



COMMONWEALTH of VIRGINIA

Department of Health
P O BOX 2448
RICHMOND, VA 23218

Karen Shelton, MD
State Health Commissioner

TTY 7-1-1 OR
1-800-828-1120

December 11, 2024

MEMORANDUM

TO: The Honorable L. Louise Lucas
Chair, Senate Finance and Appropriations Committee

The Honorable Luke E. Torian
Chair, House Appropriations Committee

FROM: Karen Shelton, MD
State Health Commissioner, Virginia Department of Health

SUBJECT: Allocation method for labor costs associated with
Chesterfield County Fire and EMS personnel participating in Med-
Flight I Transports to Virginia Trauma Centers

This report is submitted in compliance with the Virginia Acts of the Assembly – Chapter 2 of the 2024 Virginia Acts of the Assembly, Special Session I – Item 272(B)(2), which states:

2. The Office of Emergency Medical Services shall determine an amount of funding for each hospital, eligible for funding from the Trauma Center Fund, that receives patients through Virginia State Police's (VSP) med-flight operations in the Richmond area in order to support the paramedics or flight nurses provided by Chesterfield County. The Office shall take into account the overall costs of such paramedics or flight nurses, excluding any direct state appropriation, and determine a cost allocation for the hospital based on their share of the total number of VSP med-flight patients transported to the hospital for the prior fiscal year. Effective July 1, 2025, the amount assessed for a hospital shall reduce the amount of the hospital's Trauma Center Fund payment for the fiscal year. The Office shall transfer the assessed amount from the Trauma Center Fund to Chesterfield County as appropriate during the fiscal year. The Office of Emergency Medical Services shall provide a report to the Chairs of the House Appropriations and

Senate Finance and Appropriations Committees by October 1, 2024, describing their planned cost allocation pursuant to this paragraph.

Should you have any questions or need additional information, please feel free to contact me at (804) 864-7030.

KS/RCL
Enclosure

Pc: The Honorable Janet V. Kelly, Secretary of Health and Human Resources

ALLOCATION METHOD FOR LABOR COSTS ASSOCIATED
WITH CHESTERFIELD COUNTY FIRE AND EMS PERSONNEL
PARTICIPATING IN MED-FLIGHT I TRANSPORTS TO
VIRGINIA TRAUMA CENTERS

REPORT TO THE GENERAL ASSEMBLY

2024



VIRGINIA DEPARTMENT OF HEALTH

PREFACE

Item 272(B)(2) of Chapter 2 of the 2024 Acts of Assembly, Special Session I, mandates the Virginia Department of Health Office of Emergency Medical Services to determine an amount of funding for each hospital, eligible for funding from the Trauma Center Fund, that receives patients through Virginia State Police's (VSP) med-flight operations in the Richmond area in order to support the paramedics or flight nurses provided by Chesterfield County. The Office shall take into account the overall costs of such paramedics or flight nurses, excluding any direct state appropriation, and determine a cost allocation for the hospital based on their share of the total number of VSP med-flight patients transported to the hospital for the prior fiscal year. Effective July 1, 2025, the amount assessed for a hospital shall reduce the amount of the hospital's Trauma Center Fund payment for the fiscal year. The Office shall transfer the assessed amount from the Trauma Center Fund to Chesterfield County as appropriate during the fiscal year. The Office of Emergency Medical Services shall provide a report to the Chairs of the House Appropriations and Senate Finance and Appropriations Committees by October 1, 2024, describing their planned cost allocation pursuant to this paragraph.

REPORT CONTRIBUTORS

Virginia Department of Health

R. Christopher Lindsay, Chief Operating Officer

Office of Emergency Medical Services

Rachel Stradling, Acting Director

Cam Crittenden RN, Deputy Director of Trauma and Administration

Jessica Rosner, DrPH, Epidemiology Program Manager

TABLE OF CONTENTS

Preface..... **i**
 Report Contributors..... i
Table of Contents..... **ii**
Executive Summary **iii**
Introduction **1**
 Report Mandate 1
 Report Outline 1
Med-Flight I..... **2**
Methodology **2**
 Data Query Methodology 2
Findings **3**
Appendix A – Item 272(B)(2) of Chapter 2 of the 2024 Acts of Assembly, Special Session I **7**
Appendix B – Acronyms and Abbreviations **8**
Appendix C – Med-Flight I Transports to Virginia Trauma Centers by Type of Incident, 2023..... **9**
Appendix D – Med-Flight I Transports by Destination, 2023 (All hospitals regardless of Trauma Center status) **10**
Appendix E - Med-Flight I Transports by Type of Incident, 2023 (All hospitals, regardless of Trauma status)..... **11**
Appendix F – Incident Type Key..... **12**

EXECUTIVE SUMMARY

Chesterfield County Fire and EMS (CFEMS) provides the clinical staff for the Med-Flight I Virginia State Police (VSP) helicopter servicing the Richmond area based in Chesterfield County. Chesterfield County funds the clinical labor for the Med-Flight I program using paramedics from CFEMS. Language in the FY 2025-2026 Virginia budget bill directs the Virginia Department of Health Office of Emergency Medical Services (OEMS) to allocate a portion of the Virginia Trauma Center Fund to Chesterfield County to cover the costs of the clinical staffing for Med-Flight I. The Budget language directs OEMS to take into consideration any direct allocations to CFEMS for clinical labor in effect. Currently there is an annual appropriation of \$450,000 to CFEMS for the Paramedic staffing attached to Med-Flight I. The budget language further directs the OEMS to develop an allocation model as to how those funds would be moved from the Trauma Fund, and the hospitals receiving patients from Med-Flight transport. Data used to compile this report was sourced from Med-Flight I patient data, CFEMS estimated labor cost, and the OEMS Trauma Fund.

INTRODUCTION

REPORT MANDATE

Item 272(B)(2) of Chapter 2 of the 2024 Acts of Assembly, Special Session I, mandates the Virginia Department of Health Office of Emergency Medical Services to determine an amount of funding for each hospital, eligible for funding from the Trauma Center Fund, that receives patients through Virginia State Police's (VSP) med-flight operations in the Richmond area in order to support the paramedics or flight nurses provided by Chesterfield County. The Office shall take into account the overall costs of such paramedics or flight nurses, excluding any direct state appropriation (currently \$450,000 in FY 2025 and FY 2026), and determine a cost allocation for the hospital based on their share of the total number of VSP med-flight patients transported to the hospital for the prior fiscal year. Effective July 1, 2025, the amount assessed for a hospital shall reduce the amount of the hospital's Trauma Center Fund payment for the fiscal year. The Office shall transfer the assessed amount from the Trauma Center Fund to Chesterfield County as appropriate during the fiscal year. The Office of Emergency Medical Services shall provide a report to the Chairs of the House Appropriations and Senate Finance and Appropriations Committees by October 1, 2024, describing their planned cost allocation pursuant to this paragraph.

REPORT OUTLINE

This report provides a brief history and pertinent contextual information about Med-Flight I, followed by a review of the methodology used to determine the projected Virginia Trauma Fund payments for 2025. The findings section of the report includes several tables demonstrating past Med-Flight I transports, expenses related to CFEMS paramedics, as well as projected payments from the Trauma Center Fund in 2025.

MED-FLIGHT I

Med-Flight I is stationed in Chesterfield County, Virginia, and transports patients in Central Virginia from both the 9-1-1 pre-hospital setting, as well as intra-facility when there is a higher level of care needed in a clinical setting. Med-Flight I also participates in search and rescue and other law enforcement activities. The clinicians on Med-Flight I, all paramedics, are employees of Chesterfield County Fire and EMS (CFEMS). These paramedics participate in all activities that Med-Flight-I is involved in, including search and rescue and law enforcement.

This report provides a list of Virginia's Trauma Centers that receive patients transported by Med-Flight I. It considers all patient transports, including both Trauma and Medical patients, as there is no delineation in the budget language for patient type.

METHODOLOGY

A hypothetical model was created showing the effect of the referenced budget language on the Trauma Fund payments to these individual Trauma Centers. The actual Trauma Fund payout for FY 2024 was matched with pre-hospital data on Med-Flight I transports to Virginia's Trauma Centers. This transport data was used to calculate percentages of total Med-Flight I patients received by each Center, which determined the percentages of the labor cost that would be covered by their respective payments from the Trauma Fund using CFEMS projected FY 2025 labor cost data. Each Trauma Center is listed with its actual FY 2024 payment, as well as the projected FY 2026 payment, based on its percentage of Med-Flight I patients received and their projected portion of the CFEMS payment.

This payment model will be incorporated for FY 2026. The Med-Flight I transport data for the previous calendar year will be applied to the payout for the current year Trauma Fund payments.

DATA QUERY METHODOLOGY

- Data system = Virginia Pre-hospital Information Bridge
- EMS Agency = Med-Flight I
- Unit Notified by Dispatch between 1/1/23 and 12/31/23
- Type of Service Requested = Emergency Response (Primary Response Area) or Hospital-to-Hospital Transfer
- Unit Disposition = Patient Contact Made
- Patient Evaluation/Care Disposition = Patient Evaluated and Care Provided
- Crew Disposition = Initiated and Continued Primary Care
- Transport Disposition = Transport by This EMS Unit (This Crew Only)

FINDINGS

Introduction

The following tables show the number of Med-Flight I transports to Virginia Trauma Centers in calendar year 2023, Virginia State Police (VSP) projected CFEMS Paramedic and Flight Nurse expenses by fiscal year, and payment projections by hospital from the Virginia Trauma Fund in 2025.

Table 1

Table 1 lists the Virginia Trauma Centers that received patients transported by the Med-Flight I program in calendar year 2023. VCU Health received 126 patient transports, accounting for 59.2% of the total 2023 Med-Flight I transports. HCA's Chippenham Hospital received 78, amounting to 36.6%. The remaining hospitals listed received the remaining transports as listed.

Table 1 - Med-Flight I Transports to Virginia Trauma Centers, CY 2023

Hospital Name	# Transports	% Transports
VCU Health Systems	126	59.2%
HCA Chippenham Hospital	78	36.6%
Centra Lynchburg General Hospital	3	1.4%
Sentara Norfolk General Hospital	2	0.9%
HCA Henrico Doctors' Hospital	2	0.9%
Bon Secours Southside Medical Center	2	0.9%
Total	213	100.0

Table 2

Table 2 outlines the CFEMS Expense Projection by fiscal year. Chesterfield County Fire and EMS provided the labor costs in the table above. The estimated labor costs to staff the Med-Flight I program will be \$1,309,996 in FY 2025, with further detail provided totaling that amount. The FY 2025 estimated labor costs for CFEMS Med-Flight I staff is used in this report to determine the impact to the Trauma Fund to staff Med-Flight I. After removing the \$450,000 annual appropriation, the estimated amount to be paid out from the Trauma Fund will be \$859,996 in FY 2025 and \$924,430 in FY 2026.

Table 2 - VSP Med-Flight I CFEMS Expense Projection by Fiscal Year

Costs Associated with Med-Flight I Clinical Staffing	FY 2025	FY 2026
Half Time	\$16,997	\$17,913
Training	\$22,019	\$22,941
Equipment & Uniforms	\$33,777	\$34,790
Minimum Staffing	\$117,588	\$125,273
Benefits	\$328,122	\$342,961
Salary	\$791,493	\$830,552
Total Projected Cost for Med-Flight I Clinical Staffing	\$1,309,996	\$1,374,430
General Fund Direct Appropriation <i>(2024 Special Session I Item 416)</i>	<i>(\$450,000)</i>	<i>(\$450,000)</i>
Total Projected Cost from Trauma Fund	\$859,996	\$924,430

Table 3

Table 3 lists each Virginia Trauma Center receiving patients transported by Med-Flight I, the total that each of those hospitals received in Trauma Fund payments for FY2024, the total that would be removed from each hospital's 2025 Trauma Fund payment based on their percentage of the total Med-Flight I patients transported to all Virginia Trauma Centers, and their projected 2025 Trauma payment after their respective portion of the total Med-Flight I labor costs was removed from their funding. The final column indicates the corresponding expected change in that facility's Trauma Fund payout after removing the portion that would go towards Chesterfield County.

Table 3 - Virginia Trauma Fund Payment Projections

Hospital Name	TF Payment (FY24)	CY 2023 Med-Flight I Transports, # (%)	Med-Flight I Payment (FY 2025 projection)	TF Payment to Trauma Centers after CFEMS payout (2025 projection)	% Change in TF Payment to Trauma Centers after CFEMS payout (2025 projection)
VCU Health Systems	\$1,671,494	126 (59.2)	(\$508,730)	\$1,162,764	(30.44%)
HCA Chippenham Hospital	\$571,046	78 (36.6)	(\$314,928)	\$256,118	(55.15%)
Centra Lynchburg General Hospital	\$279,044	3 (1.4)	(\$12,113)	\$266,931	(4.34%)
Sentara Norfolk General Hospital	\$1,011,847	2 (0.9)	(\$8,075)	\$1,003,772	(0.80%)
HCA Henrico Doctors' Hospital	\$181,019	2 (0.9)	(\$8,075)	\$172,944	(4.50%)
Bon Secours Southside Medical Center	\$177,496	2 (0.9)	(\$8,075)	\$169,421	(4.50%)
Total	\$3,891,946	213 (100.0)	(\$859,996)	\$3,031,950	(22.10)

Conclusion

This report considers an allocation model to project the total effects of Item 272(B)(2) of Chapter 2 of the 2024 Acts of Assembly on Virginia's Trauma Fund and the corresponding reduction in annual payments to Virginia's Trauma Centers. Using projected labor cost data provided by Chesterfield County and Med-Flight I transport data from the past year, a model was developed to project the allocation of those labor costs to Virginia Trauma Centers receiving Med-Flight I patient transports. This model projects that payments to Virginia Trauma Centers will reduce in FY26 by 22.1%, with most of that cost going to VCU Health (annual Trauma Fund payment reduced by 30.43%) and HCA's Chippenham Hospital (annual Trauma Fund payment reduced by 55.15%).

**APPENDIX A – ITEM 272(B)(2) OF CHAPTER 2 OF THE 2024 ACTS OF ASSEMBLY, SPECIAL
SESSION I**

2. The Office of Emergency Medical Services shall determine an amount of funding for each hospital, eligible for funding from the Trauma Center Fund, that receives patients through Virginia State Police's (VSP) med-flight operations in the Richmond area in order to support the paramedics or flight nurses provided by Chesterfield County. The Office shall take into account the overall costs of such paramedics or flight nurses, excluding any direct state appropriation, and determine a cost allocation for the hospital based on their share of the total number of VSP med-flight patients transported to the hospital for the prior fiscal year. Effective July 1, 2025, the amount assessed for a hospital shall reduce the amount of the hospital's Trauma Center Fund payment for the fiscal year. The Office shall transfer the assessed amount from the Trauma Center Fund to Chesterfield County as appropriate during the fiscal year. The Office of Emergency Medical Services shall provide a report to the Chairs of the House Appropriations and Senate Finance and Appropriations Committees by October 1, 2024, describing their planned cost allocation pursuant to this paragraph.

APPENDIX B – ACRONYMS AND ABBREVIATIONS

This is a listing of the acronyms and abbreviations appearing throughout the report and its appendices.

CFEMS - Chesterfield County Fire and EMS

HCA – HCA Healthcare

VCU – Virginia Commonwealth University

VSP – Virginia State Police

APPENDIX C – MED-FLIGHT I TRANSPORTS TO VIRGINIA TRAUMA CENTERS BY TYPE OF INCIDENT, CY 2023

Hospital Name	Type of Incident	# Transports	% Transports
VCU Health Systems	Trauma	39	18.3
	Non-Trauma	87	40.8
HCA Chippenham Hospital	Trauma	45	21.1
	Non-Trauma	33	15.5
Centra Lynchburg General Hospital	Trauma	0	0.0
	Non-Trauma	3	1.4
Sentara Norfolk General Hospital	Trauma	2	0.9
	Non-Trauma	0	0.0
HCA Henrico Doctors' Hospital	Trauma	0	0.0
	Non-Trauma	2	0.9
Bon Secours Southside Medical Center	Trauma	0	0.0
	Non-Trauma	2	0.9
Total		213	100.0

The table above lists every Virginia Trauma Center that received patients transported by Med-Flight I in calendar year 2023. Med-Flight I transports all patient types, both trauma and non-trauma.

APPENDIX D – MED-FLIGHT I TRANSPORTS BY DESTINATION, CY23 (ALL HOSPITALS REGARDLESS OF TRAUMA CENTER STATUS)

Hospital Name	# Transports	% Transports
VCU Health Systems	126	53.2
HCA Chippenham Hospital	78	32.9
HCA Johnston Willis Hospital	14	5.9
Bon Secours St. Mary's Hospital	6	2.5
Centra Lynchburg General Hospital	3	1.7
Out of State Hospital Not Listed	2	0.8
Sentara Norfolk General Hospital	2	0.8
HCA Henrico Doctors' Hospital	2	0.8
Bon Secours Southside Medical Center	2	0.8
VCU Health Tappahannock Hospital	1	0.4
Bon Secours Westchester Emergency Center	1	0.4
Total	237	100.0

The table above lists all destinations for Med-Flight I patient transports in calendar year 2023, which includes both Virginia Trauma Centers, non-trauma centers, and out of state transport destination.

APPENDIX E - MED-FLIGHT I TRANSPORTS BY TYPE OF INCIDENT, CY23 (ALL HOSPITALS, REGARDLESS OF TRAUMA STATUS)

Type of Incident	# Transports	% Transports
Trauma	87	36.7
Neurological	76	32.1
Cardiovascular	45	19.0
Generalized	19	8.0
Respiratory	4	1.7
Integumentary	2	0.8
Digestive	1	0.4
Infection	1	0.4
Endocrine	1	0.4
Urinary	1	0.4
Total	237	100.0

The table above lists all patient conditions transported by Med-Flight I in calendar year 2023, including all trauma and medical dispositions.

APPENDIX F - INCIDENT TYPE KEY

- Neurological = seizures, strokes, comas, paralysis, etc.
- Cardiovascular = hypertension, chest pain, STEMIs, etc.
- Generalized = pain, heat exhaustion, cancers, weakness, etc.
- Respiratory = COPD, respiratory disorder, apnea, etc.
- Integumentary = hemorrhage, sunburn
- Digestive = hematemesis, melena
- Infection = sepsis
- Endocrine = diabetes, other endocrine disorders
- Urinary = unspecified urinary problem