

Atlanta Network Distribution Center — Postal Vehicle Service Operations

Audit Report

July 24, 2012



Atlanta Network Distribution Center — Postal Vehicle Service Operations

Report Number NL-AR-12-007

BACKGROUND:

U.S. Postal Service network transportation using Postal Service vehicles and employees is referred to as Postal Vehicle Service (PVS). This report focuses on the Atlanta GA Network Distribution Center's (NDC), PVS truck driver operations. Our objectives were to assess trailer loading practices at selected NDCs and determine whether staffing of PVS truck driver operations was efficient, effective, and economical.

PVS operations at NDCs include yard operations where PVS drivers use specific trucks to move trailers and equipment in or around a facility yard. The operations require timely unloading of mail from trailers as they arrive at the facility and the timely loading of mail into trailers for direct movement from the facility yard. The process avoids unnecessary movement and placement of trailers in the yard.

WHAT THE OIG FOUND:

Atlanta NDC staff were effectively unloading mail from trailers as they arrived at the facility yard, but PVS drivers were not efficiently moving trailers in the facility yard. This occurred because management did not consistently follow the NDC loading policy for outbound trailers when possible. Specifically, instead of having trailers pulled directly from dock doors to leave the facility, PVS drivers were

placing, or 'spotting' them in the yard for subsequent movement from the facility. In addition, managers did not adhere to the productivity standard of 40 trailer moves per day in the yard for PVS drivers. As a result, PVS drivers performed more truck moves and expended more driver workhours than necessary. We estimate the Postal Service could reduce 8,730 driver workhours and save about \$347,000 annually.

WHAT THE OIG RECOMMENDED:

We recommended the vice president, Capital Metro Area Operations, ensure that Atlanta NDC managers follow prescribed standard operating procedure for movement of trailers in the yard and periodically assess PVS spotter truck driver workload and staffing. We also recommended the reduction of 1,746 annual workhours associated with eliminating about 200 moves in the yard per week. Finally, we recommended the elimination of 6,984 annual workhours associated with improving PVS productivity to about 40 trailer moves in the yard per day.

Link to review the entire report



Date: July 24, 2012

MEMORANDUM FOR: DAVID C. FIELDS

VICE PRESIDENT, CAPITAL METRO AREA OPERATIONS

E-Signed by Robert Batta
VERIFY authenticity with e-Sign

FROM: Robert J. Batta

Deputy Assistant Inspector General

for Mission Operations

SUBJECT: Audit Report – Atlanta Network Distribution Center – Postal Vehicle

Service Operations – (Report Number NL-AR-12-007)

This report presents the results of our audit of Atlanta Network Distribution Center Postal Vehicle Service Operations (Project Number 12XG008NL000).

We appreciate the cooperation and courtesies provided by your staff. If you have any questions or need additional information, please contact Jody J. Troxclair, director, Transportation, or me at 703-248-2100.

Attachments

cc: David E. Williams, Jr. Cynthia F. Mallonee Pamela S. Grooman

Corporate Audit and Response Management

TABLE OF CONTENTS

Introduction	1
Conclusion	2
Live Loading/Unloading Practices	2
Postal Vehicle Service Yard Move Productivity	2
Recommendations	3
Management's Comments	4
Evaluation of Management's Comments	4
Appendix A: Additional Information	5
Background	5
Objectives, Scope, and Methodology	6
Prior Audit Coverage	7
Appendix B: Detailed Analysis of Live Loading Practices	8
Appendix C: Detailed Analysis of Tractor Trailer Operator Work Load	9
Appendix D: Monetary and Other Impacts	10
Appendix E: Management's Comments	11

Introduction

This report focuses on Atlanta Network Distribution Centers (NDC) Postal Vehicle Service (PVS) truck driver operations and related trailer loading (and unloading) practices. The objectives of our audit were to assess loading practices at selected NDCs and determine whether staffing of PVS transportation operations was efficient, effective, and economical. This self-initiated audit addresses operational risk. See Appendix A for additional information about this audit.

U.S. Postal Service network transportation using Postal Service vehicles and employees is referred to as PVS. Because PVS operations are local, they are managed at the facility level under guidance from district, area, and headquarters transportation officials. PVS activities at NDCs include yard operations, which is the movement of trailers and equipment in or around a facility yard (spotting), typically to and from the facility dock doors. This movement of trailers is performed by PVS drivers using spotter trucks¹ (see Figure 1) below.



Figure 1. Spotter Trucks at Atlanta NDC

Source: U.S. Postal Service Office of Inspector General (OIG), May 6, 2012.

NDCs are tasked with 'live unloading' and 'live loading' of all arriving and departing mail transportation trailers. Live unloading is when the highway contract route (HCR) or PVS driver brings a trailer directly to a dock door for unloading when it enters the facility, and live loading is when the HCR or PVS driver takes a loaded trailer directly from the dock and out of the facility yard. In either case, the trailer is not placed in the yard (or spotted) for movement at a later time. Not spotting trailers in the yard ensures mail flow to the

¹ Spotters are heavy duty trucks used to move trailers within an NDC yard operation.

next operation or facility without delay and reduces total operating expenses at the same time. ²

The Atlanta NDC has a staff of 13 PVS drivers responsible for an average of 1,851 moves per day servicing 122 dock doors.

Conclusion

Atlanta NDC officials could more effectively manage trailer loading practices, increase staffing efficiency for PVS spotter truck operations, and reduce unnecessary driver workhours. We found management did not consistently follow the 'live loading' policy for outbound trailers when possible. Instead of moving trailers directly from the dock door and out the facility, PVS drivers were placing or 'spotting' them in the yard for subsequent movement from the facility.

In addition, for the remaining necessary trailer moves, managers did not adhere to the productivity standards of 40 trailer moves in the yard per day for PVS drivers. As a result, the PVS drivers performed more spotter truck moves and used more driver workhours than necessary. We estimate the Postal Service could reduce driver workhours by 8,730 and save about \$347,000 annually.

Live Loading/Unloading Practices

The Atlanta NDC staff was effectively unloading inbound mail from trailers as they arrived at the facility yard as required. On the other hand, trailers at the outbound docks were not pulled directly from the dock door and out of the facility yard by the HCR driver. Instead, the trailers were moved to the yard by PVS spotter truck drivers. Because of this practice, the Atlanta NDC was conducting more spotter moves than necessary. The Postal Service policy³ for dispatching vehicles at NDC facilities states that all dispatches will be 'live loaded.' We concluded that if management consistently followed the policy, they could eliminate about 200 moves per week in the yard, thereby reducing 1,746 annual workhours and saving about \$69,410 over 1 year. See Appendix B for a detailed analysis of this topic.

Postal Vehicle Service Yard Move Productivity

Atlanta NDC management could make operations more efficient by holding PVS drivers to a standard of 40 moves⁴ per workday for each driver. Specifically, in 2005, the Postal Service's Breakthrough Productivity Initiative⁵ established productivity standards for NDC PVS operations, specifying that drivers (tractor-trailer operators) are expected

² Standard Operating Procedures Live Loading and Unloading of Trailers at Network Distribution Centers.

³ Standard Operating Procedures Live Loading and Unloading of Trailers at Network Distribution Centers.

⁴ A move consists of moving trailers and equipment from one location to another in the NDC yard.

⁵ The Breakthrough Productivity Initiative was initiated to drive costs out of the Postal Service while creating continuous improvement capability.

to complete 40 trailer moves within an 8-workhour period. One driver can accomplish 200 trailer moves within a NDC yard during a 40-workhour week.⁶

We found that Atlanta NDC PVS drivers were averaging about 24 moves per workday. Furthermore, we conducted observations and analyzed operational workload data⁷ and confirmed that established productivity standards were reasonable and attainable for PVS drivers at the facility. Productivity standards were not met, because NDC managers did not fully assess workload and staffing requirements. If productivity was set at the standard of 40 moves per day, the Capital Metro Area could phase out about 6,984 annual workhours and save about \$277,642 over one fiscal year. See Appendix C for our detailed analysis of this topic.

Recommendations

We recommended the vice president, Capital Metro Area Operations, require that Atlanta Network Distribution Center management:

- 1. Follow prescribed Postal Service standard operating procedures for movement of trailers in the yard.
- Periodically assess Postal Vehicle Service spotter truck driver workload and staffing requirements with respect to productivity standards to maintain appropriate staffing levels.
- 3. Eliminate 1,746 annual workhours associated with reducing about 200 spotter moves per week by implementing live load procedures.
- 4. Eliminate 6,984 annual workhours associated with improving Postal Vehicle Service truck driver productivity to the Breakthrough Productivity Initiative standard of 40 moves per day, or 200 moves per week.

-

⁶ Headquarters and senior area transportation managers have explained that this productivity standard was reasonable and appropriate.

⁷ Our analysis also included PVS driver workhours associated with the Surface Transfer Center (STC), which is also housed at the NDC facility.

Management's Comments

Management generally agreed with our findings and recommendations. They stated the pre-load process is necessary and the Atlanta NDC does not have sufficient staging space of mail to allow for all Atlanta NDC trips to be 'live' loaded. Management stated they will increase 'live' loads to the maximum extent possible to capture additional PVS driver workhour savings. They agreed to continue to review the 'live' load process and identify opportunities to increase the percentage of 'live' loads. They indicated the Atlanta NDC transportation manager will conduct annual efficiency reviews of the PVS operations. Management also agreed to reduce PVS driver hours because of increased productivity and has confirmed three positions have been eliminated from the Atlanta NDC. See Appendix E for management's comments, in their entirety.

Evaluation of Management's Comments

The OIG considers management's comments responsive to the recommendations in the report. The actions initiated by management resulted in the elimination of three positions and addresses the issues identified in the report. We are encouraged by management's plan for continual analysis to attain efficiency and further reduce workhours.

The OIG considers all recommendations significant, and therefore requires OIG concurrence before closure. Consequently, the OIG requests written confirmation when corrective actions are completed. These recommendations should not be closed in the Postal Service's follow-up tracking system until the OIG provides written confirmation that the recommendations can be closed.

Appendix A: Additional Information

Background

PVS Operations: Postal Service surface network transportation that uses Postal Service vehicles and employees is called PVS. Management typically assigns PVS vehicles and personnel to Postal Service network facilities, such as NDCs or processing and distribution centers in or near metropolitan areas. PVS operations typically include yard operations where spotter trucks move or 'spot' trailers and equipment in or around a facility yard, typically an NDC yard. PVS is capital- and personnel-intensive. Nationwide, PVS capital assets include about 2,154 cargo vans, 1,814 tractors (including spotter tractors), and 3,892 trailers. PVS involves about 7,700 employees, including 6,597 drivers, 575 administrative support personnel, and 548 managers. The American Postal Workers Union represents PVS drivers and support personnel.

The Atlanta NDC has a staff of 13 PVS drivers responsible for an average of 1,851 moves per day servicing 122 dock doors.



Figure 2. Spotter Truck Moving Trailer in the Atlanta NDC Yard

Source: OIG, May 6, 2012.

<u>Live Loading and Unloading Process:</u> An essential component of the NDC network is the live unloading of trailers as they arrive at the facility and the live loading of trailers for direct movement from the facility yard.⁸ The process avoids unnecessary movement and placement (spotting) of trailers in the yard and reduces overall transportation times and handling costs. Outgoing mail received at Tier 1 NDCs from local processing facilities is containerized separately and must be unloaded and transferred to the Tier 2

⁸ Service Talk #2 Live Loading and Unloading of Trailers at Network Distribution Centers – service talk used to communicate information on the conversion of bulk mail centers (BMCs) into NDCs to NDC employees. It explains that an essential component of this new NDC network is the live loading and unloading of trailers as they arrive at the facility and identifies specific roles and responsibilities.

NDC in time to be processed and dispatched into the network. This requires the live unloading of originating trailers and the live loading of trailers for the Tier 2 NDCs. Queuing and staging of trailers for unloading at a later time may result in delays and service failures.

Objectives, Scope, and Methodology

The objectives of our audit were to assess loading practices at selected NDCs and determine whether staffing of PVS transportation operations was efficient, effective, and economical. During our work, we interviewed Postal Service officials at headquarters and the Atlanta NDC. We reviewed relevant Postal Service policies and procedures, interviewed managers and employees, and observed and photographed operations.

We extracted reports from the Yard Management System (YMS)¹⁰ that detailed all outbound dispatches at the Atlanta NDC for a 2-week period. We analyzed this data to determine whether the facility had a further opportunity to live load its outbound dispatches. We based this analysis on the Postal Service policy, *Standard Operating Procedures Live Loading and Unloading of Trailers at Network Distribution Centers*. We also obtained computer-generated data from the Vehicle Tracking Analysis and Performance System (VTAPS)¹¹ for the Atlanta NDC that included a consecutive 17-week period from September 1 through December 31, 2011. This data represented the PVS yard operational workload (moves) for the period for all operations at the Atlanta NDC, including STC move data. We identified 31,467 yard moves. We examined this workload with previously established Postal Service productivity standards of 40 moves per day for NDC PVS spotter driver operations.

We assessed the reliability of YMS and VTAPS data. We validated data from the YMS system as it pertains to spotter moves in the yard at the Atlanta NDC. We observed spotters moving trailers within the yard and compared that to the YMS spotter move report for the same period. We concluded the data were accurate and reliable. We also verified the accuracy of the data through discussions with Postal Service officials knowledgeable about the data and the system that produced the data. We determined that the data were sufficiently reliable for the purposes of this report.

We conducted this performance audit from December 2011 through July 2012 in accordance with generally accepted government auditing standards and included such tests of internal controls as we considered necessary under the circumstances. Those standards require that we plan and perform the audit to obtain sufficient, appropriate evidence to provide a reasonable basis for our findings and conclusions based on our audit objectives. We believe that the evidence obtained provides a reasonable basis for

⁹ Tier 1 Sites distribute local and destination Standard Mail, Periodicals, and Package Services for the Tier 1 service area. Tier 2 Sites include Tier 1 responsibilities and the distribution of outgoing Standard Mail, Periodicals, and Package Services for assigned Tier 1 sites.

¹⁰ YMS is an automated system that tracks vehicles through a facility yard.

¹¹ VTAPS manages vehicle operations by providing real-time actionable information, effective vehicle tracking and control utilities, and flexible access to data required to evaluate and improve vehicle operations. Interface will provide times schedule, drop ship, and times data for use in VTAPS.

our findings and conclusions based on our audit objectives. We discussed our observations and conclusions with management on May 31, 2012, and included their comments where appropriate.

Prior Audit Coverage

Report Title	Report Number	Final Report Date	Monetary Impact (In millions)	Report Results
Postal Vehicle Service Transportation – Philadelphia Bulk Mail Center	NL-AR-09-005	7/17/2009	\$4.3	Management should verify the removal of 3,500 workhours and phase out an additional 8,750 workhours agreed to during our audit. Management should also periodically assess PVS workload and staffing requirements to maintain appropriate staffing levels. Management agreed with our findings and recommendations.
Postal Vehicle Service Transportation – Washington Network Distribution Center	NL-AR-10-007	8/4/2010	\$2.8	Management should verify the phasing out of 6,968 agreed-upon workhours. In addition, NDC managers need to periodically assess PVS workload and staffing requirements to maintain appropriate staffing levels. Management agreed with our findings and recommendations.

Appendix B: Detailed Analysis of Live Loading Practices

After conducting our observations at the Atlanta NDC, we extracted a historical outbound trip report from YMS that detailed all of the outbound dispatches being made by the facility for a 2-week period to determine whether trips could be live loaded given time constraints. Using this report, we compiled a list of trips and sorted by dock door to see what time trips were departing from a specific door. If there was more than 1 hour between trips leaving from the same door, we determined the trips were candidates for live loading. We then considered other factors, including the percentage of load on each trip and dock space for staging mail for subsequent trips. Based on our analysis of live loading, we determined that about 94 percent of the outbound trips can be live loaded at the facility as shown in Table 1.

Table 1. Atlanta NDC Outbound Trip Analysis

Date	Total Trips	Trips That Could be Live Loaded
Thursday, March 8, 2012	37	34
Friday, March 9, 2012	35	31
Saturday, March 10, 2012	32	30
Sunday, March 11, 2012	20	19
Monday, March 12, 2012	30	28
Tuesday, March 13, 2012	26	26
Wednesday, March 14, 2012	33	31
Thursday, March 15, 2012	32	29
Friday, March 16, 2012	36	33
Saturday, March 17, 2012	33	31
Sunday, March 18, 2012	21	21
Monday, March 19, 2012	35	33
Tuesday, March 20, 2012	24	24
Wednesday, March 21, 2012	31	29
Total Potential Live Loads Identified in 2 Weeks	425	399
Percentage of Trips with Potential to be Live Loaded		94%

Source: OIG.

Appendix C: Detailed Analysis of Tractor Trailer Operator Work Load

The Atlanta NDC has 13 tractor trailer operator (TTO) drivers over three tours who are responsible for moving trailers around the Atlanta NDC yard with spotter trucks. The work includes movement of trailers for operations of the NDC as well as operations associated with the surface transfer center also housed at the facility.

We reviewed all yard moves associated with both operations within a 4-month period from September 1 to December 31, 2011. We examined 31,467 yard moves over 122 days. After analyzing the moves, we determined that each TTO driver moved an average of 24 moves per day. The national standard for yard moves is 40 moves per day (see Table 2).

Table 2. Average Moves per Driver per Day

2011 Month	Total Moves	Days in Month	Drivers ¹²	Average Move Per Driver Per Day
September	8,200	30	11	24.8
October	7,955	31	11	23.3
November	7,384	30	11	22.4
December	7,928	31	11	23.2
TOTAL	31,467	122	11	23.4

Source: OIG.

¹² We used 11 drivers in our review and not the 13 drivers at the NDC, because two were not driving because of administrative reasons.

Appendix D: Monetary Impacts

We concluded that Atlanta NDC management could phase out 8,730 workhours by following established productivity standards and performing live loads. This would save the Postal Service \$347,052 over 1 year, as reflected in Table 3.

Table 3. PVS Potential Savings

Recommendation	Impact Category	20% (or 2-Year Savings)	1-Year Total (10% of 10 Years)
3. Live Load	Funds Put to Better Use	\$138,821	\$69,410
4. Productivity	Funds Put to Better Use	555,284	277,642
Total		\$694,105	\$347,052

Source: OIG.

Total Excess Workhours and Associated Cost Reductions Findings: We employed a 10-year cash flow methodology, discounted to present value, by applying the following factors published by Postal Service Headquarters Finance. We then took 20 percent of the total to represent the savings for 2 years, as shown in Table 4.

Table 4. Highlights from 10-Year Cash Flow

Cost Category	FY 2012 ¹³ Total (Phased In)	FY 2013 (Annual) Total	10-Year Total (FYs 2012 to 2021)	20% (or 2-Year Savings)
Personnel - Live Load	\$37,903	\$77,171	\$694,105	\$138,821
Personnel - Productivity	151,612	308,682	2,776,419	555,284
Total	\$189,515	\$385,853	\$3,470,524 ¹⁴	\$694,105

Source: OIG.

Table 5. Discount Rate/Escalation Factor for Computing Monetary Impact

Rates by Type ¹⁵	Factor
Discount Rate/Cost of Borrowing	2.6%
Labor Escalation Rate	1.8%

Source: OIG.

¹³ The FY 2012 figure is conservative to allow for phase-in of workhour reductions during the year.
 ¹⁴ Slight difference in total due to rounding.
 ¹⁵ Rates published November 23, 2011.

Appendix E: Management's Comments

AREA VICE PRESIDENT
CAPITAL METRO AREA OPERATIONS



July 6, 2012

Lucine M. Willis Director, Audit Operations

SUBJECT: OIG Draft Audit Report – Atlanta Network Distribution Center –
Postal Vehicle Service Operations – (Report Number NL-AR-12-DRAFT)

The Capital Metro Area has reviewed the OIG Draft Audit Report – Postal Vehicle Service Operations – Atlanta Network Distribution Center – (Report Number NL-AR-12-DRAFT) and concurs with the general deficiencies of the OIG Audit Team. We agree in principle that a monetary impact exists and commit to capturing potential savings through implemented efficiencies.

<u>Recommendation #1:</u> Follow prescribed Postal Service Standard Operating Procedures for Live Loading of trailers.

Management Response: PVS operations at the NDC include yard operations where PVS drivers use special trucks to move or "spot" trailers and equipment in or around a facility yard. The Atlanta NDC does not "live load" mail into trailers for direct movement from the facility yard on all schedules. Approximately 90 percent of the outbound NDC trailers are pre-loads. The "Pre-Load" process is necessary due to the ongoing processing of mail during a 24-hour period. Having all or 94 percent of trailers pulled directly from dock doors to leave the facility could cause a negative effect on Atlanta NDC operations and affect service. The Atlanta NDC does not have sufficient staging space for mail to allow for all NDC trips to be "live" loaded. The NDC can achieve 10 percent "live" loading based upon the unique circumstances at the NDC.

<u>Recommendation #2:</u> Periodically assess PVS spotter truck driver workload and staffing requirements with respect to productivity standards to maintain appropriate staffing levels.

<u>Management Response:</u> Capital Metro Area concurs with the findings and recommendation. The Atlanta NDC Transportation Manager will conduct annual efficiency reviews of the PVS operations as outlined in Handbook PO-701. A copy of the annual review will be provided to the Capital Metro Area Distribution Network Office to document compliance with this requirement.

MAILING ADDRESS: 16501 SHADY GROVE ROAD GAITHERSBURG MD 20898-9998 301-548-1410 FAX: 301-548-1434 Recommendation #3: Eliminate 1,746 annual workhours associated with reducing approximately 200 spotter moves per week by implementing live load procedures.

Management Response: The Atlanta NDC will review operations and increase "live" loads to the maximum extent possible in order to capture additional savings opportunity from the "Live Load" process. Due to space constraints with staging of mail, we do not believe Atlanta can effectively facilitate the recommended 94 percent "Live" loads from the NDC. We will continue the 10 percent "live" loading currently in place and review to identify additional opportunity to increase this process.

Recommendation #4: Eliminate 6,984 annual workhours associated by improving PVS truck driver productivity to the BPI standard of 40 moves per day, or 200 moves per week.

Management Response: Capital Metro Area concurs with the recommendation that savings opportunities exist by increasing PVS driver productivity to the BPI standard of 40 moves per day or 200 per week. Because the Atlanta NDC TO drivers had not been allocated solely to "spotter" activities during the review period, and were being used for such tasks as transporting mail to P&DCs, Mail Recovery Center of Atlanta, and retrieving empty equipment from Atlanta Stations. The other activities being performed skewed the productivity and prevented drivers from achieving the required 40 moves per day. The Capital Metro Area has confirmed that three spotter positions have been eliminated from the NDC transportation schedules in accordance with the recommendation. Using the National Transportation BPI annual workhour calculation, this equates to 5,238 annual workhour savings. The Atlanta NDC Transportation Manager will cease the use of drivers from activities outside the facility and will provide Capital Metro Area periodic productivity analysis to support continued productivity improvement.

This report and management's response do not contain information that may be exempt from disclosure under the FOIA.