

# **Allocation of Custodians in Comparable School Districts**

---

Prepared for Arlington Public Schools

The Hanover Research Council examined school districts comparable to Arlington Public Schools in order to compare the various district standards of allocating custodians to school facilities. Comparable schools were chosen based on location, annual budget and general size of the districts.

## National Standards for Allocating Custodians

---

As of 2003, the National Center for Education Statistics in association with the U.S. Department of Education indicated that school standards for area cleaned per custodian in an eight-hour shift ranges from approximately 18,000 to 25,000 square feet. The standard of 18,000 square feet per custodian represents the uppermost standard, generally reserved for restrooms, special education areas, kindergarten areas, or food service areas. The standard of 25,000 square feet represents the normal amount of cleaning required for most school facilities.<sup>1</sup>

The Department of Education also describes the various methods for allocating custodians according to levels of cleanliness:

- ❖ Level one: Indicates “spotless” cleaning, which might be found in a hospital or corporate suite. One custodian should be able to clean 10,000 square feet in an 8-hour period.
- ❖ Level two: Indicates intensive cleaning reserved for areas such as restrooms, special education areas, kindergarten areas, or food service areas. One custodian can clean approximately 11,000 to 18,000 square feet in an 8-hour period.
- ❖ Level three: Indicates a level of cleaning required to ensure the health and comfort of building users. One custodian should be able to clean 19,000 to 25,000 square feet of space in an 8-hour period to this standard.
- ❖ Level four: Not generally acceptable for a school environment. One custodian cleans 26,000 to 46,000 square feet in an 8-hour period.
- ❖ Level five: Not considered healthy. One custodian can clean 47,000 to 80,000 square feet in an 8-hour period.<sup>2</sup>

---

<sup>1</sup> “Facilities Information Management: A Guide for State and Local Education Agencies,” National Center for Education Statistics and the National Cooperative Education Statistics System, July 2003, <http://nces.ed.gov/pubs2003/2003400.pdf>

<sup>2</sup> Ibid

## Regional Standards for Allocating Custodians

---

Regionally, and in districts comparable to the Arlington Public School system, standards for allocating custodians are quite similar to national standards. Square footage standards often play a role in custodian allocation, as does heavy facility usage and high student populations.

This section focuses on custodian allocation standards used in school districts that are considered comparable to Arlington Public Schools. The districts examined here include **Fairfax County Public Schools, Alexandria City Public Schools, Washington County Public Schools, Spotsylvania County Schools, Hanover County Public Schools, and Portsmouth Public Schools.** Information was obtained from each of these districts in order to determine the various methods of allocating custodians to schools; square footage allocation standards; the different standards for elementary schools, high schools and heavily used facilities; and the community's responsibility for covering the costs of custodial expenses in community-use school facilities.

After a brief overview summarizing the information obtained for all districts, we then focus on each district, detailing specific allocation methods and policies.

## Overview

When looking at the various allocation methods at school districts comparable to Arlington Public Schools, multiple districts stated the importance of taking the ratio of custodian per square footage into account. Fairfax County Public Schools uses the most complex custodian staffing formula, taking into account square footage, the number of students and the types of usage present in each facility. Alexandria City Public Schools allocates custodians based on the standard of 20,000 to 22,000 square feet per custodian but also takes into account heavy usage of specific facilities. Washington County Public Schools, while having no explicitly stated square footage standard, stays far below the national and regional average with one custodian per every 17,621 sq. ft. On the other hand, Hanover County Public Schools and Portsmouth Public Schools gave no square footage standards, but instead both averaged over five custodians per school within their district. And Spotsylvania County Schools, as of 2005-2006, had begun to experiment with the outsourcing of custodial duties in order to save the district money. Spotsylvania was averaging the highest ratio of custodian per square foot with each of the district's custodians responsible for an average of 23,181 sq. ft.

Allocation of custodians for high school facilities and heavy use facilities also saw a range of standards among the schools compared. For example, Fairfax County Public Schools allocates a much higher number of custodians to high schools as a standard whereas Alexandria City Public Schools allocates additional custodians on a case-by-case basis, normally adhering to their square footage standards. In Spotsylvania County Schools, the district seems to keep a similar number of custodians at each facility due to the fact that custodians are responsible for higher square footage the higher the level of schooling, with an average of 18,410 square feet per custodian at elementary schools and 32,017 square feet per custodian at high schools.

With regard to community usage of school facilities, five of the six districts compared have policies currently in use stating that the public must pay the fees associated with custodial expenses in order to use the school facilities. Custodian fees vary in price, ranging from \$12.50 to \$52 per custodian per hour. In addition, there are often minimum fees that must also be paid, requiring custodians to be present for a minimum of two to four hours, guaranteeing the cost of custodian fees to be \$50 to \$100 or more. Frequently stated, these fees can only be waived at the principal's or superintendent's request.

## **Fairfax County Public Schools**

*Location:* Falls Church, VA

*District Size:* 206 schools;<sup>3</sup> 163,753 students<sup>4</sup>

*Approximate Total Annual Budget:* \$2.2 billion<sup>5</sup>

### *Custodian allocation methods:*

The number of custodians allocated to each facility is based on a formula that considers student membership; square footage of the permanent building, modular buildings, and instructional trailers; specified teaching positions; and community use of facilities.<sup>6</sup>

### *Square footage standards:*

Specific standards were not available.

### *Specific custodian allocation standards for high schools or heavily used facilities:*

For Fairfax County Public Schools the elementary staffing standard is 3.0-9.0 custodians per school; the middle school staffing standard is 6.5-13.0 custodians per school; the high school staffing standard is 12.5-26.5 custodians per school; and the alternative high school staffing standard is 4.0-8.0 custodians per school.<sup>7</sup>

### *Community compensation and custodian requirements for community-use of school facilities:*

For weekend facility use: Custodians must be paid a minimum of four hours for working overtime with the community-user allowed in the building for only three of those four hours. The custodian always receives payment for one half-hour before the first person arrives and one-half-hour after the last person leaves. (If the user wishes to be in the building for four hours the custodian must be paid for five hours, etc.) This additional time is not for cleanup but for opening and securing the facility before and after the use.<sup>8</sup>

Those using facilities for community-use are responsible for paying for custodial services based on the number of custodians needed, the number of hours needed and the hourly fee, which is determined according to the hourly wage of the custodian.<sup>9</sup>

<sup>3</sup> "Schools and Centers Directory," Fairfax County Public Schools, <http://commweb.fcps.edu/directory/>

<sup>4</sup> "Supergram - FCPS by the Numbers," Fairfax County Public Schools, July 9, 2008, <http://www.fcps.edu/mediapub/publicat/so070908/>

<sup>5</sup> "Approved Budget: FY 2009," Fairfax County Public Schools, <http://www.fcps.edu/fs/budget/documents/approved/2009/ApprovedBudget09.pdf>

<sup>6</sup> "FY 2006 Approved Budget: Appendix," Fairfax County Public Schools, <http://www.fcps.edu/fs/budget/documents/approved/2006/appendix.pdf>

<sup>7</sup> Ibid

<sup>8</sup> "Fairfax County Public Schools Procedures for Long-Term Use by Religious and Cultural Organizations," Fairfax County Public Schools, July 2008, <http://www.fcps.edu/fts/comuse/longtermuse.pdf>

<sup>9</sup> "Application for community use of school facilities and grounds," Fairfax County Public Schools, Aug 2008, <http://www.fcps.edu/dit/forms/adm20.pdf>

## Alexandria City Public Schools

*Location:* Alexandria, VA

*District Size:* 17 schools; approximately 10,200 students<sup>10</sup>

*Approximate Total Annual Budget:* \$202.01 million<sup>11</sup>

*Custodian allocation methods:*

Custodians are staffed based on the industry-wide standard of 20,000 to 22,000 square feet per custodian, with adjustments made to account for specific building use considerations.<sup>12</sup>

*Square footage standards:*

20,000-22,000 sq. feet per custodian

*Specific custodian allocation standards for high schools or heavily used facilities:*

When adding or removing custodians from a facility due to heavier or lighter usage, or when adding custodians for community-use purposes, decisions are made on a case-by-case basis.<sup>13</sup>

*Community compensation and custodian requirements for community-use of school facilities:*

Custodians are required to be present during community-use of facilities. The number of custodians needed depends on the use of the facility, estimated attendance, type of program and weather. The custodian fee for Saturday facility usage is \$42 per hour. The fee is \$52 per hour for Sundays.<sup>14</sup>

The Department of Recreation, the Campagna Center, and the Board of Elections also use ACPS facilities, but no rental or custodian fees are charged to these organizations, which provide a substantial savings to the City of Alexandria.

Revenues collected from rental and custodian fees are deposited in the general operating fund.

---

<sup>10</sup> "Alexandria City Public Schools Projected Enrollment," Alexandria City Public Schools, June 2006, <http://www.acps.k12.va.us/board/enrollment/projected1.pdf>

<sup>11</sup> "FY 2009 Superintendent's Proposed Operating Budget," Alexandria City Public Schools, Dec 2007, [http://www.acps.k12.va.us/budgets/op2009/proposed/op2009\\_proposed\\_intro.pdf](http://www.acps.k12.va.us/budgets/op2009/proposed/op2009_proposed_intro.pdf)

<sup>12</sup> "City Council FY 2008 Budget Questions," Alexandria City Public Schools, Mar 2007, <http://www.acps.k12.va.us/budgets/op2008/citycouncil2.pdf>

<sup>13</sup> "FY 2009 Superintendent's Proposed Operating Budget," Alexandria City Public Schools, Dec 2007, [http://www.acps.k12.va.us/budgets/op2009/proposed/op2009\\_proposed\\_intro.pdf](http://www.acps.k12.va.us/budgets/op2009/proposed/op2009_proposed_intro.pdf)

<sup>14</sup> Ibid

## Washington County Public Schools

*Location:* Hagerstown, MD

*District Size:* 45 schools; 21,401 students<sup>15</sup>

*Approximate Total Annual Budget:* \$259.8 million<sup>16</sup>

*Custodian allocation methods:*

The Washington County Public Schools have 3,066,078 sq. ft. under management and 1,132 acres of land. The Maintenance and Operation budget is \$13.8 million per year, including \$3.6 million in utility costs. The district employs 174 custodians with annual salaries plus benefits of \$5.3 million. Each custodian is responsible for an average 17,621 sq. feet, which is well below the national standards.<sup>17</sup>

*Square footage standards:*

Specific standards were not available.

*Specific custodian allocation standards for high schools or heavily used facilities:*

Specific standards were not available.

*Community compensation and custodian requirements for community-use of school facilities:*

Washington County Public Schools has established a fee schedule for the community-use of school facilities. Depending on the category of community usage of a school facility, custodian fees may be required. The fee to be assessed will be determined by the office granting approval. As it is required that a building administrator or school custodian be on duty when a school building is occupied in order to provide protection for both the occupants and the physical facility, custodian fees cannot be waived by organizations, and all organizations using school facilities must arrange for custodial services through the school principal.<sup>18</sup>

Custodial personnel employed specifically for the organizations' activities will open and close the building and whenever security guards are not required, they will also provide this service. They will be responsible for cleaning the building and grounds and providing general custodial services to the group throughout the duration of the activity. Custodial personnel are also required to be at the facility at least 30 minutes before and after the event as well as being present for the duration of activities. If additional custodial time is needed to return the building and grounds to the original condition, the group sponsoring the activity will be billed for all additional time.

---

<sup>15</sup> "2008-2009 Facilities Fact Sheet: Working Draft," Washington County Public Schools, Nov 2008, [http://www.wcboe.k12.md.us/downloads/Departments/facilities/fact\\_sheet\\_11\\_08.pdf](http://www.wcboe.k12.md.us/downloads/Departments/facilities/fact_sheet_11_08.pdf)

<sup>16</sup> "Approved Operating Budget for the 2008-2009 Academic Year," Washington County Public Schools, 2008, [http://www.wcboe.k12.md.us/downloads/Departments/budget/fy09\\_approved\\_part1.pdf](http://www.wcboe.k12.md.us/downloads/Departments/budget/fy09_approved_part1.pdf)

<sup>17</sup> "Public Information: Facilities Management," Washington County Public Schools, [http://www.wcboe.k12.md.us/content/pi\\_factsforward.cfm](http://www.wcboe.k12.md.us/content/pi_factsforward.cfm)

<sup>18</sup> "Application for Use of Facilities," Washington County Public Schools," May 2007, [http://www.wcboe.k12.md.us/custom\\_pages/495/Main/documents/Application%20for%20use%20of%20facilities.pdf](http://www.wcboe.k12.md.us/custom_pages/495/Main/documents/Application%20for%20use%20of%20facilities.pdf)

Custodian fees are based on categories of usage. The five categories and associated custodian fees are listed below. Additional time includes all overtime hours acquired by custodians (i.e. weekends and additional hours during the school week).

- ❖ Category 1: The School and School Related Groups – no custodian fees are required.
- ❖ Category 2: Youth Groups and Recreation and Parks – Custodian and Utility fees are required if additional time is required, excluding Booster clubs. The custodian fee is \$25.00 per hour of use.
- ❖ Category 3: Tutoring/Instructional – Custodian fee is required if additional time is required. The minimum fee of \$50 for two hours use is required with an additional charge of \$25 for each additional hour.
- ❖ Category 4: Cultural, Recreational, and Community Improvement Groups – Custodian fees are required if additional time is required. The minimum fee of \$100 for four hours use is required with an additional charge of \$25 for each additional hour.
- ❖ Category 5: Profit Making Activities – Custodian fees are required if additional time is required. The minimum fee of \$100 for four hours use is required with an additional charge of \$25 for each additional hour.<sup>19</sup>

---

<sup>19</sup> Ibid



## Spotsylvania County Schools

*Location:* Fredericksburg, VA

*District Size:* 32 facilities; approximately 25,000 students<sup>20</sup>

*Approximate Total Annual Budget:* \$272.6 million<sup>21</sup>

*Custodian allocation methods:*

As of 2005-2006, the district was considering and experimenting with the outsourcing of custodial services in order to save over \$1.7 million annually.

*Square footage standards:*

While there are no stated square foot standards, as of 2005, the district averaged 23,781 square feet per custodian.

*Specific custodian allocation standards for high schools or heavily used facilities:*

Elementary schools averaged 18,410 square feet per custodian; middle schools averaged 24,010 square feet per custodian; high schools averaged 32,017 square feet per custodian; and administrative sites averaged 17,136 square feet per custodian.

*Community compensation and custodian requirements for community-use of school facilities:*

Details on the community-use of facilities included no information on community compensation for custodial expenses.

---

<sup>20</sup> "School Bond Referendum," Spotsylvania County Schools, Nov 2006, [http://spotsylvania.k12.va.us/2006\\_Bond/School\\_Bond\\_Video\\_Text.pdf](http://spotsylvania.k12.va.us/2006_Bond/School_Bond_Video_Text.pdf)

<sup>21</sup> "Spotsylvania County Schools Approved School Budget 2008-2009," Spotsylvania County Schools, Feb 2008, [http://www.spotsylvania.k12.va.us/Budget/2008-2009\\_Budget/Approved\\_School\\_Board\\_Budget\\_FY09.pdf](http://www.spotsylvania.k12.va.us/Budget/2008-2009_Budget/Approved_School_Board_Budget_FY09.pdf)

## Hanover County Public Schools

*Location:* Ashland, VA

*District Size:* 23 schools; approximately 20,000 students<sup>22</sup>

*Approximate Total Annual Budget:* \$217.9 million<sup>23</sup>

*Custodian allocation methods:*

In 2007, the district had 118 custodians, which were compensated over \$2.8 million in wages and benefits. The district averaged over five custodians per facility.

*Square footage standards:*

Specific standards were not available.

*Specific custodian allocation standards for high schools or heavily used facilities:*

Specific standards were not available.

*Community compensation and custodian requirements for community-use of school facilities:*

Members of the community that use school facilities must pay a custodian fee of one and a half times the custodian's current hourly wage (\$12.50 minimum), per hour of usage. The school principals will determine the need for custodian fees. This charge for the services of custodial, cafeteria, and/or school administration personnel depends on the type of activities for which the facility is being utilized. Payment for personnel service is made to the school in which the activity is being held.

The custodian fee is determined annually and payment is required for a minimum of two hours. A custodian is required to be on duty for all non-school activities. For most meetings it will be necessary for the custodian to be on duty prior to the time the meeting is scheduled to prepare the facilities for use. The organization using the facility will be charged for all extra time used beyond the custodian's regular schedule, including all additional time necessary for opening, securing and closing the facility.<sup>24</sup>

---

<sup>22</sup> "Human Resources: District Information," Hanover County Public Schools," Dec 2008,  
[http://hanover.k12.va.us/human\\_resource/district.htm](http://hanover.k12.va.us/human_resource/district.htm)

<sup>23</sup> "2008-2009 School Budget," Hanover County Public Schools,  
[http://hanover.k12.va.us/finance/budget/2008-09\\_Budget\\_files/FY09\\_Budget\\_Document.pdf](http://hanover.k12.va.us/finance/budget/2008-09_Budget_files/FY09_Budget_Document.pdf)

<sup>24</sup> "Policy 2-4.1: Community Use of School Facilities," Hanover County Public Schools, Jul 2002,  
<http://hanover.k12.va.us/policymanual/CommRela/COMMREL-4.htm#COMMUNITY%20USE%20OF%20SCHOOL%20FACILITIES>

## **Portsmouth Public Schools**

*Location:* Portsmouth, VA

*District Size:* 26 facilities; approximately 15,250 students<sup>25</sup>

*Approximate Total Annual Budget:* \$169.9 million<sup>26</sup>

*Custodian allocation methods:*

In 2008, the district had 134 custodians, which were compensated over \$5 million in wages and benefits.<sup>27</sup> The district averaged over five custodians per facility.

*Square footage standards:*

Specific standards were not available.

*Specific custodian allocation standards for high schools or heavily used facilities:*

Specific standards were not available.

*Community compensation and custodian requirements for community-use of school facilities:*

School organizations such as school-sponsored student organizations, PTA-related activities, school employee groups, neighborhood civic organizations, neighborhood little leagues, United Way organizations, class reunion activities, and any departments of the City, State or Federal governments will not be charged a rental fee for using facilities. These organizations will, however, be responsible for payment of fees for custodial and/or cafeteria services or other extra personnel. Groups requesting use of facilities for profit activities (fundraiser, etc.) will be required to pay all associated fees. Rental of facilities by large groups of organizations, which require the services of more than one custodian, will result in additional personnel fees. Fees for custodial or cafeteria services or extra personnel cannot be waived, unless authorized by the superintendent.<sup>28</sup>

Custodial services requested on holidays will require an additional overtime compensation fee. And all fees are determined on a per hour basis with the operations staff determining the costs.<sup>29</sup>

---

<sup>25</sup> "Portsmouth Public Schools," Portsmouth Public Schools, <http://pps.k12.va.us/>

<sup>26</sup> "Fiscal Year 2008 Adopted Budget," City of Portsmouth, <http://www.portsmouthva.gov/finance/2008budget/14%20Education.pdf>

<sup>27</sup> "Budget for 2008-2009," Portsmouth Public Schools, May 2008, [http://pps.k12.va.us/uploadedFiles/About/Departments/Budget\\_and\\_Planning/2008-09%20Annual%20Budget.pdf](http://pps.k12.va.us/uploadedFiles/About/Departments/Budget_and_Planning/2008-09%20Annual%20Budget.pdf)

<sup>28</sup> "Rental of School Facilities," Portsmouth City Public Schools, Sept 2006, <http://pps.k12.va.us/assets/501EDDCE-6745-47EF-B5F6-F4B4F2F0C59B.pdf>

<sup>29</sup> "Agreement of Rental for School Facility," Portsmouth Public Schools, Oct 2006, <http://pps.k12.va.us/assets/92807FE3-1C8B-4738-8B4A-607B0A72266A.pdf>

## Regional Allocation of Maintenance and Custodial Employees

---

Over the past decade multiple statistics have been collected from the region of northern Virginia on the subject of custodian allocation, cost per student, allocation per student, and allocation per square foot. In 1999, research covering the counties of Alexandria, Arlington, Fairfax, Loudoun, Montgomery and Prince William compared the costs and allocation methods of these school districts while looking at working conditions of operations and maintenance staff.<sup>30</sup> Though nearly a decade old, this is the most recent and in-depth study available on the subject of custodian allocation for the region.

The chart on the following page displays the public school student enrollment, budgeted maintenance expenditures, total operating budget, number of school buildings, and square footage of buildings. It also looks at maintenance expenditures, maintenance staff and custodial staff per student and per square foot for each county's school district.

When compared to these regional districts, Arlington Public Schools ranked 5<sup>th</sup> out of the six districts when compared in the categories of enrollment, number of school buildings, total square footage of interior space and total operating budget. Also, APS had the lowest budgeted maintenance expenditures and the lowest maintenance costs as a percentage of their total budget.

APS ranked 4<sup>th</sup> in the number of maintenance employees, with two districts having fewer, and 5<sup>th</sup> in the number of custodians, with only one district having fewer employed.

When looking at maintenance and custodial employees per student and per square foot, APS ranked 2<sup>nd</sup> in the number of students per maintenance employee, with only one district having fewer students per employee, and APS ranked 3<sup>rd</sup> in the number of students per custodian, with two schools having a lower student to custodian ratio. Per square foot, APS ranked 5<sup>th</sup> in square footage per maintenance employee, with only one district having a larger ratio, and APS had the largest square footage per custodian ratio.

In terms of maintenance expenses, APS had the 2<sup>nd</sup> highest expense for maintenance expenditures per student and the second lowest expense for maintenance expenditures per square foot.

---

<sup>30</sup> "A Review of Working Conditions for Maintenance, Trades, Custodial, Warehouse, and Food Services Employees in the Fairfax County Public Schools," Fairfax County School Board Auditor, June 1999, <http://www.fcps.edu/schlbdr/reports/School%20Board%20Auditor%20Reports/A%20Review%20of%20Working%20Conditions%20for%20Maintenance,%20Trades,%20Custodial,%20Warehouse,%20and%20Food%20Services%20Employees%20in%20FCPS%20-%20June%202014,%201999.pdf>

Maintenance Statistics Around the Region – Fiscal Year 1999							
	Alexandria	Arlington	Fairfax	Loudoun	Montgomery	Prince William	Regional Average
Enrollment	10,803	18,855	152,769	26,091	127,918	52,621	<b>64,843</b>
Budgeted Maintenance Expenditures	\$4,862,785	\$3,921,009	\$21,419,367	\$4,321,604	\$20,030,629	\$9,253,298	<b>\$10,634,782</b>
Maintenance Expenditures per Student	\$450	\$208	\$140	\$166	\$157	\$176	<b>\$216</b>
Total Operating Budget	\$109,729,874	\$221,892,055	\$1,210,710,615	\$176,477,161	\$1,017,700,000	\$352,740,254	<b>\$514,874,993</b>
Maintenance Costs as percent of Total Budget	4.4%	1.8%	1.8%	2.4%	2.0%	2.6%	<b>2.5%</b>
Number of School Buildings	18	30	208	55	183	70	<b>94.0</b>
Sq. Footage of Interior Space	1,700,000	3,500,000	21,700,000	3,850,000	17,407,500	5,984,246	<b>10,828,349</b>
Maintenance Expenditures per sq. foot	\$2.86	\$1.12	\$0.99	\$1.12	\$1.15	\$1.55	<b>\$1.76</b>
Number of Maintenance Employees	42	67	423	47	341	143	<b>177</b>
Number of students per Maintenance Employee	257	281	362	555	375	368	<b>366</b>
Sq. footage per Maintenance Employee	40,476	52,239	51,361	81,915	51,048	41,846	<b>63,777</b>
Number of Custodians	83	156	1,211	218	1,072	310	<b>508</b>
Number of Students per Custodian	130	121	126	120	119	170	<b>128</b>
Sq. footage per Custodial Employee	20,482	22,436	17,919	17,701	16,238	19,304	<b>18,955</b>

Source:

<http://www.fcps.edu/schlbd/reports/School%20Board%20Auditor%20Reports/A%20Review%20of%20Working%20Conditions%20for%20Maintenance,%20Trades,%20Custodial,%20Warehouse,%20and%20Food%20Services%20Employees%20in%20FCPS%20-%20June%202014,%201999.pdf>

## Note

This brief was written to fulfill the specific request of an individual member of The Hanover Research Council. As such, it may not satisfy the needs of all members. We encourage any and all members who have additional questions about this topic – or any other – to contact us.

## Caveat

The publisher and authors have used their best efforts in preparing this brief. The publisher and authors make no representations or warranties with respect to the accuracy or completeness of the contents of this brief and specifically disclaim any implied warranties of fitness for a particular purpose. There are no warranties which extend beyond the descriptions contained in this paragraph. No warranty may be created or extended by representatives of The Hanover Research Council or its marketing materials. The accuracy and completeness of the information provided herein and the opinions stated herein are not guaranteed or warranted to produce any particular results, and the advice and strategies contained herein may not be suitable for every member. Neither the publisher nor the authors shall be liable for any loss of profit or any other commercial damages, including but not limited to special, incidental, consequential, or other damages. Moreover, The Hanover Research Council is not engaged in rendering legal, accounting, or other professional services. Members requiring such services are advised to consult an appropriate professional.