the difference between Richmond’s history and that of its peers in Virginia. Richmond has been a career department for over 160 years and became integrated early compared to many of its peers. Seven of the nine departments in this dataset had not even been created when RFES hired its first minority

firefighter. Four of the nine did not exist when RFES hired its first female firefighter. The promotion cycle is long for the fire service. The typical time requirement for a department is five years to make lieutenant, 10 years for captain, and 15 years for battalion chief. The years that these departments first hired minorities and women were in the mid-90s, so it may be too early to tell whether the departments in the dataset are giving marginalized groups fair opportunities to succeed and a say in the direction of their organizations. It is hard to evaluate that aspect of the data without the hire and promotion dates of all the firefighters and officers in these organizations. The data do suggest a need for organizations that value diversity to look at other aspects of their workforce demographics to identify issues. Barriers and bias may be preventing men and women in these groups from the advancement opportunities of their Caucasian male counterparts.

### **C. ANALYSIS OF DATA RELATED TO MINORITIES IN THE NATIONAL DATA CALL**

Data from departments outside of Virginia exposed similar trends in the fire service. The departments were more diverse in the minority share compared to the Virginia dataset. Female representation was lower, with women accounting for only 4.5 percent of the total sworn positions. The departments also showed lower percentages of minority and female officers than those of Virginia departments. Moreover, the percentage of minority officers was nearly half that of the departments' total minority membership. These trends held true among the Virginia dataset, but the average year of hire for the first minority was much later in Virginia. Whereas the average year for the first minority hire was 1996 in Virginia, the national departments' average was 1972. There was more time for progress, yet the average year of the first minority executive in these departments was 2002, and two departments have never had a minority executive officer. As a group, the national dataset had some success in hiring diverse workforces as it showed that 22.3 percent of all positions were held by minorities, which is higher than the national average of 18 percent. This suggests that trends in this dataset are most likely comparable to the rest of the fire service.

The communities that the national dataset departments served were more diverse than the Virginia dataset, with an average minority population of 51 percent. Their average minority firefighter share and community minority share point difference was



-31.1 percent. This was close to the Virginia dataset when the less diverse communities were removed. Therefore, as a whole, these communities also had trouble mirroring their communities. The difference between Richmond and this dataset was that the national officer/leadership ranks reflected their communities even less as the level of responsibility increased. Richmond's point differences improved with each increase in responsibility. Not only were its minority leaders visible on scene and in the community, but its top leadership ranks also closely reflected the communities they served.

The biggest difference between RFES and the national dataset was in the expected rate of promotion versus the actual promotions for certain groups. The distribution of positions for the national dataset was 34.9 percent officer positions and 4.9 percent executive-level positions. Just as in the Virginia dataset, non-minorities and men were promoted at higher rates than the expected rate of promotion. Minorities and women were promoted at lower rates than the expected rate of promotion. As shown previously, Richmond stood out in these categories.

The following tables demonstrate the difference in promotion rates for minorities and women. The position distributions were calculated for RFES and the national dataset. This position distribution serves as a guide for the expected promotion rate of anyone in the department. For RFES, approximately 25 percent of positions were officer positions, and 4 percent of all positions were executive-level positions. Ideally, an organization should see a similar distribution of positions among all demographic groups. Table 2 from the previous section shows the overall position distribution as well as the distribution of minorities and Caucasian firefighters for RFES. Table 5 shows the same distributions for the national dataset. The data show the same trend as that in Virginia with minorities being promoted at lower rates than their white counterparts at both the basic officer levels and executive levels.

Table 5. Position Distribution and Promotion Rates for Caucasians and Minorities in the National Dataset

	National Data Cumulative	Caucasian Firefighters	Minority Firefighters
Number total Positions	4,267	2,996	864
% of Officer Positions	34.90%	42.76%	24.07%
% of Executive Positions	4.87%	5.77%	4.05%

**D. ANALYSIS OF DATA RELATED TO WOMEN IN THE NATIONAL DATA CALL**

The female representation in this dataset was lower than in the Virginia dataset, with a female percentage of 4.5 percent, which was close to the national average. The female officer percentage dropped to 2.69 percent, and the female executive percentage was 3.85 percent. Only eight departments answered the question regarding the hiring of their first female firefighter. The average year for the first female hire was 1981. These departments started the journey toward gender integration at relatively the same time as Richmond did. It would be reasonable to assume they would have progressed at the same rate as Richmond. The smaller representation of female officers and executive-level officers compared to the overall female firefighters is difficult to explain. Only four of those eight departments have ever had a female executive-level officer. This pattern suggests that conditions are not suitable for women to succeed in these organizations at the same rate as their male counterparts. Some of the obstacles to success may be similar to those summarized by Jonna West.<sup>148</sup> Her thesis on women in homeland security identifies obstacles to female promotions, some of which included battling stereotypes, a lack of mentorship, inflexible work structures, and time spent away from the job for family obligations.<sup>149</sup>

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<sup>148</sup> Jonna West, “The Road Less Traveled: Exploring the Experiences and Successes of Women Leaders in Homeland Security, (master’s thesis, Naval Postgraduate School, March 2013), 118.

<sup>149</sup> West, 8.

The trends in the data on minorities also showed similar patterns to female integration into the fire service. Table 4 in the previous section shows the distribution of positions in RFES as well as the distribution for men and women. RFES’s numbers are all similar in distribution, which identifies a better promotion percentage for women. Table 6 compares the national data on men and women in the fire service. They have similar distributions for the position distribution and male position distribution. The percentages for women, however, show a much lower percentage of female officers and even fewer women filling the executive officer ranks. The tables in this section identify one of the major findings of this research—even departments that succeed at attracting minorities and women may not be promoting these groups at a rate equal to their counterparts.

Table 6. National Dataset Position Distribution of Men and Women

	National Data Cumulative	Male Firefighters	Female Firefighters
Total Positions	4,267	4,071	196
% of Officer Positions	34.90%	35.59%	20.41%
% of Executive Positions	4.87%	4.91%	4.08%

#### **E. COMPARISONS OF RFES AND BOTH DATASETS**

The analysis of the data call has shown the major differences between RFES and the two datasets. The biggest difference involved promotion data. Figure 1 depicts the trend of minority promotions in RFES and the two datasets. RFES’s data show a baseline for minorities and rising percentages with each level of leadership whereas the other two datasets trend downward as leadership levels increase.

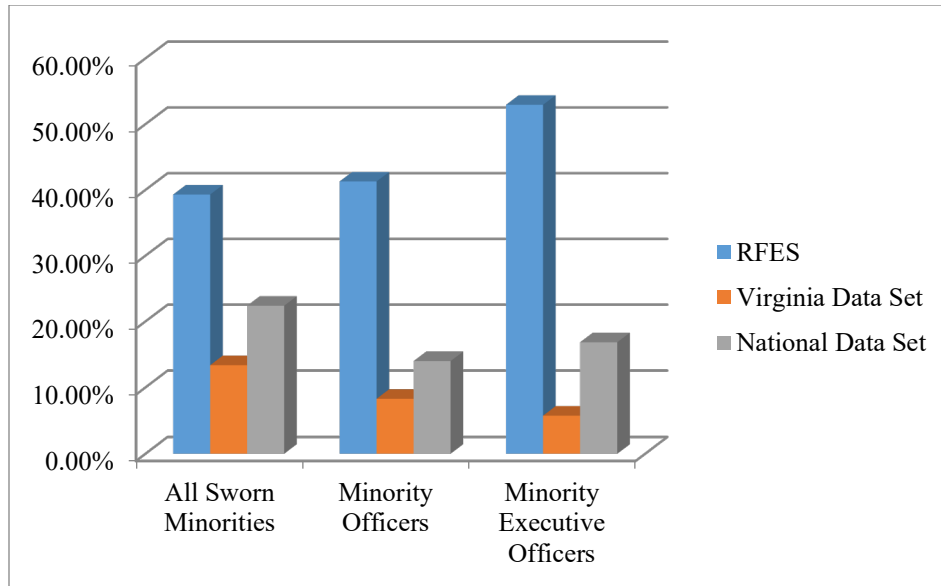


Figure 1. Comparison of Minority Percentages

Figure 2 shows a similar comparison between RFES and the two datasets but identifies the percentages of women in the workforces. The figure depicts a trend similar to that in Figure 1. RFES’s data show an increase in percentages of women in positions as the level of leadership increases. The other two datasets show a downward trend in the percentage of women as leadership levels increase. Ideally, an organization would have an equal or greater percentage of minorities and women throughout all levels of the organization. This problem is compounded by the already lacking representation at the basic demographic levels, and these marginalized groups have even less representation in leadership positions.

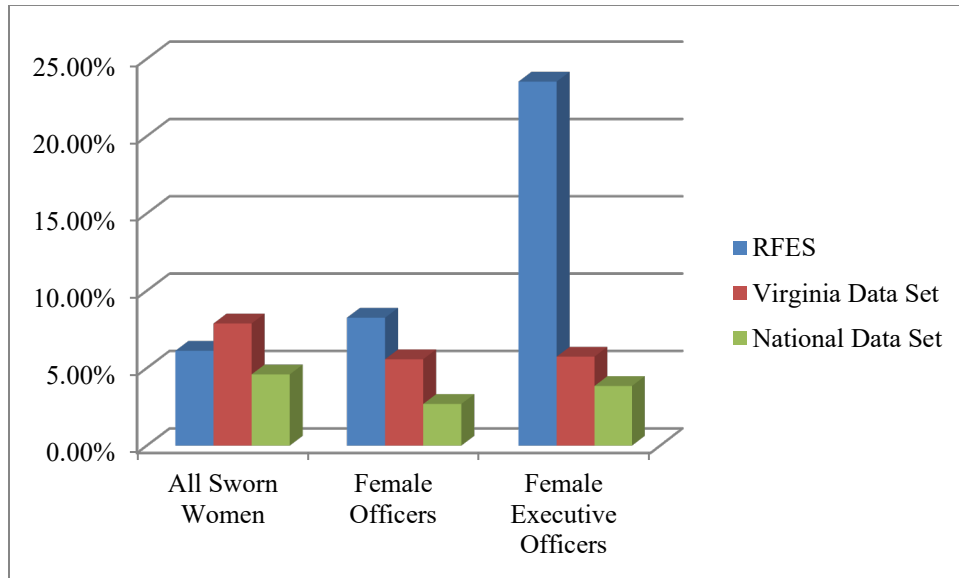


Figure 2. Comparison of Female Percentages

The differences between RFES and its peers are substantial. In terms of minorities, RFES is well above the averages at every level. Diversity has been a point of emphasis in Richmond for almost 70 years, and by examining its numbers, not only the number of sworn minorities, it is evident the organization values diversity and marginalized groups have a say at every level of the organization. The data for women are also interesting because, from the raw numbers, RFES differs little from its peers and is actually lower than the Virginia average. RFES’s numbers rise quickly at the next two levels of leadership as RFES separates itself from the groups in terms of opportunities for women to advance.

The analysis of the quantitative data shows that despite challenges to diversity, the commitment to diversity by the organization has established it as a leader in measurements of basic demographics. Even more revealing is that RFES is achieving diversity in ways that run counter to the trends displayed by its peers in the region and nationally. It is difficult to determine an exact cause for the drastic differences between RFES and the datasets, but it is clear that the organization has created an environment for marginalized groups to succeed that many other organizations have not duplicated.

## VI. CONCLUSION

This chapter summarizes findings from the project and answers the research question. It also provides recommendations to organizations trying to become more diverse or inclusive. This chapter ends with suggested topics for future research that may provide a better understanding of issues with diversity in the fire service and how to correct them.

### A. FINDINGS

The study of Richmond's Department of Fire and Emergency Services has provided several findings that can be used to answer the central research question. The first point is that every city and organization have their own history. Given Richmond's long history, its diversity timeline mirrors many of the civil rights and gender equality movements that have taken place in the last half-century. In evaluating how diversity affects a workforce, it is important to consider this history and use it to frame the state of the organization, the sentiments of its members, and the effects history can have on the organization's culture.

The second thing that this study can teach other members of the fire service is that there is still a large gap in terms of equality in the workplace. If organizations are going to create inclusive environments, then ensuring members of all groups feel they have equal opportunities to succeed is crucial.<sup>150</sup> The quantitative data indicate that minorities and women are hired at lower percentages than the white male population as well as have more difficult paths to leadership opportunities. RFES is different from its peers in this regard. The organization shows its desire to be diverse and inclusive through the opportunities women and minorities have to lead and succeed in the organization. This research does not attempt to identify the cause of this demographic gap, but it does expose a problem in the fire service that has not appeared in previous research. The comparison with the other datasets suggests that it is a widespread issue in the fire service. The lack of research and attention to data suggest there is a greater problem. It suggests that leaders in the fire service

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<sup>150</sup> Ferdman and Deane, *Diversity at Work*, 37–38.

are not tracking or using tools to evaluate their environments beyond basic organizational demographics.

The research about Richmond also reinforces the theory regarding diversity. The organization's history shows that the environment has portrayed the "double-edged sword of diversity."<sup>151</sup> There have been elements of social categorization in the form of tension between various groups in RFES. The Tri-Data report detailed intergroup conflicts and bias, which led to the evaluation of the organization. The TriData study revealed some of the damage of past practices and events. It also showed that by being diverse, RFES was able to harness the benefits of diversity often associated with information/elaboration theory. The citizens of the city were happy with the performance of the fire department, so despite the increased conflict, a culture of service was the overriding moderator of the work environment.<sup>152</sup> Based on this information, it is reasonable to assume that other organizations may experience some of the same conflicts associated with diversity. If these organizations can learn to minimize the situations that contribute to intergroup bias, they can reap the rewards that a diverse workforce provides in the form of increased elaboration and creativity and improved public perception in the communities they serve.

The RFES research also found the role of leadership to be a powerful moderator in an organization's diversity and inclusion. Individual leaders, as well as the collective leadership over decades, helped to shape the workforce in Richmond. The city's government played a role in mandating the importance of diversity many years ago and integrating earlier than many other departments. The leadership of Chief Ronald Lewis saw the roles of minorities expand during his tenure. The department's decision under Chief Robert Creecy to conduct the Building Bridges study was also a key point in the department's history. The study exposed some of the department's deep-rooted, systemic issues and provided a path for improvement that is still being pursued under Chief Melvin Carter. These efforts by leadership to demonstrate the importance of diversity in words and actions have helped to create an organization that is one of the most diverse in the area.

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<sup>151</sup> Milliken and Martins, "Searching for Common Threads," 403.

<sup>152</sup> System Planning Corporation, "Building Bridges."

While some of the qualitative data are outdated and may not fully reflect the feelings of the organization's current members, the quantitative data reveal that RFES is doing many positive things to ensure it continues to be a diverse and inclusive organization.

## **B. RECOMMENDATIONS**

Organizations that are dedicated to creating a more diverse and inclusive work environment can look at certain cues from the research to assess their own organizations. The first is to recognize the history and demographics of the communities they serve. Richmond's unique history as a center of both minority oppression and minority empowerment created an environment that allowed for diversity but contributed to social categorization. The organization had to address some of the negative effects of this social categorization through process and system improvements. It is important to recognize how the history of the community affects the intergroup dynamics of an organization.

The qualitative portion of the study recognized that an organization might reach a point at which an evaluation of diversity culture is needed. The culture of an organization must be monitored for the negative effects of diversity. If there are indicators of social categorization or intergroup conflict, steps should be taken to minimize the obstacles to create an inclusive environment. Creating an inclusive environment may require difficult discussions and a reassessment of organizational policies and processes.

As the quantitative data revealed, it is also important to examine other factors besides basic demographics in an organization. Organizations must look beyond the raw numbers and look into the promotion rates of various groups. A disparity for any group could indicate that the environment is not optimal. Part of this evaluation should include tracking the number of applications received by the demographic groups that are being targeted. If the process is not yielding applications from a certain demographic, it is important to evaluate recruiting efforts and focus on practices that could achieve the desired results. Retention rates are another quantitative indicator of the culture in the organization. Who is leaving? Why are they leaving? How long are they staying? These all can be answered with documentation and exit interviews. The answers to these questions might reveal patterns and obstacles to inclusion in a department.



Another variable that organizations could assess that is not included in this research is the seniority of its members. If deficiencies are detected in promotion rates, identifying the causes might start with the tenure of the focus group. Are women or minorities not being promoted because they do not have enough tenure to qualify for certain positions, or are they not successful in the promotion process? These are all factors to consider in evaluating the effectiveness of an organization's diversity policies and practices.

All of these recommendations point to the necessity for organizations to constantly evaluate themselves. It is difficult for an organization to know where it needs to improve if it does not know where it stands. Regularly looking at various qualitative and quantitative benchmarks can help an organization assess progress and chart a future path for a diverse and inclusive work environment.

### **C. FUTURE RESEARCH**

The research from this case study has answered the central research question but has led to other questions about the fire service. The research reinforced that there are still significant challenges for organizations seeking to become more diverse. It also identified that there is an even larger gap between marginalized groups and their counterparts with regards to promotion opportunities. The research also upheld theories related to diversity, its benefits, and its negative effects on the experience of employees. There could be more done to explore both of these elements as they pertain specifically to the fire service.

The research identified issues with promotion equality, but it did not analyze the cause of this problem. There are explanations that could be further explored. For instance, is this gap a result of a lag in time in grade for minorities and women, who have not met the requirements for promotion? A quantitative study that explored the promotion demographics of an organization, as well as the time in grade of each demographic, might provide an understanding of what is causing women and minorities to be less successful in promotion processes. An exploration of best practices from the processes themselves may also explain some of these differences. It is clear that Richmond has found success in this area, which runs counter to most of the data, but the research does not provide answers as

to how it was achieved. A study into RFES's specific practices might give insight into its success compared to similar organizations.

There should also be a broader collection of data related to fire service demographics. There is little research available other than basic demographic numbers. A larger pool of more comprehensive data could help further identify negative trends and promote the sharing of best practices. The current state of demographics allows organizations to continue with old practices and not be held accountable for progress. The organizations that participated in the study were transparent enough to share their information. This took courage from leadership, especially for organizations whose numbers were below average. These were small samples from a much larger network of organizations. Detailed data from many more organizations would be valuable in understanding the true nature of diversity in the fire service and ways to improve.

Another area of study that could benefit diversity is of job descriptions and qualifications. The changing role of firefighters requires more skills than traditional measurements associated with the career. The physical aspects of the job are still an important part of firefighting, but there is an increased demand for other skills that are useful in fulfilling the mission of the fire service. The increased role in EMS requires a much different set of skills than are needed for firefighting operations. Diversity in society also requires employees with language skills and a broad knowledge of multi-cultural practices and belief systems. Accounting for these changing needs in the required skills and qualifications will be critical to improving fire service delivery in the future. Further study of the nature of job descriptions and hiring processes—and how they could be changed to effectively recruit workforces with these skills—would be a valuable contribution to the fire service.

The study of the effects of diversity on fire service work environments is also an area that could be further explored. Such data are hard to acquire as they would necessitate more qualitative studies of the work environment. The challenges of embedded culture, scheduling, living with co-workers, and the stress of the job create a unique work environment. This environment should be further studied to understand the experiences of marginalized groups in this environment. A study that puts their experiences in words and

stories could be effective in exploring the benefits and challenges of working in that environment.

Further study of job conditions and resistance to women in the fire service is also an important topic to research. Despite their contributions, women remain the most underrepresented demographic in the field. There must be further research on how to better attract a female presence in the industry. Studies on schedule, work–life balance, and motivations for female firefighters might provide insight into recruiting tools and improvements to the work environment that could attract and retain more women. This research would also be helpful in understanding the gap between female firefighters and their male counterparts regarding promotions.

There is still much to learn about how to recruit diverse workforces and create environments that harness the benefits of diversity. Improved demographic reporting, more qualitative studies on the effects of diversity, and focused research on women in the fire service could all have an impact on improving diversity in the fire service. This information could go a long way toward improving the recruitment and promotion opportunities for marginalized groups in a profession that remains largely homogenous.

The City of Richmond’s Department of Fire and Emergency Services has a long history. The diversity in this organization parallels the integration of fire service across the country. Despite facing challenges, the department continues to promote the importance of diversity. The study of this organization reveals the benefits and challenges of diversity whose history involves over 60 years of integration. The comparison between RFES and its peers in Virginia and nationally has revealed discrepancies between organizations and the communities they serve. It also identified a decreased rate of promotion of minorities and women in the datasets—a trend that Richmond has been able to overcome.

I hope that identifying some of these trends will force leaders in the industry to evaluate their own organizations and lead other researchers to study these issues more thoroughly. I also hope it will provide organizations with some tools to evaluate the true success of their efforts to diversify their organizations. This research shows that inequities still exist in the fire service. There is still much that needs to be done to break down barriers

that exist—if the fire service wants to reap the benefits that diversity can provide. This project identifies the need for leaders to evaluate their own organizations and decide whether they are striving to be diverse and inclusive or merely making their demographics appear that way.

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