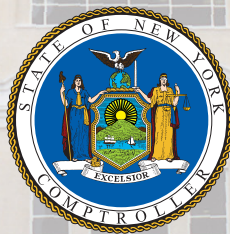




# Metropolitan Transportation Authority New York City Transit Authority Recycling Program

Report 2008-S-141



Thomas P. DiNapoli



# Table of Contents

	Page
Authority Letter .....	5
Executive Summary .....	7
Introduction .....	9
Background .....	9
Audit Scope and Methodology .....	11
Authority .....	11
Reporting Requirements .....	12
Contributors to the Report .....	12
Audit Findings and Recommendations .....	13
Recycling Program .....	13
Reporting .....	13
Recommendations .....	14
Agency Comments .....	15



# State of New York Office of the State Comptroller

---

## Division of State Government Accountability

August 26, 2010

Mr. Jay Walder  
Chairman and Chief Executive Officer  
Metropolitan Transportation Authority  
347 Madison Avenue  
New York, NY 10017

Dear Chairman Walder:

The Office of the State Comptroller is committed to helping State agencies, public authorities and local government agencies manage government resources efficiently and effectively and, by so doing, providing accountability for tax dollars spent to support government operations. The Comptroller oversees the fiscal affairs of State agencies, public authorities and local government agencies, as well as their compliance with relevant statutes and their observance of good business practices. This fiscal oversight is accomplished, in part, through our audits, which identify opportunities for improving operations. Audits can also identify strategies for reducing costs and strengthening controls that are intended to safeguard assets.

Following is a report of our audit of *MTA-New York City Transit, Recycling Program*. This audit was performed pursuant to the State Comptroller's authority under Article X, Section 5 of the State Constitution and Section 2803 of the Public Authorities Law.

This audit's results and recommendations are resources for you to use in effectively managing your operations and in meeting the expectations of taxpayers. If you have any questions about this report, please feel free to contact us.

Respectfully submitted,

*Office of the State Comptroller  
Division of State Government Accountability*





# State of New York

## Office of the State Comptroller

---

### EXECUTIVE SUMMARY

#### **Audit Objective**

The objective of our audit was to determine whether the Metropolitan Transportation Authority (MTA) New York City Transit (Transit) operates a recycling program that is in compliance with applicable State and local laws and Executive Orders.

#### **Audit Results - Summary**

The MTA is responsible for establishing a recycling program as outlined in section 2878-b of the Public Authorities Law as amended by the Solid Waste Management Act of 1988 (Act), and Executive Order 4 (EO 4). Additionally, the MTA was encouraged to undertake waste reduction and recycling efforts by Executive Order 142 (EO 142). We found the MTA's Transit has a recycling program that substantially complies with the applicable governance.

Waste generated by subway commuters is recycled after collection by a refuse vendor under contract with Transit. We visited the recycling facility where Transit waste is separated and observed that cardboard, newspaper, plastic, cans and paper were being recycled. Transit contracts for removal of scrap items such as various metals, lead batteries, waste oil, and miscellaneous parts, equipment and buses, for which Transit receives revenue. We found compliance with recycling requirements at nine selected Transit locations that we toured, but noted several instances of non-compliance with recycling requirements at two locations.

The MTA has assigned a Coordinator and two assistants to serve as the Sustainability and Green Procurement Coordinator (Coordinator) in compliance with EO 4. Additionally, in September 2007, the MTA established a Blue Ribbon Commission on Sustainability and the MTA (Commission). The final report was issued in February 2009. This report calls for introduction of source separation of waste collected in the subway. However, Transit has not taken action to implement this and needs to do so as part of its formal recycling program.

Under EO 142, the MTA was "urged" to submit annual reports on its recycling efforts. We found that the MTA submitted the reports for fiscal years 2005-06 and 2006-07. The 2007-08 report was not submitted because EO 4 was issued in April 2008. EO 4 required the MTA to begin reporting its recycling efforts by August 31, 2009. MTA provided a copy of its EO 4 report subsequent to the end of our audit fieldwork.

Our audit report contains three recommendations directed toward improving Transit's recycling program. Transit officials replied to our draft report that they agree with our recommendations and have already taken action.

This report, dated August 26, 2010, is available on our website at: <http://www.osc.state.ny.us>.

Add or update your mailing list address by contacting us at (518) 474-3271 or

Office of the State Comptroller

Division of State Accountability

110 State Street, 11<sup>th</sup> Floor

Albany, NY 12236



## Introduction

### Background

New York State has a long history of encouraging the reduction and recycling of solid waste materials. Two decades ago, the State enacted the Solid Waste Management Act of 1988 (L 1988, ch 70) (Act), which laid out the priorities of the State’s solid waste management policy:

- Reducing the amount of waste generated;
- Maximizing the amount of waste that is reused or recycled;
- Recovering as much energy as possible from what cannot be reused or recycled; and
- Disposing of the remaining solid waste appropriately.

The Act required State agencies and public authorities to source separate their solid waste (i.e. to separate waste at the point it is discarded such as putting recyclable items such as paper, metal, glass, plastics, etc. into one container, and other non-recyclable items such as food, soiled items, etc. into another container). In addition, municipalities throughout the State were required to pass their own local ordinances or legislation requiring source separation of solid waste, whether it is left out for collection or delivered to a solid waste management facility. Consequently, public benefit corporations located within these municipalities are required to comply with their recycling laws.

In January 1991, the Governor issued Executive Order 142 (9 NYCRR 4.142) (EO 142) on *Establishing New Waste Reduction and Recycling Initiatives for State Agencies*, thereby reaffirming the State’s commitment to reduce and recycle waste. Under EO 142, State agencies were required to source separate paper and other products from their waste stream. Public authorities, such as the MTA, were “urged” to undertake programs consistent with EO 142.

In April 2008, the Governor issued Executive Order 4 (9 NYCRR 7.4) (EO 4) on *Establishing a State Green Procurement and Agency Sustainability Program*. EO 4 created the Interagency Committee on Sustainability and Green Procurement (Committee), comprised of the heads of 12 State agencies and public authorities. EO 4 requires each State agency and public authority to designate a Sustainability and Green Procurement Coordinator and develop a comprehensive Sustainability and Environmental Stewardship Program (Program). EO 4 builds upon the requirements of EO 142 (which it superseded), in that each agency’s Program must to the extent practicable provide for source separation of its waste to maximize the amount of paper,

metal, glass and plastic that is recycled. Technical assistance is available for agencies from the New York State Office of General Services, the New York State Department of Environmental Conservation, the Environmental Facilities Corporation and the New York State Energy Research and Development Authority. Beginning August 31, 2009, State agencies and public authorities were required to submit an annual report to the Committee that will, in turn, provide a summary report to the Governor.

The MTA is a public-benefit corporation chartered by the New York State Legislature in 1965. The MTA is North America's largest mass transit network, serving 14.7 million people across a 5,000 square mile region. The MTA provides over 8.5 million passenger trips daily. The MTA is governed by a 17-member Board nominated by the Governor of New York and confirmed by the New York State Senate. The MTA consists of seven constituent agencies including Capital Construction Company, Bridges and Tunnels, Metro-North Railroad, New York City Transit, MTA Bus, Long Island Bus, and Long Island Rail Road.

In September 2007 the MTA established a Blue Ribbon Commission on Sustainability and the MTA (Commission). The Commission was charged with developing a master plan for the MTA's sustainability goals, initiatives and practices. The Commission's mission was to expand the MTA's contribution to regional and national sustainability, while reducing and managing MTA's energy consumption, carbon emissions, waste, water use, and other elements of the MTA's ecological footprint. The Commission established sustainability work groups, including the Materials Flow Group which covered procurement, waste management and recycling efforts. In February 2009, the Commission issued its final report titled Greening Mass Transit & Metro Regions: Final Report of the Blue Ribbon Commission on Sustainability and the MTA. The report contained nearly 100 recommendations outlining tools for reducing and managing its ecological footprint, including 14 in the area of Materials Flow.

Transit operates 26 subway routes that provide service to 468 subway stations in four boroughs, and Staten Island Railway that links 22 communities. In 2008, annual ridership was about 1.6 billion passengers. Transit also provides bus service on 200 local and 30 express routes in all five boroughs, and provides para-transit services throughout New York City to provide transportation to people with disabilities. Bus ridership during 2008 was over 746 million. Transit has about 47,000 employees, and its 2008 budget was about \$7.9 billion.

Transit reported that in 2008 it recycled 77,949 tons of the 109,297 tons of waste generated, including 7,815 tons of subway cars disposed of at sea in

reef projects. Transit reported receiving \$8.4 million in revenue from the sale of recycled waste.

### **Audit Scope and Methodology**

We audited the Transit recycling program from April 1, 2005 through October 27, 2008 to determine whether it is in compliance with applicable State laws and local laws, as well as Executive Orders. To accomplish our objective, we reviewed the Act, EO 142, EO 4, section 2878-b of the Public Authorities Law, and laws for the City of New York. We met with Transit officials and reviewed supporting documentation to confirm and enhance our understanding of Transit's recycling program. We visited a sample of two administrative locations (Central Revenue Offices, three of 12 floors at 130 Livingston Avenue), three maintenance facilities (Grand Avenue, Jerome Avenue, 239<sup>th</sup> Street), a bus depot (Amsterdam), and three subway refuse platforms (207<sup>th</sup> Street, 239<sup>th</sup> Street, Corona) where refuse is gathered for removal by train. We also observed the operation of a train collecting refuse from the refuse platforms. In addition, we visited a recycling facility where Transit waste is brought for post collection recycling. We selected the locations we visited to achieve a cross section of facility types.

We conducted our performance audit in accordance with generally accepted government auditing standards. 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 our findings and conclusions based on our audit objectives.

In addition to being the State Auditor, the Comptroller performs certain other constitutionally and statutorily mandated duties as the chief fiscal officer of New York State. These include operating the State's accounting system; preparing the State's financial statements; preparing the State's financial statements; and approving State contracts, refunds, and other payments. In addition, the Comptroller appoints members to certain boards, commissions and public authorities, some of who have minority voting rights. These duties may be considered management functions for purposes of evaluating organizational independence under generally accepted government auditing Standards. In our opinion, these management functions do not affect our ability to conduct independent audits of program performance.

### **Authority**

The audit was performed pursuant to the State Comptroller's authority as set forth in Article X, Section 5 of the State Constitution and Section 2803 of the Public Authorities Law.

**Reporting  
Requirements**

A draft copy of this report was provided to Transit officials for their review and comment. Their comments were considered in the preparation of this final report and are included at the end of this report along with the State Comptroller's Comments addressing certain items in Transit's response.

Within 90 days of the final release of this report, as required by Section 170 of the Executive Law, the Chairman of the Metropolitan Transportation Authority shall report to the Governor, the State Comptroller, and the leaders of the Legislature and fiscal committees, advising what steps were taken to implement the recommendations contained herein, and if not implemented, the reasons why.

**Contributors  
to the Report**

Major contributors to this report were Carmen Maldonado, Robert Mehrhoff, Anthony Carbonelli, Joseph Smith, Daniel Bortas, and Jean Estime.

## Audit Findings and Recommendations

### Recycling Program

As a constituent agency of the MTA, Transit is responsible for establishing a recycling program as outlined in EO 4, section 2878-b of the Public Authorities Law as amended by the Act, and local laws. We found that Transit has instituted a recycling program that is substantially in compliance with the Act, EO 4 and applicable local laws. Transit's recycling program requires employees to source separate recyclable items such as paper, cardboard, metal, glass and plastic. Waste generated by subway commuters is recycled after collection by a refuse vendor under contract with Transit. We visited the recycling facility where Transit waste is processed and observed that cardboard, newspaper, plastic, cans and paper were being recycled. Employees at Transit repair facilities are also required to separate additional items for recycling, such as scrap rail, subway wheels, batteries, waste oil, light bulb sand bus tires.

We toured selected Transit facilities including two administrative locations, three maintenance facilities, a bus depot, and three subway platforms used specifically for collection of waste from subway stations. We found compliance with recycling requirements at each location, but noted several exceptions. For example, on a tour of three of 12 floors of an office building, we observed five work stations (e.g. cubicle or office) where recyclable items and trash were commingled because either the recycling bin or trash container was missing. At the loading dock, we observed cardboard was in a trash bin instead of a recycling bin as required. We were told that employees receive brochures and informal instruction on recycling.

Transit contracts with vendors to remove its waste and recyclable items. We reviewed a sample of seven of 24 contracts for the removal of waste and recyclable items, including scrap items such as various metals, lead batteries, waste oil, and miscellaneous parts, equipment and buses, for which Transit receives revenue. We found that the contracts require the vendors to comply with applicable laws, rules, regulations, requirements of government agencies and environmental matters. Additionally, Transit has a contract for the removal of electronic waste such as computers.

### Reporting

Under EO 4, by September 1, 2008, State agencies and authorities were to assign an employee to serve as a Sustainability and Green Procurement Coordinator (Coordinator). The Coordinator is responsible for providing Program training to staff, vendors and contractors. The MTA has assigned a Coordinator and two assistants, as required. During our audit fieldwork, the MTA Coordinators told us that they were waiting for the final report

from the Blue Ribbon Commission before developing a formal recycling program, and appropriate training materials. Since then, the final report was issued in February 2009. Therefore, the Coordinators should develop a comprehensive recycling program and provide training based on the Blue Ribbon Commission report, as well as the requirements of the Act, other applicable laws and EO 4.

At the closing conference, Transit officials indicated no changes have been made to their recycling program since the report was issued, nevertheless they believe that their program is in substantial compliance with the requirements. However, the Commission report calls for introduction of source separation of waste collected in the subway, but Transit has not taken action to implement this as part of its formal recycling program.

Under EO 142, the MTA was “urged” to submit annual reports on its recycling efforts. These reports should contain a comprehensive collection of data reflecting source reduction, recycling, and procurement initiatives, including information on the MTA’s current recycling efforts and the total amount of waste recycled. We found that the MTA submitted the reports for fiscal years 2005-06 and 2006-07. The 2007-08 report was not submitted because EO 4 was issued in April 2008. EO 4 required the MTA to begin reporting its recycling efforts by August 31, 2009. MTA provided a copy of its EO 4 report subsequent to the end of our audit fieldwork.

- Recommendations**
1. Remind employees of recycling program requirements and monitor compliance as necessary.
  2. Ensure that work locations contain appropriate recycling and trash containers.
  3. Take action to incorporate the recommendations of the Blue Ribbon Commission into Transit’s recycling program, and document the actions taken.

## Agency Comments

347 Madison Avenue  
New York, NY 10017-3739  
212 878-7000 Tel



### Metropolitan Transportation Authority

State of New York

June 1, 2010

Ms. Carmen Maldonado  
Audit Director  
The Office of the State Comptroller  
123 Williams Street – 21<sup>st</sup> Floor  
New York, NY 10038

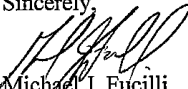
**Re: Report #2008-S-141 – NYC Transit Recycling Program**

Dear Ms. Maldonado:

This is in reply to your letter requesting a response to the above-referenced draft audit report.

I have attached for your information the comments provided to the MTA Chairman and Chief Executive Officer by Mr. Thomas F. Prendergast, President of New York City Transit, which address this report.

Sincerely,

  
Michael J. Fucilli  
Auditor General

Attachment

*The agencies of the MTA*

MTA New York City Transit  
MTA Long Island Rail Road

MTA Long Island Bus  
MTA Metro-North Railroad

MTA Bridges and Tunnels  
MTA Capital Construction

MTA Bus Company

# Memorandum



**New York City Transit**

**Date** May 28, 2010

**To** Jay H. Walder, MTA Chairman and Chief Executive Officer

**From** Thomas F. Prendergast, President, MTA New York City Transit

**Re** **Response to Draft Audit Report (2008-S-141) on NYCT's Recycling Program**

We have reviewed the draft audit report (2008-S-141) pertaining to New York City Transit's (NYCT) recycling program. We are pleased that the Office of the State Comptroller concluded that NYCT "has a recycling program that substantially complies with the applicable governance." Please note that NYCT's representation letter referenced on page 11 of the draft audit report was issued under separate cover on May 24, 2010.

\*  
Comment

Since 1992, NYCT has managed a robust and constantly evolving recycling program, which the Blue Ribbon Commission on Sustainability and the MTA singled out as follows in its 2009 report:

"For recycling, NYCT uses both source-separation at facilities and offices and post-collection programs in stations. In 2007, source-separation recycling at NYCT facilities removed 466 tons of recyclables from over 100 locations. Post-collection at 468 subway stations yielded 8,931 tons of recyclables, nearly 50% of all system refuse, one of the highest recycling rates in the U.S."<sup>1</sup>

In 2008, as noted in the draft report, NYCT recycled 77,949 tons of the 109,297 tons of waste generated, an overall recycling rate of about 71%. The draft audit report, however, notes that the 7,815 tons of subway cars used in artificial reefs "are not considered recycling." We respectfully disagree.<sup>2</sup> Moreover, NYCT's recycling program produced about \$8.4 million in revenue in 2008. Of this amount, \$5.5 million was generated from NYCT's scrap commodity operations and \$2.9 million was generated from NYCT's surplus material sales operations. In 2009, NYCT's recycling program did even better, recycling 90,439 tons of the 118,743 tons of waste generated, an overall recycling rate of about 76% and producing another \$8.5 million in revenues.

\*  
Comment

<sup>1</sup> From "Greening Mass Transit & Metro Regions: The Final Report of the Blue Ribbon Commission on Sustainability and the MTA." (p.49).

<sup>2</sup> See "Subway sinkings off Delaware coast come to an end" by Mark Eichmann. Delaware News, April 27, 2010. "The artificial reef program manager Jeffrey Tinsman says the subway car recycling effort has been a success. 'This has been our best reefing project in terms of volume of material donated and the value of the donation to our reef program.' "

\* **State Comptroller's Comment: The report has been changed based on Transit's response.**

59-98-6000 12/97



Before responding to the draft audit's three NYCT recommendations, one correction and one clarification are needed. On page 13 of the draft audit report, it states that "At one refuse platform we noted mixed refuse was commingled with recyclable items." While this is an accurate observation, it is not a finding. NYCT's passenger-generated, subway refuse undergoes a post-collection recycling process. This commingled refuse stream is collected and subsequently staged at four refuse platforms throughout the system. NYCT's refuse and recycling contractor collects the commingled waste, and transports same to the post-collection recycling facility for processing.

\*

Comment

By way of clarification, the source separation recycling requirement set forth in Executive Order No 4 (EO 4) needs to be placed in context. According to the draft audit report, "each agency's Program must provide for source separation of its waste." (p. 9) Section D, paragraph 5 of EO 4 states:

\*

Comment

"All State agencies and authorities shall, **to the extent practicable:** (a) implement effective programs to source separate recyclable materials, including paper, metal, glass and plastic, that will maximize materials recovery ...." (Emphasis added).

NYCT's specific responses to the three recommendations follow:

**Recommendation 1.**

*Remind employees of recycling program requirements and monitor compliance as necessary.*

**Response to Recommendation No. 1.**

Agree. NYCT already complies with this recommendation. For example, NYCT's Asset Recovery group is responsible for promulgating recycling policies and procedures and has published and distributed a Recycling Guide to all NYC Transit Departments. This guide addresses NYCT's policies, requirements, and procedures for source separation recycling. In addition, Asset Recovery personnel make frequent field visits and distribute the Recycling Guide to liaisons at locations visited and remind them of the need for compliance.

**Recommendation 2.**

*Ensure that work locations contain appropriate recycling and trash containers.*

**Response to Recommendation No. 2.**

Agree. NYCT's Asset Recovery group publishes and distributes a Refuse & Recycling Equipment Catalog and Recycling Guide and routinely conducts refuse container and recycling audits.

**\* State Comptroller's Comment: The report has been changed based on Transit's response.**

**Recommendation 3.**

*Take action to incorporate the recommendations of the Blue Ribbon Commission into Transit's recycling program, and document the actions taken.*

**Response to Recommendation No. 3.**

Agree. The report included the following recommendations pertaining to Materials Flow:

- Quantify and Track the MTA's Materials Flow: NYCT has been tracking waste by category since 1996 and continues to do so in conjunction with its representation on the MTA All Agency EO4 Committee. Prior to EO 4 reporting requirements, NYCT had been submitting annual EO 142 reports to the State since 1996.
- Seek More Revenue and Energy Potential from MTA Waste: NYCT's long established recycling programs reflect innovation and responsiveness to emerging markets and regulations. These programs are designed to maximize revenues by the marketing and sale of all regularly generated obsolete raw materials through a number of market index based sales contracts, which are centrally managed.
- Adopt Waste Management Targets: NYCT has assumed a leadership role in the MTA's All Agency initiative under EO4 and has identified specific waste reduction targets.
- Promote MTA Rider and Employee Conservation: This is being done through, among other things, subway posters ("We Make Trash an Asset") and the notices on waste receptacles ("Can It For A Greener Planet"). Moreover, NYCT is preparing to launch a revamped recycling awareness campaign through its intranet system (TENS) and its Enterprise Messaging System.
- Introduce Source Separation of Waste in NYCT Subways ("wherever possible").<sup>3</sup> In 2008, 85% of NYCT's waste stream was subjected to source separation recycling. The remaining 15%, the refuse generated by subway passengers, was subjected to post-collection recycling. As noted above, EO 4 requires source separation recycling "to the extent practicable." For a variety of financial, operational, environmental, safety, and security reasons, all of which have been shared with State officials over time, NYCT does not consider a full blown source separation recycling program on subway platforms as "practicable." As demonstrated in past subway station recycling pilot studies, source separation recycling is associated with high maintenance

<sup>3</sup> From "Greening Mass Transit & Metro Regions: The Final Report of the Blue Ribbon Commission on Sustainability and the MTA." "The Commission recommends that wherever possible the MTA transition to source-separation bins, which have the added benefit of encouraging New Yorkers to recycle." (p. 42).

Jay H. Walder  
May 28, 2010  
Page 4

and implementation costs. Further, source separation recycling on subway platforms generates significantly lower recycling rates than the post-collection recycling method. Notwithstanding, NYCT has worked, and will continue to work, with governmental officials in developing, limited-scope, source separation pilot programs.

On behalf of NYCT, we thank the Office of the State Comptroller for its review and recommendations.

Copy: Robert Bergen  
Stephen M. Plochochi  
Frank Payton  
Kennith Norman  
Michael Zacchea