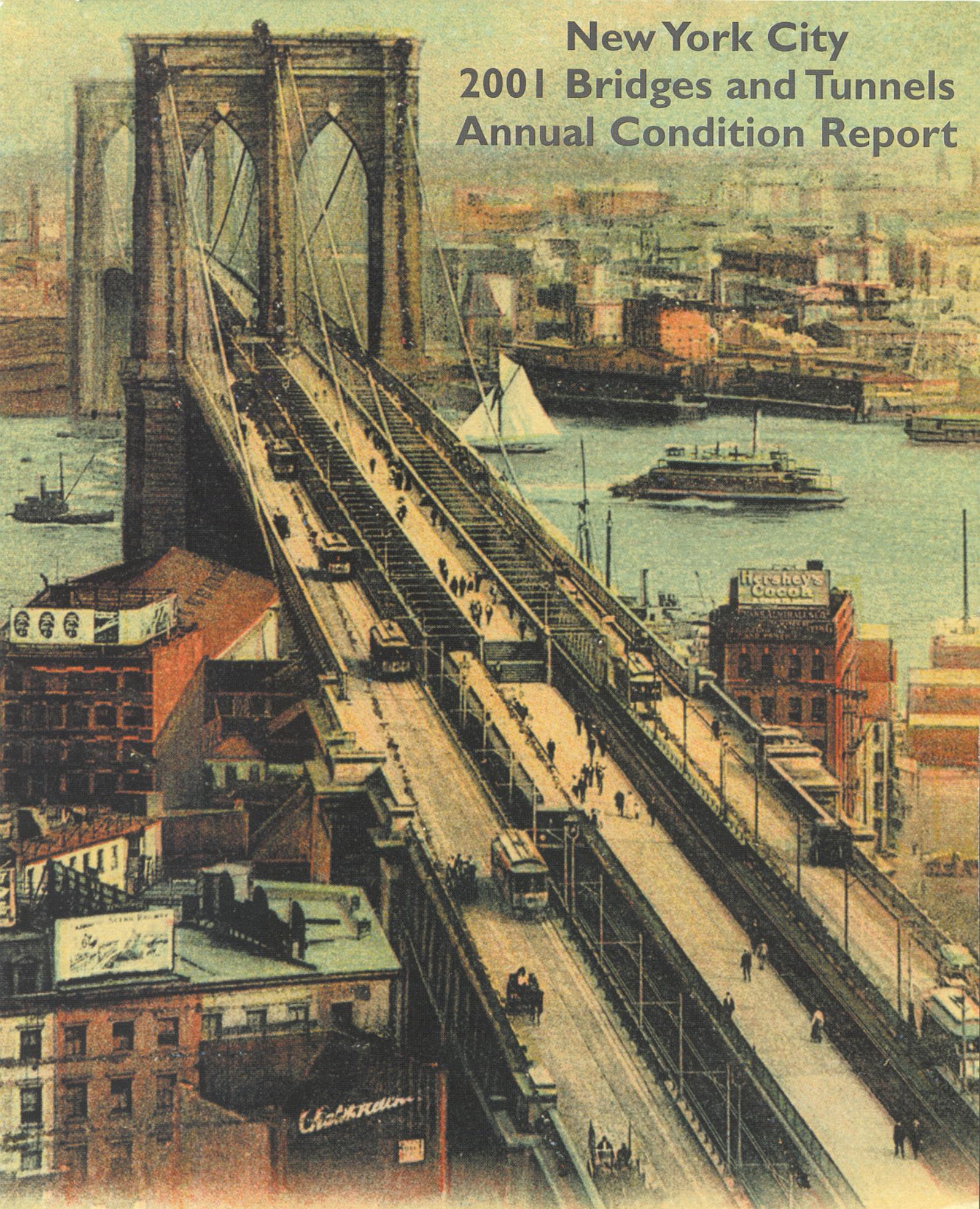


# New York City 2001 Bridges and Tunnels Annual Condition Report



New York City  
Michael R. Bloomberg, Mayor



New York City  
Department of Transportation  
Iris Weinshall, Commissioner

**New York City Department of Transportation  
Division of Bridges**

**2001  
BRIDGES AND TUNNELS  
ANNUAL CONDITION REPORT**



**Michael R. Bloomberg, Mayor**

Iris Weinshall, Commissioner

Anthony J. Fasulo, First Deputy Commissioner

Henry D. Perahia, P.E., Chief Bridge Officer  
Russell Holcomb, P.E., Deputy Chief Engineer, Maint., Insp. & Operations  
Lawrence King, P.E., Deputy Chief Engineer, Roadway Bridges  
Kamal Kishore, P.E., Deputy Chief Engineer, Engineering Review and Support  
Albert P. Novak, P.E., Deputy Chief Engineer, Specialty Engineering and Construction  
Jay Patel, P.E., Deputy Chief Engineer, East River and Movable Bridges  
Dorothy Roses, Executive Director, Management and Support Services

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## Cover Photograph

The Brooklyn Bridge circa 1900

## Cover Design

Margery Nathanson – NYCDOT Director, Design Services & Web Development

## Photo Credits

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Prakesh Sapre, CADD/GIS - MIS

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**Report Compiled and Prepared by:  
Michele N. Vulcan, Director of Analysis - Bridges**

New York City  
Department of Transportation  
Division of Bridges  
2 Rector Street  
8<sup>th</sup> Floor  
New York, New York 10006

## A Message from the

## Commissioner

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On behalf of the many dedicated professionals who staff the Division of Bridges, it is my pleasure to distribute the 2001 Edition of the New York City Department of Transportation's Annual Bridges and Tunnels Condition Report, as mandated under New York City's Charter. The release of this document provides the Department of Transportation with an opportunity to display the many achievements, innovations and improvements that were realized by the Division of Bridges during the 2001 calendar year.

As a service organization, the Department of Transportation's Division of Bridges always aims to improve the quality of life for all New Yorkers and to minimize construction disruptions. The judicious use of Incentive/Disincentive clauses to accelerate construction programs, where appropriate, is just one example.

Preventive maintenance is essential in preserving the City's multi-billion dollar investment in its bridges. These steel and concrete structures must be vigilantly protected from the stresses of the weather, traffic, deterioration and neglect. In accordance with the Division of Bridges' pro-active mission, 2001 was an important year for preventive maintenance. In-house repair crews eliminated 482 safety flag conditions that presented clear vehicle or pedestrian traffic hazards. Some 11,777 cubic yards of debris were removed, while 65,510 square feet of concrete were used to renew sidewalks, curbs, and road decks. Workers cleaned 1,601 bridge drains and, in the winter, sprayed 100,000 gallons of anti-icing chemicals on the East River bridges. In addition, crews eliminated 7,483,000 square feet of graffiti.

The Division's proud tradition of design and engineering excellence was recognized with the receipt of awards for the reconstruction of the Ninth Street Bridge over the Gowanus Canal from the New York Association of Consulting Engineers, and from the National Steel Bridge Alliance. The reconstruction of the Williamsburg Bridge/BMT Structure was selected as the 2001 Construction Achievement Project of the Year by the Metropolitan Section of the American Society of Civil Engineers. In addition, the restoration of the Queensboro Bridge Bridgemarket was selected as the 2001 Rehabilitation Project of the Year in the *New York Construction News* Best of 2001 Awards Program.

In 2001, the Division and its personnel proved, as always, equipped and ready to help the City prepare for major events including the Five Borough Bike Tour, the DUMBO Arts Festival, the Thanksgiving Day Parade, the New York City Marathon, and New Year's Eve in Times Square.

The Division of Bridges takes pride in its vital participation in the work performed at Ground Zero after the terrorist attack on September 11, 2001. The Division's skilled and specialized employees responded to the emergency effort wherever they were needed and did not stint their efforts. They supplied and monitored light stands and generators; they pumped water from the basement of the NYPD Command Center next to 40 Rector Street; they swept the Battery Park Underpass and the West Street Tunnel; they cleaned three Staten Island ferries prior to the resumption of regular ferry service, provided crowd control at the St. George Ferry Terminal, maintained the emergency lane delineators on the Brooklyn Bridge, washed down streets in lower Manhattan, and assisted the Office of Emergency Management (OEM) and NYPD in setting up maintenance and protection of traffic schemes on the Brooklyn Bridge.

Division electricians assisted with the evacuation of pedestrians across the Brooklyn Bridge immediately after the attack, provided continual light and power at Ground Zero for emergency services, wired the DOT Command Centers at 158th Street and Pier 11, maintained tunnel lighting and pumping equipment in the Battery Park Underpass and the West Street Tunnel, delivered materials ordered by OEM to designated sites, and evaluated a proposal to restore power to DOT's headquarters at 40 Worth Street by means of a generator. Division carpenters assisted with the evacuation of pedestrians across the Williamsburg Bridge immediately after the attack, constructed ramps over fire hoses, fueled lighting and power equipment at Ground Zero, and delivered materials ordered by OEM to designated sites. Division ironworkers burned steel and cleared debris at Ground Zero in the immediate aftermath of the attack, fabricated steel docking fenders for a new ferry landing, repaired ramps over fire hoses in the World Trade Center vicinity and delivered construction materials to designated sites. At the Coast Guard's request, Division repair crews assisted in the installation of chain-link fencing to protect the pilot houses and ventilation systems on the Staten Island ferries. Division oilers maintained generators, pumps, and light towers at Ground Zero, supplied fuel to generators, mobile morgues, pump sets, trucks, and heavy equipment, pumped water from basements of buildings in the area, and removed debris. Division painters painted and maintained the green line, inside which protective safety equipment must be worn.

In the aftermath of the World Trade Center disaster, a massive deployment of heavy equipment and removal of debris was undertaken. This required allowing overweight vehicles over bridges in and around the City. Division engineers coordinated with the State and other agencies and established routes for these vehicles to move into the City from all directions and move out of it. In-house design engineers created 24 new drawings, for different routes to and from the World Trade Center and disposal sites.

Division engineers also provided direction and supervision to the trades and sections involved in the rescue and relief efforts. Bridge Inspections personnel performed emergency inspections of the city's bridges and tunnels, as well as buildings and streets in the WTC vicinity, and assisted with security inspections on the Harlem River Bridges.

In addition, the Division assisted in staffing the Midtown Command OEM Center, the DOT Call Center, the Whitehall Ferry Terminal, and the 58th Street Ferry Terminal.

The Division of Bridges proved an essential part of the tremendous effort provided by our great city's municipal workers. Thanks to all the devoted public servants, our city rose above its tragedy and showed the world a shining example of civic pride, courage and effectiveness.

New York City has a rich and conspicuous history of bridge design, construction, maintenance and administration. The Department of Transportation knows the importance of its duties and responsibilities, and the Division of Bridges is ever ready to shoulder the task of maintaining and rehabilitating our city's vital bridge infrastructure.

Sincerely,



Iris Weinshall  
Commissioner

## A Message from the

## Chief Bridge Officer

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On September 11, 2001, a tragic event occurred that changed the skyline, heart, and soul of New York City, and the lives of New Yorkers, forever.

We all went to work that beautiful morning expecting nothing more than another pleasantly warm, ordinary, early Fall day. It was anything but ordinary!

Many people became heroes that day. Many more perished. The scope of the attack and the grotesque destruction remain difficult to fathom. The events of that day will be forever etched in our collective consciousness.

The Department of Transportation's Division of Bridges is headquartered at 2 Rector Street, approximately 300 yards from the World Trade Center site. Some of us were walking to work that morning, and witnessed the first plane flying over our heads and into the North Tower. Those of us already in our building felt the impact of both planes. While out on the streets evacuating our staff, many of us watched in horror as the South Tower fell out of the sky.

A handful of employees remained at 2 Rector Street until approximately 4 PM, coordinating the Division's communications relating to the emergency situation at hand. Some employees put in long hours the first few days, making sure all Division employees were accounted for and safe. Once most employees were contacted, the effort of assigning temporary work locations started. Approximately 300 employees were directed to report to various DOT facilities throughout the five boroughs. Some employees endured extraordinarily long commutes and stressful working conditions while continuing to function in a professional manner. Temporary work sites were set up citywide. Our sincere appreciation goes out to the employees of those units who welcomed us with kindness and understanding. Our engineering and administrative work force ensured that the essential functions of the Division were performed in an efficient manner.

During this period, some employees worked with the Office of Emergency Management to assist in the rescue and recovery effort, other employees worked at the Agency's Call Center, and still others volunteered to work at the Battery Maritime Building, the temporary headquarters for the Division. We are truly grateful to the Street and Arterial Maintenance Division's Manhattan Bureau for generously giving us space during this crisis.

Concurrently, senior staff members worked closely with DOT's Health and Safety Office, the Department of Citywide Administrative Services, union representatives and 2 Rector Street building management to evaluate the condition of the building and coordinate the safe return to our work site. Staff returned to the building on a voluntary basis on October 2. On October 5, the building was finally cleared for all employees to return.

We take the greatest pride in the actions of the DOT employees: they not merely fulfilled their mission of ensuring timely project completion with their usual exacting professionalism, but they also extended themselves admirably, not stinting any effort in their endeavors in this time of civic and personal tragedy.

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## EXECUTIVE SUMMARY

### Inventory

In calendar year 2001, the inventory of bridges under the jurisdiction of the Division shrank from 759 to 752. This was not the only change to the inventory: the condition ratings of the bridges also changed. In fact, over the past 10 years there has been a somewhat steady decline in the number of Poor rated bridges and a somewhat steady increase in the number of Very Good rated bridges, as shown below.

	1992	1993	1994	1995	1996*	1997	1998	1999	2000	2001
<b>Poor</b>	<b>64</b>	<b>72</b>	<b>57</b>	<b>60</b>	<b>48</b>	<b>40</b>	<b>24</b>	<b>16</b>	<b>13</b>	<b>9</b>
<b>Fair</b>	426	420	421	406	524	530	516	507	481	459
<b>Good</b>	334	329	321	342	148	145	154	160	180	196
<b>Vgood</b>	<b>46</b>	<b>57</b>	<b>61</b>	<b>51</b>	<b>59</b>	<b>55</b>	<b>75</b>	<b>81</b>	<b>85</b>	<b>88</b>
<b>Unrated</b>					68					
	<b>870</b>	<b>878</b>	<b>861</b>	<b>859</b>	<b>847</b>	<b>770</b>	<b>769</b>	<b>764</b>	<b>759</b>	<b>752</b>

\* In 1996, NYCDOT adopted a new rating scale to be used to determine the verbal condition of bridges. The new scale matches the rating scale by New York State DOT. The new scale changed the dividing line between Fair and Good bridges from 4.999 to 4.500. The net effect of this change was that, in 1996, 157 bridges that would have been rated Good were classified as Fair. This accounts for the increase in Fair rated bridges and the decrease in Good rated bridges.

### Contract Acceleration

2001 was also a year that saw contract acceleration result in the early completion of a number of new bridge projects, such as:

In January 2001, the **West 205th Street Bridge over the NYCT IND Yards** was completed approximately one year ahead of the original schedule.

In February 2001, a ribbon-cutting ceremony was held for the early reopening of the **Ridge Boulevard and Third Avenue Bridges over Shore Road Drive**. The community had previously agreed to an accelerated schedule of one year with both bridges closed to traffic (the original design was two years with one bridge closed at a time). The construction was completed 1½ months ahead of the accelerated schedule.

In May 2001, the **65th Street Bridge over the LIRR** was reopened one month ahead of schedule.

Also in May 2001, the **South Avenue Bridge over the B&O Railroad** was opened to traffic at a ceremony attended by Mayor Giuliani, Commissioner Weinshall, and Borough President Guy Molinari. The bridge, which links Forest Avenue to Richmond Terrace, was completed 1½ months ahead of the original contracted schedule, and two weeks ahead of the accelerated schedule agreed to in February 2001.

In October 2001, the **Kings Highway Bridge over the BMT Subway** was opened to traffic with Commissioner Weinshall presiding over the ribbon cutting ceremony. The project was completed 15 months ahead of the original schedule, and one week ahead of the accelerated schedule agreed upon with the community.

## EXECUTIVE SUMMARY

In December 2001, the North Outer Roadway of the **Williamsburg Bridge** was reopened 50 days ahead of schedule, allowing trucks back onto the Manhattan-bound side, and earning the contractor the maximum incentive. The opening ceremony was presided over by Mayor Guiliani and Commissioner Weinshall.

### Restorations

In 2001, the Division continued several restoration projects, such as:

In May 2000, the ironworkers began installing a replica of a historic *promenade railing* on the Brooklyn-side walkway of the Brooklyn Bridge. The replacement of the deteriorated sections of promenade railing with identical replicas of the existing steel will continue through the Summer of 2002.

The reconstruction of *St. Felix Street* in Brooklyn was substantially completed in November 2001. The work included stabilizing the street and restoring the houses to early 20th century landmark condition. The project provided homeowners with new facades, straight stoops, areaways and trees, lampposts, stamped colored concrete sidewalks, custom-made windows and cornices, and numerous other exterior and interior repairs.

### East River Bridges Anti-Icing Program

The Division's Anti-Icing Program uses the chemicals potassium acetate and magnesium chloride. The anti-icing fleet consists of five spray trucks, eighteen plow trucks and several smaller plows. Additional spray systems are being installed on ten of the eighteen plow trucks. Four installations were completed as of January 2002, and all installations are expected to be complete before the end of the winter season. Six additional chemical storage tanks were purchased and installed in 2001, increasing storage capacity from 33,000 gallons to 76,250 gallons.

In the winter of 2000-2001, a total of 100,000 gallons of anti-icing chemicals were applied on the roadways of all four East River Bridges.

Following the success of the pilot Fixed Anti-Icing Spray Technology (FAST) system on the Brooklyn Bridge, the Department expects to augment its effectiveness by using it in conjunction with a Road Weather Information System (RWIS), which is designed to collect data on weather and bridge pavement conditions using atmospheric and pavement sensors. Using information collected by the RWIS to automate the operation of a FAST system will allow the almost immediate application of anti-icing agents when weather conditions necessitate. The Department's inaugural pilot installation of a combined RWIS/FAST system is scheduled for a portion of the Queensboro Bridge in December 2003.

### Waterway Study

In 1999, the Department procured the services of an engineering firm to undertake a comprehensive study of the City's 25 movable bridges. The surrounding areas, land use, maritime laws, regulations and other factors were considered to assist the Department of Transportation in providing justification to the U.S. Coast Guard for permission to either convert certain of these movable bridges to fixed structures, or to modify their status to reduce the number of bridge openings. Such conversions would save the City annual operation and maintenance costs.

## EXECUTIVE SUMMARY

By the end of 2001, DOT advanced the waterway study to the point that we were able to identify those bridges that are realistic candidates to be converted to fixed status. Those bridges are the Borden Avenue and Hunters Point Avenue Bridges over Dutch Kills, the Grand Street Bridge over Newtown Creek, and the Bruckner Expressway over the Bronx River. The Grand Street Bridge is anticipated to be the first to be converted, beginning in Fiscal 2006. The next phase of this study will involve researching right-of-way, legal, and community impact issues. This phase will begin when the Coast Guard agrees to allow the permit process to proceed. This is expected to be sometime in the second half of Fiscal Year 2002.

### **Marine Borer Study**

In October 1999, the Department began a study to assess the existing damage caused by marine borers as well as the potential for future damage at several waterfront DOT structures, including the supporting structures of the relieving platforms along the FDR and Harlem River Drives, and the timber piles and structures of the Carroll Street and Ocean Avenue bridges in Brooklyn. The underwater inspection of timber piles supporting the FDR Drive began on May 8, 2000. Inspection of the Brooklyn sites was conducted during the week of October 23, 2000. The inspections were completed in October 2000, and the Marine Borer Evaluation Report and the Marine Borer Evaluation Report was published in June 2001. Using the results of the underwater inspections, preliminary plans were developed for the implementation of repairs and remediation measures to protect the structures from attack. These preliminary plans were completed in December 2001. The cost of the construction work, which is expected to commence in 2004, is estimated to be \$35 to \$40 million.

Based upon information gathered during this study, DOT has expanded the scope of the study to include the inspection of other City-owned property not under the jurisdiction of the Agency. In addition to timber pile supported low level relieving platforms, these structures include masonry or crib-type gravity retaining walls, high level decks, steel sheet pile bulkheads and rip rap embankments. Non-DOT structure inspections began in Spring 2001 and will be completed in February 2002.

### **2001 Awards**

In 2001, the outstanding work of the Division was recognized by the receipt of several awards. In May, the New York Association of Consulting Engineers selected the reconstruction of the Ninth Street Bridge over the Gowanus Canal in Brooklyn as the "Movable Bridge Project for Engineering Excellence."

In June, the reconstruction of the Williamsburg Bridge/BMT Structure was selected as the 2001 Construction Achievement Project of the Year by the Metropolitan Section of the American Society of Civil Engineers. This \$130 million dollar DOT project included the removal and replacement of the structure supporting the BMT subway (including the rail and signal system), and the removal and replacement of the rail system, consisting of approximately 7,000 linear feet of structure and 14,000 linear feet of track. The project was completed 35 days ahead of schedule. The award recognized the project's excellence and the unique application of civil engineering principles.

In October, the reconstruction of the Ninth Street Bridge over the Gowanus Canal in Brooklyn was selected by the National Steel Bridge Alliance to receive the Prize Bridge Award in its Movable Span category. The Prize Bridge Awards honor significant and innovative steel bridges constructed within the United States. The awards are presented at the World Steel Bridge Symposium. The projects are judged on innovation, aesthetics, and design and engineering solutions.

## *EXECUTIVE SUMMARY*

In December, the New York Construction News “Best of 2001 Awards Program” selected the restoration of the Queensboro Bridge/Bridgemarket as the 2001 Rehabilitation Project of the Year. The Bridgemarket is located in the Guastavino tiled vaults underneath the Manhattan approaches to the Queensboro Bridge. In conjunction with the EDC, the Department allocated \$2.9 million dollars in Queensboro Bridge Contract #5 to include the repair and repainting of the existing windows and frames, the replacement of missing Guastavino tiles, the repair of the terracotta columns, the repointing of the tiled arches and vaults, and the cleaning and repointing of the outside granite masonry and tiled surfaces above the windows. The Department uncovered that the deterioration was more extensive than was previously suspected. This led to the total replacement of the windows and frames, the use of pressure grouting to restore the footing and load bearing capacity of a structural support masonry column, a thorough rehabilitation of the Guastavino tiled vaults and terra cotta columns, and the complete rebuilding of several of the Guastavino tiled arches. The jury cited the project solutions as “innovative and creative in the adaptive reuse of a space that changed the neighborhood around it.”

The dedication and hard work of all members of the Division ensures that the Department is stronger than ever and more capable than ever to meet the challenges of maintaining a diverse and impressive bridge infrastructure.

## DIVISION OVERVIEW

The New York City Department of Transportation's Division of Bridges is comprised of six major bureaus. Responsible for formulating policy and providing executive direction, the **Chief Bridge Officer** oversees all aspects of the design, construction, rehabilitation and reconstruction, maintenance, operation and administration of the 752 bridges (including 6 tunnels), and 67 culverts presently under the jurisdiction of the New York City Department of Transportation (NYCDOT). Holding a broad supervisory position, the Chief Bridge Officer is further tasked with providing overall executive and administrative direction for the Division of Bridges, as well as ensuring that all contractors are promptly paid.

Reporting to the Chief Bridge Officer, the **Community Affairs Unit** maintains liaison with elected officials, community boards, community groups, and civic/neighborhood associations. The Unit takes a pro-active approach in addressing roadway closures and detours by reaching out to communities prior to the onset of construction. This enables the Division to proceed with its rehabilitation program with community input, thus enabling the Agency and its contractors to co-exist in a more harmonious manner with the community surrounding the project. Issues and problems of concern to the communities are brought to the attention of the appropriate Division personnel and addressed.

The Division was re-organized in January 2001 to include a sixth Bureau. The **Specialty Engineering and Construction Bureau** is responsible for all **Component Rehabilitation** activities, **Emergency Declarations/Specialty Engineering Services**, **Bridge Painting**, and the **When and Where Unit**.

**Component Rehabilitation** is the revamping or replacement of damaged, worn or defective bridge components. This type of work is performed primarily on those structures not classified as being "deficient," but which contain specific components that have low condition ratings. By rehabilitating these components, the Division can ensure that these bridges remain in "good" or "very good" condition; usually extending the bridge's useful life by up to 10 years. Section Heads or Engineers-in-Charge (E.I.C.'s) report to the Director of Component Rehabilitation. Each is assigned a specific bridge, or bridges, for which they are responsible for all component rehabilitation activities.

The **Emergency Declarations/Specialty Engineering Group** is responsible for providing technical procurement expertise related to the following areas: preparing Emergency Declarations for unsafe conditions that require immediate remediation; assisting the Chief Bridge Officer in the contractor selection process for declared emergency situations; providing technical expertise related to the development, procurement and administration of Design-Build contracts throughout the various areas of the Division; and preparing and administering Design-Build agreements.

The **Bridge Painting** section's function is to maintain the protective coating of the City's bridges. The section is divided into two programs, the in-house (expense) program and the capital program. The capital program oversees total paint removal and repainting, performed by contractors; this is done at twelve year intervals on bridges measuring more than 100,000 square feet, and bridges over railroads. In-house personnel provide the inspection services on the capital contracts for quality control purposes. The in-house program is responsible for full steel painting of bridges measuring less than 100,000 square feet, and bridges that are not over railroads. This includes local surface preparation of deteriorated areas and overcoating of the entire bridge. In addition, the in-house program is responsible for spot and salt splash painting. Spot painting is performed at three and nine year intervals, while salt splash painting is performed at six year intervals. Members of the in-house program also staff the Graffiti Program for the Department and respond to emergency flag repairs alongside the in-house repair forces, to perform surface preparation prior to, and painting upon completion of, the steel work.

## DIVISION OVERVIEW

The engineers and inspectors of the ***When and Where Unit*** supervise the contractor's repairs of structural and safety flags citywide. The use of these contracts allows the unit greater flexibility in deploying the contractors' resources as necessary, and in obtaining a variety of construction equipment and materials that are not readily available to in-house forces. In addition, the unit responds to bridge emergencies, providing on-site inspection to verify field conditions, taking measurements for repairs and providing emergency lane closures.

The Deputy Chief Engineer for Specialty Engineering and Construction also serves as the **Deputy Chief Bridge Officer**, assuming the responsibilities of the Chief Bridge Officer in that person's absence.

The **East River and Movable Bridges Bureau** is responsible for all design and construction activities for all rehabilitation/reconstruction work that is planned, or currently taking place on the four East River Bridges, as well as all City-owned movable bridges and tunnels. This involves overseeing and supervising design consultants who prepare plans and specifications for bridge rehabilitation/reconstruction projects on the four East River Bridges and all Movable Bridges, as well as overseeing and supervising contractors, Resident Engineers and Inspection Consultants, and Construction Support Services Consultants during the construction phase.

This Bureau is separated into two major areas: ***East River Bridges***, and ***Movable Bridges***. Each of these areas is headed by a Director to whom Section Heads or Engineers-in-Charge (E.I.C.'s) report. Each is assigned a specific bridge, or bridges, for which they are responsible for all design and construction activities. The Directors, in turn, report to the Deputy Chief Engineer of the Bureau.

The **Bureau of Roadway Bridges** is responsible for both design and construction activities for all rehabilitation/reconstruction work that is planned, or currently taking place on all City-owned, non-movable bridges, with the exception of the four East River Bridges. This involves overseeing and supervising design consultants who prepare plans and specifications for bridge rehabilitation/reconstruction projects, as well as overseeing and supervising contractors, Resident Engineers and Inspection Consultants, and Construction Support Services Consultants during the construction phase.

This Bureau is separated into two major geographic areas; ***Brooklyn and Manhattan Bridges***, and ***Bronx, Queens and Staten Island Bridges***. In each geographic area, the workload is divided by Community Board. Engineers-In-Charge report to the Directors of each major area, who, in turn, report to the Deputy Chief Engineer of the Bureau.

The **Engineering Review and Support Bureau** is responsible for providing Division-wide engineering support services. The following areas make up this Bureau: ***In-House Design, Engineering Support, Engineering Review, and Quality Assurance***.

## DIVISION OVERVIEW

**In-House Design** staff prepare plans and specifications for bridge rehabilitation/reconstruction projects that enable the Division to restore bridges considered “structurally deficient,” to a “very good” condition rating. This unit handles urgent Division projects, as well as special projects under construction by the **Bureau of Bridge Maintenance, Inspection and Operations**. The Electrical Group reviews and/or prepares contract documents for the electrical and street lighting work for all projects in the Division’s capital program. They further review plans and specifications prepared by consultants.

The **Engineering Support Section** is comprised of three units: *Specifications, Surveying and Load Rating*, and *Microfilm and Records Management*.

The *Specifications Unit* prepares and reviews specifications for all in-house and consultant-designed bridge projects, processes the contracts for bidding, prepares and transmits addenda, maintains and updates boiler plates, and maintains an inventory of all NYC and NYS special specifications used in City-let bridge projects. This unit also supervises the consultant design contract “Protection Against Marine Borers”.

The *Surveying and Load Rating Unit* performs the survey, inspection and load rating of bridges, monitoring of cracks and movements in bridge structures and settlement of foundations. This unit also performs corrosion potential testing in all bridge resurfacing projects.

The *Microfilm and Records Management Unit* establishes drawing and microfilm standards, and reviews contract drawings prepared by consultants, as well as shop drawings, “as-built” drawings, microfilms and indexes prepared by contractors. This unit maintains design documents and original plan files, upgrades the plan files of original drawings into electronic media and answers requests for information regarding City-owned bridges.

The **Engineering Review Section** consists of five units: *Engineering Review and Estimates, Utilities, Land Acquisition, Geotechnical Engineering, and Scope Development*.

The *Engineering Review and Estimates Unit* reviews all City-let bridge construction contract drawings; reviews drawings from other Agencies and entities, as well as State and private companies; and ensures that the work to be performed conforms to NYCDOT requirements. This unit establishes design standards, including seismic requirements, and oversees estimates prepared by consultants. This unit also reviews superload truck permit applications and performs load analyses for the City’s bridges. In addition, the unit conducts other, non-bridge engineering projects, such as the annual balloon wind study for the Macy’s Thanksgiving Day Parade.

The *Utilities Unit* coordinates all issues related to utility design as they affect City-owned bridge projects and related projects.

The *Land Acquisition Unit* reviews and maintains a database of easement issues, right-of-way, and Uniform Land use Review Procedures (ULURP).

The *Geotechnical Engineering Unit* provides geotechnical-engineering services and oversees seismic design requirements for City-let contracts for bridge projects.

The *Scope Development Unit* reviews inspection reports and structural condition ratings to develop the scope of work for the rehabilitation of deficient bridges, and initiates the procurement of Design Consultant contracts.

The **Quality Assurance Section** ensures that materials installed for the Bridge Rehabilitation Program meet contractual requirements and are incorporated in strict compliance with plans and specifications. This section operates under its own formulated Quality Assurance Plan that is based on NYSDOT requirements and procedures. Quality Assurance has contractually retained the services of private inspection/testing firms. The provision of services required for various projects is better coordinated through this centralized method, which is also more timely and cost effective.

## DIVISION OVERVIEW

Off-site Quality Assurance services relative to fabrication of structural steel and precast/prestressed structural components for federally funded projects, previously handled by NYSDOT, are now being handled by this section. Current major projects include the Macombs Dam Bridge, the Williamsburg Bridge North Roadways, the Queens Boulevard Bridge, and the rehabilitation of the Manhattan Bridge North Spans.

Through its *Lead Waste and Hazardous Waste Unit*, Quality Assurance is also overseeing the implementation of the Final Environmental Impact Statement (FEIS) on bridge construction projects involving the removal and disposal of lead-based paint. The unit's active involvement in training the supervisors and overseeing the abrasive blasting operations has resulted in the successful completion of various paint removal projects. This unit also oversees the proper and safe disposal of other hazardous waste and regulated waste encountered during construction activities.

In addition to enforcing the lead paint removal protocols, the unit handles other environmental concerns such as asbestos abatement, soil sampling, groundwater sampling, worker exposure to environmental contaminants, management of waste oil, storage of hazardous waste, site safety, and OSHA compliance, and develops training programs to educate field personnel in proper materials acceptance requirements procedures and methods. The role of this unit in ensuring public safety has been recognized and commended by the community.

Employing almost 500 engineering, professional, administrative, and skilled trades employees in the maintenance and smooth operation of New York City's elevated infrastructure, the **Bureau of Bridge Maintenance, Inspection and Operations** is composed of six major sections:

The **Flag Engineering** section is an engineering group that reviews, routes, and tracks hazardous or potentially hazardous safety and structural conditions ("flags") in or on the city's 752 bridges (including 6 tunnels). The Flags staff are on call 24 hours a day to respond to bridge emergencies. The section can be alerted to flag conditions by city and state inspectors and other sources, such as the Communications Center. All conditions undergo an evaluation involving review of the flag report, photographs of condition, and, if necessary, a visit to the site. Subsequently, a "flag packet" describing the type of repair or response that is required is created and routed to an appropriate group, in-house or contractor, for elimination. Flags engineers supervise repair work performed by contractors. The section monitors the status of each flag, reporting on all activities on a monthly basis.

The in-house engineers and skilled trades personnel of the **Bridge Repair Section** perform repairs to address flagged conditions. Flag repairs include structural and safety work, such as the repair of steel members damaged by corrosion or accident impact, the replacement of box beams and bridge railings, the replacement of roadway gratings, repairs to traffic control devices, and the rebuilding of wooden walkways. Much of this work is performed in the off-hours, either to accommodate traffic or in response to emergencies.

This section also rehabilitates and replaces damaged, worn, or defective components whose failure would affect service. This type of work, known as *Corrective Repair*, primarily involves the electrical, mechanical and operational control systems for the twenty-five movable bridges, as well as the travelers (movable underdeck access platforms) on the four East River bridges. The Bridge Repair Section is also responsible for the lubrication of the movable bridges as well as the mechanical components and the main cables of the East River bridges. In addition, this section administers federally funded contracts for the preventive maintenance of the four East River Bridges.

The **Inspections, Research, and Development** section performs three essential functions: *Bridge Inspections, Bridge Management, and Research and Development*.

## DIVISION OVERVIEW

The *Inspections Unit* inspects the city's bridges in accordance with state and federal standards; monitors bridge conditions with a high hazard potential, such as temporary repairs, outstanding flags, and fire hazards; responds to emergency inspection requests from NYCDOT and external sources; recommends repairs and remedial measures for hazardous conditions; generates flag and inspection reports for the Division; supervises inspections by consultants working for the Division; conducts inspections and inventories of expansion joints; conducts acoustic emission monitoring; and inspects non-structural cladding.

The *Bridge Management Unit* develops and maintains the database for the City's bridge inventory, condition ratings, and inspection information. The unit is also responsible for maintaining records of privately-owned bridges in the City. The database is the source of information used in a variety of reports, including this Bridges and Tunnels Annual Condition Report. This unit has used the bridge and span condition database to determine current and future needs for bridge rehabilitation, bridge component rehabilitation, flag forecasting, inspections and monitorings.

The *Research and Development Unit* is responsible for investigating new materials and methods to improve existing bridge conditions. It sponsors a series of lectures by experts on subjects relevant to design, construction, and maintenance, such as seismic retrofitting of bridges, salt substitutes, cathodic protection against corrosion, concrete patching materials, new paint strategies, non-destructive bridge testing, and deck resurfacing. The unit also participates in research programs with interested transportation and infrastructure entities. The unit contributed to the 1999 update of the Preventive Maintenance Manual for NYC bridges. In conjunction with the Port, Triborough Bridge and Tunnel, and NYS Bridge Authorities, it sponsored a report on suspension bridge cables that led to a federal project for the entire United States. A number of articles on bridge management are published by the unit in technical journals in the United States, Japan, France, and elsewhere. The Bridge Management and Research and Development Units created the system for generating bridge inspection reports with portable computers; a similar system is now being adopted by the NYSDOT.

**Preventive Maintenance** is a vital part of the overall bridge program. This section is responsible for functions including debris removal; mechanical sweeping; pointing of masonry brick and block; and emergency response, such as snow removal, oil/cargo spills, and overpass hits. The section also performs some corrective repair work such as asphalt and concrete deck repairs, sidewalk patching, fence repair, and brick and masonry repairs. Preventive Maintenance is responsible for conducting the Department's anti-icing operations on the four East River bridges.

**Bridge and Tunnel Operations** is responsible for operating the 25 City-owned movable bridges that span city waterways. Operating under a variety of federal mandates that call for 24-hour coverage at many locations, this section's mission is to provide safe and expedient passage to all marine and vehicular traffic under and on movable bridges. In calendar year 2001, Bridge Operations effected a total of 6,761 openings, 4,900 of which allowed 7,954 vessels to pass beneath the bridges. The remaining 1,861 openings were for operational and maintenance testing. The section also operates the city's six mechanically-ventilated tunnels, performing electrical maintenance and arranging for roadway cleaning.

The overall mission of the Bureau of Bridge Maintenance, Inspection and Operations is to maintain the structural integrity of elevated structures and tunnels and to prolong their life by slowing the rate of deterioration. While our objective may be seen as "maintaining the status quo" of the infrastructure, we are continuing to take a new look at our methods, procedures, and general focus as we formulate our operational plans for the next several years.

As more bridges are rehabilitated, it becomes incumbent upon us to protect the government's investment in the infrastructure by developing and implementing a more **substantive preventive maintenance program** to keep these bridges in good condition.

## DIVISION OVERVIEW

The **Bureau of Management and Support Services** provides essential administrative and analytic services to each of the operational bureaus of the Division of Bridges. The section is divided into five primary areas: **Office of the Executive Director, Administrative, Budget, Capital Procurement, and Capital Coordination**. Each highly-specialized unit is designed to address those issues and requirements that are critical to the operation of the respective Bureaus within the Division.

In addition to the Division-wide responsibility for conflict resolution, Equal Employment Opportunity (EEO) enforcement, confidential investigations, Freedom of Information Law (FOIL) requests, space allocation, mail delivery, and special projects, the **Executive Director** oversees, on an executive level, the following areas and functions:

The **Director of the Administrative Section** oversees and administers all administrative/personnel-related functions for the Division, acting as a liaison with the Central Personnel Coordinator in NYCDOT Personnel including, but not limited to, recruiting for vacancies (this includes reviewing for completeness and submitting the necessary paperwork, and reviewing and distributing candidates' resumes); maintaining all Managerial Position Descriptions; maintaining all Division organization charts; scheduling EEO training; confidential investigations; maintaining records of IFA-funded positions; initiating and assisting in resolving disciplinary/grievance actions; serving as Conflicts of Interest and Financial Disclosure Officer; collecting and reviewing managerial and non-managerial performance evaluations; absence control; providing interpretive advice to Division management regarding City and Agency policy and procedures; and overseeing telephone and facility-related issues for personnel located at Two Rector Street in Manhattan. The Director of Administration also serves as the Deputy Director of the Bureau of Management and Support Services, assuming the responsibilities of the Executive Director in that person's absence.

The Director of the Administrative Section also oversees the following two units.

The **Analytic Unit** prepares comprehensive bi-weekly and monthly reports that address major issues confronting the Division; compiles statistical data detailing the Division's productivity; processes and monitors all FOIL requests; frames issues in which oversight assistance is required for use by the Division, NYCDOT Executive Management and the Mayor's Office; and prepares the City Charter-mandated **Bridges and Tunnels Annual Condition Report**.

The **Vehicle Coordination Unit** tracks the placement and condition of all vehicles under the jurisdiction of Bridges. It maintains a database and prepares reports containing this information; provides information and reports to appropriate inquiring Divisions and Agencies such as the Auditor General's Office, NYCDOT Legal Department and NYCDOT Litigation Support Services; coordinates the assignments of vehicles and their movement throughout various borough field locations and job sites; prepares reports on Vehicle Status and replacement; prepares reports for the purpose of tracking Overnight Vehicle Assignments for all Division vehicles; receives and routes vehicle Accident Reports, Police Reports and Security Incident Reports relating to vehicle accident, theft and/or vandalism; coordinates priorities for vehicle and equipment repair with Fleet Services; prepares reports and memoranda regarding vehicle safety issues and communication procedures for NYCDOT Communication Center; and collects required documentation from field personnel for checking Driver Certifications with the Department of Motor Vehicles (DMV).

The **Director of the Budget Unit** oversees the Division's entire expense budget process including, but not limited to, base-line preparation, spending plans, overtime control, financial plan changes, and budget modifications. The unit further oversees all Division-wide fiscal activities, including the establishment and monitoring of all IFA-related project budgets, while simultaneously ensuring that the budget and plans represent the Division's priorities.

## DIVISION OVERVIEW

The **Capital Procurement Unit** serves as a liaison between the Division of Bridges and the Office of the Agency Chief Contracting Officer (ACCO). The duties of this unit include: overseeing the Division's capital contracts from inception to completion; acting as liaison between engineers and the consultant programs unit, handling all engineering questions and answers; preparing status reports; managing Bridges' Engineering Service Agreements; overseeing and coordinating all activities involved in the Contract Closeout process; coordinating Railroad Force Account Agreements for Division construction projects; and providing in-house review of contracts.

*Railroad Force Account Agreements* are a vital component in the rehabilitation/reconstruction program since train traffic affects 315 (42%) of City-owned bridges. Careful cooperation between the NYCDOT and the various railroad agencies that service the metropolitan area is required. The Railroad Coordinator provides a single point of contact for all railroad issues. This coordination includes the use of railroad personnel for track safety, approval of reconstruction design drawings, track shutdowns and reductions in train service for bridge construction work. The coordinator informs managers of "typical" railroad problems and attempts to avoid them through proactive measures.

Coordination with our Legal Department and Division engineering staff to clarify force account language in an attempt to avoid ambiguity is continuing. New agreements are being designed to explicitly identify when notices for outages or flagging protection are required, who will be responsible when outage/flagging is canceled, and specifying those documents that can be audited to expedite reimbursement of bills. These additions will streamline payment processing. The idea of a Master Agreement is not feasible since each railroad has its own rules and regulations governing its employees, its own scheduling procedures and different billing requirements/procedures.

NYCDOT bridge designers make every effort to prepare accurate and complete contract documents. Unfortunately, in many instances, the original design drawings for the deteriorating bridges no longer exist, and previous records of modifications and repairs are not available. When the contract documents for the bridge reconstruction projects do not accurately address conditions found in the field, Contract Change Requests (CCR) are needed. Change order work can not proceed until the CCR is registered. Due to the nature of bridge construction projects, change order work is often on the critical path. Any delay in the issuance of a change order forestalls the overall project, adding substantial overruns to the final cost.

This approval process typically requires three to six months to complete. A tracking process for change orders has been implemented, reducing the time for the approval process to one-and-a-half to three months.

The **Capital Coordination Unit** is responsible for preparing, coordinating and updating the capital budget and capital program initiative within the Division of Bridges. Currently, the Division's Ten Year Capital Plan is worth approximately \$5 billion. This plan is designed to rehabilitate the City's bridges. Responsibilities include: administering and participating in the development and implementation of planning capital projects; acting as liaison with oversight agencies, DOT Administration and all responsibility centers within Bridges; developing and maintaining criteria by which the City's involvement in joint City/State projects is analyzed and evaluated; and determining applicability of projects for funding through the Federal Inter-modal Surface Transportation Efficiency Act (ISTEA).

## **JANUARY**

### ***Grand Street Bridge over Newton Creek (Brooklyn/Queens)***

On January 8, 2001, Division personnel re-installed the newly repaired southwest semaphore gate and crash gate that had been damaged in a vehicular accident on November 30, 2000.

### ***Queensboro Bridge***

The installation of the underdeck lighting of the First Avenue Arch, which began on December 13, 2000, was completed on January 10, 2001.

### ***East 178th Street Pedestrian Bridge over Metro North RR (Bronx)***

This bridge was substantially completed on January 11, 2001. The project included the construction of new pedestrian ramps conforming to ADA guidelines.

### ***West 205<sup>th</sup> Street Bridge over NYCT IND Yards (Bronx)***

This reconstruction project was completed on January 12, 2001, approximately one year ahead of the original schedule.

### ***Earthquakes***

At approximately 7:34 AM on January 17, 2001, a minor (2.4) earthquake struck NYC, centered somewhere on the Upper East Side. The earthquake occurred at a depth of about four miles. Division engineers promptly inspected the piers and abutments of the East River bridges, as well as other bridges in the area of the earthquake, such as the Long Island Expressway over Woodhaven Boulevard. No damage to the bridge structures was reported. At approximately 10:04 AM on January 19, 2001, a smaller (1.2) earthquake struck approximately the same area as the earlier one.

### ***Williamsburg Bridge***

On January 29th, 2001, the two North Roadways were closed for rehabilitation. The North Outer Roadway was scheduled to be closed for one year, and the North Inner Roadway is scheduled to be closed for 18 months.

## **FEBRUARY**

### ***Manhattan Bridge***

A Notice to Proceed for Contract #10 (the rehabilitation of the north spans) was issued to the contractor with a start date of February 12, 2001.

### ***Brooklyn Bridge***

On February 15, 2001, Division electricians repaired and re-lamped the navigation lights along the north face of the bridge.

### ***Ridge Boulevard & Third Avenue Bridges over Shore Road Drive (Brooklyn)***

On February 15, 2001 a ribbon-cutting ceremony was held for the early reopening of these bridges. The community had previously agreed to an accelerated schedule of one year with both bridges closed to traffic (the original design was two years with one bridge closed at a time). The construction was completed 1½ months ahead of the accelerated schedule.

### ***Williamsburg Bridge***

Division electricians completed the repairs and re-lamping of the FAA beacons on the Brooklyn tower on February 20, 2001. Restoration of the beacons on the Manhattan tower was completed on February 27, 2001.

### ***Willis Avenue Bridge over Harlem River (Bronx/Manhattan)***

The component rehabilitation of this bridge was completed in February 2001.

## **MARCH**

### ***Award Finalist***

In March 2001 the American Consulting Engineers Council selected the reconstruction of the Ninth Street Bridge over the Gowanus Canal in Brooklyn as a National Finalist in its Engineering Excellence Awards Competition.

### ***Anti-Icing***

Beginning on the afternoon of March 4, and continuing until the morning of March 7, 2001, crews applied a total of 10,000 gallons of anti-icing chemicals to the East River bridges. In addition, personnel used 16 plow trucks and five anti-icing vehicles to clear the roadways and priority overpasses, and icicle patrols monitored the FDR, Cross-Bronx Expressway, and Cadman Plaza, as well as the Agency-maintained tunnels.

### ***Kings Highway Bridge over BMT Subway (Brooklyn)***

The reconstruction of this bridge began on March 7, 2001.

### ***Manhattan Bridge***

On March 7, 2001, sixty civil engineering students from the Netherlands were led on a tour of the bridge, which included a presentation highlighting its structural aspects.

### ***Brooklyn Bridge***

On March 9, 2001, an anti-pigeon sonic device was installed at the Brooklyn entrance to the Brooklyn Bridge pedestrian and bike walkway in response to a January 2001 community complaint. The system is a large black box that produces sounds that cause the birds to move on to other locations.

### ***Queens Boulevard Bridge over Amtrak and LIRR Yard (Queens)***

Closed circuit TV installation for the bridge was completed on March 9, 2001.

### ***Broadway Bridge over Harlem River (Bronx/Manhattan)***

Division personnel opened the bridge six times over the course of March 19 and 20, 2001, to allow the passage of old rail cars on barges from the 207th Street IRT yard to Long Island, where they will be used in the creation of a barrier reef.

### ***153rd Street Bridge over Metro North (Bronx)***

The Notice to Proceed for the final design of this single tower cable stay bridge was issued to the consultant on March 26, 2001. This bridge will be the first of its kind in New York City.

### ***Macombs Dam Bridge over Harlem River (Bronx/Manhattan)***

Stage I construction was completed on schedule on March 31, 2001. This milestone date was met even though twenty-six working days were lost from the work period due to the post season play of the New York Yankees. Essentially twelve months' worth of work was compressed into the five most inclement weather months of the year.

### ***Manhattan Bridge***

Maintenance work on the bridge travelers (movable underdeck platforms) began in March 2001.

## **APRIL**

### ***Queens Boulevard Bridge over Amtrak and LIRR Yard (Queens)***

The southern half of the bridge was closed to traffic on April 2, 2001, as agreed to by Community Board #2 in February. Queens-bound traffic follows a carefully planned and clearly marked detour that was designed to minimize impacts on area businesses, the local community, and the traveling public.

### ***Kosciuszko Bridge (Brooklyn/Queens)***

On April 14, 2001, in response to a potential health hazard from the West Nile Virus and a request from NYSDOT, Division personnel removed 150 tires that had been illegally dumped on NYSDOT property beneath the bridge. Four cubic yards of debris were removed as well. The tires were disposed of at a DOS facility.

### ***Kings Highway Bridge over BMT Subway (Brooklyn)***

The bridge was closed to traffic for six months beginning April 23, 2001, as agreed to by Community Board #11 in February 2001.

### ***Riverside Drive Bridge over West 96th Street (Manhattan)***

The component rehabilitation of this bridge began in April 2001.

### ***Martlings Avenue over Richmond Lake Dam (Staten Island)***

The component rehabilitation of this bridge, which began on October 16, 2000, was completed in April 2001.

### ***McClellan Avenue over B&O Abandoned Railroad (Staten Island)***

This component rehabilitation project was completed in April 2001. The bridge was demolished and an at-grade asphalt roadway and sidewalks were installed in its place. The bridge was one of the last crossings to be taken out along the long-defunct railroad, which stopped running trains more than 50 years ago and was later sold to private developers.

### ***Queensboro Bridge***

Rehabilitation of the Division's ironworker and painter shop facility on the Manhattan side of the bridge was completed in April 2001.

### ***Shore Road Drive (Brooklyn)***

The paving project concluded in April 2001. This work not only restored the highway but improved the roadway and adjacent earthen slopes, eliminated old depressions and, in combination with the placement of curbs and the thorough cleaning of catch-basins, is the reason why for the first time in many years there is no ponding on Shore Road Drive even during heavy rain.

## **MAY**

### ***Award***

In May 2001 the New York Association of Consulting Engineers selected the reconstruction of the Ninth Street Bridge over the Gowanus Canal in Brooklyn as the "Movable Bridge Project for Engineering Excellence."

### ***Broadway Bridge over Harlem River (Bronx/Manhattan)***

Painting containment construction on the bridge towers was temporarily halted in May 2001 due to the presence of a nesting pair of peregrine falcons with four hatchlings (also known as eyases) on the South Tower. Although peregrine falcons were removed from the list of endangered and threatened species in August 1999, this pair is one of only 1,650 breeding pairs known by the U.S. Fish and Wildlife Service to live in the United States and Canada. NYCDEP was notified and inspected the site. Peregrine falcons vigorously defend their nests (also known as eyries), although they may abandon them if severely or continuously harassed. Therefore, NYCDEP requested that a nesting box be constructed on the outside of the bridge's scaffolding. On May 25, a NYCDEP wildlife biologist moved the hatchlings to the new nesting box on the roof of the Allen Pavilion of New York Presbyterian Hospital. NYCDEP also requested that DOT construct a permanent nesting box on the bridge after completion of the project.



DOT Bridge Dweller

### ***Five Borough Bike Tour***

During the week prior to the tour, Division personnel installed sheet asphalt on the upper roadway of the Queensboro Bridge. Beginning at 3 AM on May 6, 2001, crews swept clean all bridges on the tour route before the tour began, including the Pulaski, Queensboro, Willis, and Third Avenue bridges.

### ***Bryant Avenue over Amtrak (Bronx)***

Cleaning and painting of the bridge was completed on May 7, 2001.

### ***Marine Borer Project***

On May 7, 2001, the additional inspection commenced of property belonging to the City but not under the jurisdiction of DOT, beginning with the waterfront structures along the FDR Drive.

### ***65th Street Bridge over LIRR (Queens)***

The bridge, which was closed to traffic on March 28, 2000, was re-opened on May 10, 2001, one month ahead of schedule.

### ***Manhattan Bridge***

The Manhattan Bridge bike path was closed in the 1960's after falling into such disrepair that it became unsafe. On May 16, 2001, Commissioner Weinshall cut the ribbon for the new pedestrian and bike path. The Commissioner then led the cyclists on a ceremonial ride to celebrate the historic opening of this path that serves as a new link between Manhattan's Chinatown and downtown Brooklyn. The lane, along the south side of the bridge, is designed for pedestrians, but will temporarily serve cyclists, too, until they get their own lane on the north side in three years. The path officially opened on June 25, 2001, after construction was completed.

### ***Willis Avenue Bridge over Harlem River (Bronx/Manhattan)***

Emergency repairs to panel point #20 on the Bronx side of the bridge began on April 27, 2001, at which point the bridge was jacked up and temporarily supported on steel columns. The project was completed on May 30, 2001, when the temporary supports were removed and the bridge lowered.

### ***South Avenue Bridge over B&O Railroad (Staten Island)***

The bridge was opened to traffic on May 31, 2001, at a ceremony attended by Mayor Giuliani, Commissioner Weinshall, and Borough President Guy Molinari. The bridge, which links Forest Avenue to Richmond Terrace, was completed 1½ months ahead of the original contracted schedule, and two weeks ahead of the accelerated schedule agreed to in February 2001.



Reopening of South Avenue Bridge, May 31, 2001

### ***Carroll Street & Union Street Bridges over the Gowanus Canal (Brooklyn)***

On May 31 and June 1, 2001, bridge operating personnel hosted 4<sup>th</sup> grade students from the New School in Manhattan on class trips to the Carroll and Union Street bridges. Students, teachers, and parents enjoyed their visits.

### ***Third Avenue Bridge over Shore Road Drive (Brooklyn)***

In May 2001, the contractor completed the installation of two new two park lights at the southeast side of the bridge, as requested by the 67<sup>th</sup> Street Block Association in March.

## **JUNE**

### ***Award***

The reconstruction of the Williamsburg Bridge/BMT Structure was selected as the 2001 Construction Achievement Project of the Year by the Metropolitan Section of the American Society of Civil Engineers. This \$130 million dollar DOT project included the removal and replacement of the structure supporting the BMT subway (including the rail and signal system), and the removal and replacement of the rail system, consisting of approximately 7,000 linear feet of structure and 14,000 linear feet of track. The project was completed 35 days ahead of schedule. The award recognized the project's excellence and the unique application of civil engineering principles.

## ***International Conference***

On June 4 through June 6, 2001, Chief Bridge Officer Henry Perahia, Deputy Chief Engineer Jay Patel, Director of East River Bridges Peter Johe, and Seismic Engineer Jagtar Khinda attended the 18<sup>th</sup> annual International Bridge Conference in Pittsburgh. This is the largest annual bridge conference in the country. The NYC DOT representatives presented a paper on the reconstruction of the East River Bridges. New York State was the featured State in this year's conference, and DOT was part of the State's exhibit.

## ***Grand Street Bridge over Newton Creek (Brooklyn/Queens)***

On June 6, 2001, Division personnel re-installed the newly refurbished Queens side portal of the bridge, that had been damaged in a vehicular accident in December 2000. In addition, crews re-installed the newly repaired traffic light pole and semaphore gate on the southeast corner, that were hit by passing vehicles on April 21 and 24, 2001.

## ***Belt Parkway Bridge over Mill Basin (Brooklyn)***

On June 7, 2001, Division personnel re-installed the newly repaired northwest semaphore gate that had been severely damaged in a multi-vehicle accident on June 3.

## ***FDR Drive between 80th and 90th Streets (Manhattan)***

On June 7, 2001, Division personnel installed the refurbished ornamental portal entrance lighting. These 11' tall by 2' wide light frames form a grillwork over the light, giving a lantern-like appearance.

## ***East Tremont Avenue over Metro North RR & East 161st Street over Conrail Port Morris (Bronx)***

A Notice to Proceed for the reconstruction of these bridges was issued to the contractor with a start date of June 11, 2001.

## ***Concorde Plane Model***

In May 2001, Division engineers reviewed the calculations for the planned removal of the model Concorde plane (one half the prototype in size, and weighing 26,000 pounds) from the Times Square Building roof and placement on a scaffolding bridge over the Broadway sidewalk for dismantling. The primary concerns were public safety during the removal operation, and the stability of the plane on the bridge under high wind conditions. After inspection by the Division's quality assurance engineers, additional bracing to the scaffolding bridge was provided to increase rigidity and stability to the structure. After an unsuccessful attempt on June 11, the contractor succeeded in removing the model plane on June 13, 2001. Division engineers were at the site throughout the removal operation.

## ***Hamilton Avenue over Gowanus Canal (Brooklyn)***

On June 18, 2001, emergency repair work began on the bridge, which required 9 weeknight closures of the east leaf in the in-bound (Manhattan) direction. All of the work was performed on weeknights to avoid conflict with NYSDOT's Gowanus project. Traffic Enforcement Agents were stationed at each end of the bridge to ensure public safety. This repair work was completed on June 29, 2001.

## ***Belt Parkway Bridge over Paerdegat Basin (Brooklyn)***

The navigation lights were inspected and repaired on June 25, 2001.

## ***East River Park Esplanade (Manhattan)***

An underwater inspection of the relieving platform along the East River Park by the marine borer project consultant revealed that the pile caps were severely deteriorated. The relieving platform supports the esplanade of this section of the park near the Williamsburg Bridge for its entire 5,000 foot length, from approximately Grand Street to approximately 13th Street. The consultant concluded that the relieving platform was not structurally safe. To ensure public safety, the esplanade was closed on June 28, 2001, and a more substantial fence was subsequently installed by the Parks Department.

## ***Retaining Wall Study***

The purpose of this study, begun in 1999, was to identify, locate, determine ownership, and make condition assessments of the retaining walls under the City's jurisdiction, and to inventory the retaining walls associated with the arterial highways and streets within the City's five boroughs, as well as the retaining walls associated with the 759 City-owned bridges. A computerized database with a GIS link was developed. The project was completed on June 28, 2001.

## **JULY**

### ***Carroll Street over the Gowanus Canal (Brooklyn)***

On July 2, in response to public safety concerns, Division personnel commenced repairing loose railing, loose and broken deck planks, and likely sidewalk tripping hazards. These repairs were completed on July 9, 2001.

### ***Guy Brewer Boulevard over Belt Parkway (Queens)***

A Notice to Proceed for the reconstruction of this bridge was issued to the contractor with a start date of July 9, 2001.

### ***Brooklyn-Queens Expressway at Atlantic Avenue (Brooklyn)***

On July 14, 2001, the Division of Bridges and the Division of Street and Arterial Maintenance began a milling and repaving operation on the triple-cantilever section of the Brooklyn-Queens Expressway, from Atlantic Avenue to Cadman Plaza, in response to community complaints of noise and vibrations. This work, which was completed on August 3, 2001, will provide an improved riding surface until our long-term repair program can be implemented in approximately 3 years.

### ***Manhattan Bridge***

Effective July 22, 2001, NYCT suspended subway service on the north tracks (B and D lines) of the Manhattan Bridge, and restored service on the south tracks (Q and W lines).

### ***Borden Avenue Bridge over Dutch Kills (Queens)***

On July 26, 2001, Division personnel re-installed the bridge's northwest crash gate, which had been damaged in a vehicular accident on January 5 and subsequently re-fabricated in-house.

### ***Henry Hudson Parkway Ramp (SB) to 79th Street over 79th Street Boat Basin Garage (Manhattan)***

In July 2001, Division personnel completed the rebuilding of 25 feet of a stone parapet wall that was damaged in a vehicular accident on June 23, 2001. The crash's impact had caused the stones to fall into the park restaurant area under the traffic circle. To keep the public safe until the completion of the repairs, Department personnel had installed Jersey barriers and steel rails.

### ***Ocean Parkway over LIRR (Brooklyn)***

The component rehabilitation of this bridge was completed in July 2001.

### ***4th Avenue Bridge over NYCT (Brooklyn)***

This bridge was substantially completed on July 12, 2001. This project was completed on schedule.

### ***236th Street Pedestrian Bridge over the Henry Hudson Parkway (Bronx)***

In July 2001, in response to a request from Community Board #8, yellow stripes were painted on the noses of the bridge steps. This will make the steps more visible for the large number of senior citizens who use the bridge.

## **AUGUST**

### ***Manhattan Bridge***

Work began on the north tracks of the Manhattan Bridge on August 1, 2001.

### ***Macombs Dam Bridge over Harlem River (Bronx/Manhattan)***

On August 1, 2001, Division personnel completed repairs to the retaining wall at 161<sup>st</sup> Street, that had been damaged in a vehicular accident on July 23, 2001.

### ***Bruckner Expressway over Westchester Creek (Bronx) (a.k.a. Unionport Bridge)***

On August 4, 2001, Division personnel installed bridge median dividers with a new treated timber base. This was necessary as the old base was largely rotted or otherwise damaged.

### ***Yankee Stadium Ferry Landing (Bronx)***

On August 4, 2001, Division ironworkers performed emergency repairs to the gangway hinges of the Yankee Stadium Ferry Landing, which were cracked and presented a potential hazard to passengers arriving for the game, later that day. The hinges were deep-ground, cleaned, and welded back in time to serve passengers for the ball game.

### ***Belt Parkway Bridge over Mill Basin (Brooklyn)***

The bridge was closed to marine traffic on August 8, 2001 around noon, because of the thermal expansion of the leaves. After three days of extremely hot weather, a successful opening of the bridge was conducted on the morning of August 11, when the temperature had sufficiently cooled.

### ***Manhattan Bridge***

Installation of a dehumidification system for the anchorages, which began in April 2001, was completed on August 17, 2001.

### ***Queensboro Bridge***

On August 17, 2001, Division ironworkers completed safety-related and structural repairs to the kiosk in the plaza on the Manhattan side of the bridge.

### ***Hamilton Avenue Asphalt Plant (Brooklyn)***

On August 25 through August 29, 2001, Division ironworkers performed emergency repairs on the plant's crusher.

### ***Westchester Avenue over Hutchinson River Parkway (Bronx)***

This bridge supports a transit structure overhead and has substandard clearance over the highway below. The bridge's girders were struck by unauthorized overheight vehicles 14 times in 2001. A project to install an Intelligent Transportation Systems (ITS) solution, which includes the

## CHRONOLOGY

installation of an overheight vehicle detection system that will flash signs directing vehicles identified as being over 9' in height to exit the parkway, will be completed within the next year. The project also includes cameras that will be activated by acoustics and will document future damage to the bridge for recoupment of costs by the City. A Notice to Proceed for this project was issued to the contractor with a start date of August 27, 2001.

### ***Marine Borer Project***

Beginning in August 2001, the consultant commenced a spot-check of all City-owned relieving platforms along the East River to identify any critical areas prior to a detailed inspection.

## SEPTEMBER

### ***Terrorist Attack***

In the aftermath of the terrorist attack on the World Trade Center on September 11, 2001, Division personnel, including ironworkers, electricians, carpenters, oilers and others, assisted at the site. In addition to performing work specific to their trade, they performed other tasks as requested by the Office of Emergency Management -- cleaning and debris removal, transporting construction material, assuring continuity of light and power, pumping out water from flooded facilities, and assisting with the pedestrian evacuation from lower Manhattan. Ironworkers also fabricated the steel docking fenders for the new pedestrian ferry landing, while electricians rewired the Command Center at Pier 11 and maintained lighting and pumping equipment in underpass and West Street Tunnel. Other Division employees provided crowd control on the Piers, helped NYPD to develop the maintenance and protection of traffic (MPT) schemes, directed the maintenance of the emergency delineators on the Brooklyn Bridge, and cleaned the Staten Island Ferries prior to resumption of regular service. In addition, Division engineers performed bridge, street, tunnel, and building inspections.



### ***Hope Avenue over Abandoned Railroad (Staten Island)***

A Notice to Proceed for the demolition of this bridge was issued to the contractor with a start date of September 17, 2001. An at-grade roadway and sidewalks will be installed in place of the current bridge.

## ***Bridge Inspections***

On September 21 and 22, 2001, in response to rumors of further planned terrorist attacks, Division personnel inspected the Harlem River, Brooklyn and Queensboro Bridges, and consultants inspected the Williamsburg and Manhattan Bridges.

## **OCTOBER**

### ***91st Place over LIRR (Queens)***

A Notice to Proceed for the reconstruction of this bridge was issued to the contractor with a start date of October 11, 2001.

### ***Manhattan Bridge***

Contract #8C was substantially completed on October 15, 2001.

### ***Kings Highway Bridge over BMT Subway (Brooklyn)***

The bridge was opened to traffic on October 16, 2001, with Commissioner Weinshall presiding over the ribbon cutting ceremony. The project was completed 15 months ahead of the original schedule, and one week ahead of the accelerated schedule agreed upon with the community.

### ***Park Avenue South Scaffolding Collapse (Manhattan)***

On October 24, 2001, Division personnel joined other agencies in the emergency response to the scaffolding collapse at 215 Park Avenue South between 17th and 18th Streets. Crews assisted the rescue effort, and provided steel plates and portable light sets.

### ***Williamsburg Bridge***

The painting contract for the main and intermediate towers of the bridge was substantially completed on October 25, 2001.

### ***Earthquake***

At approximately 1:42 AM on October 27, 2001, a magnitude 2.6 earthquake struck NYC, centered in midtown Manhattan just south of Central Park. Division engineers inspected the Pulaski Bridge and the masonry arches over the transverse roads in Central Park, as well as the Manhattan arches of the Manhattan Bridge. No obvious damage was found.

### ***Conference***

On October 29 and 30, 2001, Division engineers attended the New York City Bridge Conference. At the session "Bridge Performance and Rehabilitation," Chief Bridge Officer Henry Perahia presented a paper on the New York City Bridge Rehabilitation Program. Deputy Chief Engineer Jay Patel chaired the poster session on long span bridges, at which he, Seismic Engineer Jagtar Khinda, and F. Lin from Polytechnic University of New York, presented "Preparing the Manhattan Bridge for the Next Century." Dr. Yanev, the Division's Director of Inspections, Research and Development, chaired the session on "Examples From Worldwide Bridge Experience." The papers will be published in a special issue of the ASCE Journal of Bridge Engineering.

## **Award**

The reconstruction of the Ninth Street Bridge over the Gowanus Canal in Brooklyn was selected by the National Steel Bridge Alliance to receive the Prize Bridge Award in its Movable Span category. The Prize Bridge Awards honor significant and innovative steel bridges constructed within the United States. The awards are presented at the World Steel Bridge Symposium. The projects are judged on innovation, aesthetics, and design and engineering solutions.



Ninth Street Bridge

## **Travis Avenue over Main Creek (Staten Island)**

The component rehabilitation of this bridge began on October 29, 2001.

## **Manhattan Bridge**

An annual inspection of the bridge revealed that six deteriorated suspender ropes on Cable C needed replacement. This work, included as part of the flag repairs under Contract #8C and Contract #10, began in April 2001, and was completed on October 31, 2001.

## **DUMBO Arts Festival**

In October 2001, Division personnel provided electrical services for the festival.

## **Staten Island Ferries**

In October 2001, at the Coast Guard's request, Division personnel assisted in the installation of chain-link fencing to protect the pilot houses and ventilation systems on the Staten Island ferries.

## **NOVEMBER**

### **Belt Parkway Bridge over Mill Basin (Brooklyn)**

On November 1, 2001, Division personnel re-installed the west leaf motor brake assembly, which had been removed for in-house restoration on August 20.

### **Macombs Dam Bridge over Harlem River (Bronx/Manhattan)**

Stage II reconstruction of the bridge began on November 2, 2001, after the conclusion of World Series play at Yankee Stadium.

## ***New York City Marathon***

In preparation for the Marathon on November 4, 2001, Division personnel relocated barriers and performed asphalt repairs on the Queensboro Bridge, and prepared lanes for runners and vehicular traffic with barriers and hay bales. In response to the Road Runners Club's concerns about tripping hazards on the Willis Avenue Bridge, crews sheared off the pins on a steel plate on the Manhattan side of the bridge. In addition, on the Bronx side of the bridge, plates were placed over an expansion joint to produce a smooth running surface. On the day before and on the morning of the event, Division personnel conducted a final check of the route for tripping hazards and swept it where necessary.

## ***Thanksgiving Day Parade***

Division engineers reviewed and approved the design specifications of five new large balloons to be introduced in the parade, as follows: Curious George, Jimmy Neutron, Pikachu, Cheesasaurus Rex, and a redesigned Big Bird. A balloon is classified as large if it is more than 5,000 cubic feet. However, the balloons in the parade cannot be taller than 70 feet, wider than 40 feet, or longer than 78 feet.

On November 3, 2001, a Division engineer attended the successful test flight in the New Jersey Meadowlands of the new balloons. Division personnel removed traffic bollards from the parade route along Broadway from Times Square to Herald Square, and restored them the following weekend. On November 23, Chief Bridge Officer Henry Perahia and two Division engineers, as well as three consultants, were positioned at various locations along the parade route to ensure that the balloons were flown within the prescribed requirements for the wind conditions at that site. At the northeast corner of Broadway and 42nd Street, the Condé Nast building owner pulled overhead lights inboard approximately four feet, alleviating the Division's concerns about their possible interference with the balloons. Wind speeds were low, ranging from only 5 mph at the starting point to 12 mph at the intersection of 46th Street and 7th Avenue.

## ***Belt Parkway Bridge over Mill Basin (Brooklyn)***

On November 11, 2001, Division personnel began a project to replace all of the bridge's poor gratings and purlins on the Mill Basin Bridge east-bound. This is a combination of field work performed at night and shop fabrication work. As of the end of 2001, 20 grating panels and their supporting purlins were replaced.

## ***Belle Harbor Plane Crash (Queens)***

Following the American Airlines Flight 587 crash on November 12, 2001 in Belle Harbor, the Mill Basin Bridge was taken out of service to boats from 9:30 AM to 4:00 PM to ensure that a bridge opening would not impede rescue efforts. The Coast Guard was notified. In response to a request from the Office of Emergency Management, Division personnel picked up and transferred 12 generator light towers from Ground Zero to the crash site.

## ***St. Felix Street (Brooklyn)***

In January 1997, an eight inch water main burst beneath St. Felix Street between Hanson Place and Lafayette Street. This break caused damage to a number of buildings, including partial wall collapses, building façade cracking, and stoop moving. Inspection revealed pervasive soil loss under the street bed over several blocks.

The B and D subway lines run below the street, along with numerous public and private utilities. The #2, #3, #4, and #5 subway lines and the Long Island Railroad run immediately adjacent to that area, as well. Any of these infrastructure elements could be the cause of, or could have contributed to, the existing soil loss.

Preliminary evidence pointed to an uncontrollable backfill condition during the original subway construction in 1916. Soil borings and test pits suggested that timber was left in the ground causing huge voids below the street's surface. Over the years, the soil shifted into the voids causing water main damages.

## CHRONOLOGY

Consequently, in the interest of public safety, the Agency declared the situation an emergency, pursuant to Section 315 of the New York City Charter.

Soil stabilization, drilling and grouting were completed in December 1997. Façade work began in March 1999. In the Spring of 2000, the Landmarks Preservation Commission requested the full replacement of all windows for all of the houses.

These repairs were substantially completed on November 15, 2001. The street has been stabilized and its houses restored to early 20th century landmark condition. The project provided homeowners with new facades, straight stoops, areaways and trees, lampposts, stamped colored concrete sidewalks, custom-made windows and cornices, and numerous other exterior and interior repairs.

### ***Brooklyn-Queens Expressway at Atlantic Avenue (Brooklyn)***

On November 17, 2001, Division masons and laborers began to saw-cut a large number of expansion joints on the eastbound Brooklyn-Queens Expressway from Atlantic Avenue to Cadman Plaza. This work supplemented the extensive repairs performed in July 2001 in a joint operation by the Division of Bridges and the Division of Street and Arterial Maintenance. After the cutting concluded, the joints were crack sealed, and the deteriorated concrete was repaired. This work was completed on December 20, 2001.

### ***Belt Parkway Bridge over Mill Basin (Brooklyn)***

On November 18, 2001, crews removed deteriorated planks from the south sidewalk and replaced them with non-skid fiberglass panels.

### ***6th Avenue Bridge over LIRR & NYCT (Brooklyn)***

On November 26, 2001, the first stage of this reconstruction project was completed, and one lane of the roadway in each direction was reopened to traffic.

### ***Brooklyn Ferry Dock***

In November 2001, Division ironworkers completed fabrication of a barge-mounted fender for the Brooklyn passenger ferry dock.

### ***Myrtle Avenue over Jackie Robinson Parkway (Queens)***

The component rehabilitation of this bridge, which began on July 16, 2001, was completed in November 2001.

### ***6th Avenue over LIRR (Brooklyn)***

The component rehabilitation of this bridge was completed in November 2001.

## **DECEMBER**

### ***Award***

The New York Construction News "Best of 2001 Awards Program" selected the restoration of the Queensboro Bridge/Bridgemarket as the 2001 Rehabilitation Project of the Year. The Bridgemarket is located in the Guastavino tiled vaults underneath the Manhattan approaches to the Queensboro Bridge. In conjunction with the EDC, the Department allocated \$2.9 million dollars in Queensboro Bridge Contract #5 to include the repair and repainting of the existing windows and frames, the replacement of missing Guastavino tiles, the repair of the terra-cotta columns, the repointing of the tiled arches and vaults, and the cleaning and repointing of the outside granite masonry and tiled surfaces above the windows. The Department uncovered that the deterioration was more extensive than was previously suspected. This led to the total replacement of the windows and frames, the use of pressure grouting to restore the footing and load bearing capacity of a structural support masonry column, a thorough rehabilitation of the Guastavino tiled vaults and terra cotta columns, and the complete rebuilding of several of the

Guastavino tiled arches. The jury cited the project solutions as “innovative and creative in the adaptive reuse of a space that changed the neighborhood around it.”

### ***Hamilton Avenue Asphalt Plant (Brooklyn)***

On December 1, 2001, Division ironworkers made emergency repairs to the plant's chutes and the truck scale.

### ***Battery Park Underpass of the FDR Drive (Manhattan)***

The tunnel was heavily utilized during the previous few months by World Trade Center clean-up traffic. A thorough cleaning of the chamber pits and drains, repair of potholes, and removal of damaged ceiling mesh was necessary to prevent major damage. This urgent repair work was performed in the south tube on December 2, 2001, and in the north tube on December 8, 2001.

### ***Williamsburg Bridge***

On December 5, 2001, Division ironworkers repaired the bridge's suicide gates on the main cables. This was a safety as well as a security issue.

### ***Coney Island Avenue Bridge over Belt Parkway (Brooklyn)***

This bridge was substantially completed on December 7, 2001. This project was completed on schedule.

### ***Williamsburg Bridge***

The North Outer Roadway reopened on December 10, 2001, 50 days ahead of schedule, allowing trucks back onto the Manhattan-bound Williamsburg Bridge, and earning the contractor the maximum incentive. The opening ceremony was presided over by Mayor Guiliani and Commissioner Weinshall.

### ***Guy Brewer Boulevard Bridge over Belt Parkway (Queens)***

Erection of the temporary utility bridge was completed on December 18, 2001. Installation of the temporary pedestrian bridge superstructure for this reconstruction project was completed on December 20, 2001.

### ***Brooklyn-Queens Expressway (WB) over Old Fulton Street (Cadman Plaza) (Brooklyn)***

On December 18 and 28, 2001, Division personnel repaired and re-secured roadway plates on the westbound Brooklyn-Queens Expressway over Old Fulton Street, in response to community noise complaints.

### ***Mayoral Inauguration***

On December 27, 2001, in preparation for the Mayoral inauguration, the Division supplied personnel and equipment to assist in the hanging of bunting and other decorations at City Hall.

### ***Queens Boulevard Bridge over Amtrak and LIRR Yard (Queens)***

The first stage of this project was completed on December 28, 2001.

### ***Flatbush Avenue Bridge over Belt Parkway (Brooklyn)***

This bridge was substantially completed on December 28, 2001. This project, which included improving the minimum vertical clearance from 13'5" to 14'0", was completed on schedule.

### ***Greaves Ave (Great Kill Road) Bridge over SIRT South Shore (Staten Island)***

The bridge was opened to traffic on December 29, 2001.

### ***Queensboro Bridge***

The installation of the bridge's necklace lighting, which began on June 17, 2001, was completed in December, 2001.

Contract #5 was completed on December 31, 2001.



Queensboro Bridge

### ***New Year's Eve***

At the request of the Mayor's Office of Special Events, Division personnel removed traffic bollards in Times Square during the nights of December 27 and 30, 2001 and restored them on January 2, 2002. Temporary cones, barrels, and delineators ensured the public's safety during the absence of the bollards. These temporary devices were in turn removed when the area was closed to traffic, and put back in the early morning of New Year's Day.

### ***Corbin Place Overpass over Corbin Place (Manhattan)***

The component rehabilitation of this bridge was completed in December 2001.

### ***Slater Boulevard over New Creek (Staten Island)***

The component rehabilitation of this bridge, which began on October 29, 2001, was completed in December 2001.

## INNOVATIONS & ACCOMPLISHMENTS

### ***East River Bridges***

A \$2.5 billion reconstruction program is underway to rehabilitate all four East River crossings. In 2000, these bridges carried some 514,800 vehicles per day.

### **QUEENSBORO BRIDGE/BRIDGEMARKET AWARD**

The New York Construction News Best of 2001 Awards Program selected the restoration of the Queensboro Bridge/Bridgemarket as the 2001 Rehabilitation Project of the Year. The Bridgemarket is located in the Guastavino tiled vaults underneath the Manhattan approaches to the Queensboro Bridge. The architect, Rafael Guastavino, who emigrated to the United States from Spain in 1881, revived a centuries old construction method. This technique uses a system of interlocking terra cotta tiles set in mortar, that allows the building of self-supporting arches to span large openings without iron beams.

In conjunction with the EDC, the Department allocated \$2.9 million dollars in Queensboro Bridge Contract #5 to include the repair and repainting of the existing windows and frames, the replacement of missing Guastavino tiles, the repair of the terra cotta columns, the repointing of the tiled arches and vaults, and the cleaning and repointing of the outside granite masonry and tiled surfaces above the windows. The Department uncovered that the deterioration was more extensive than was previously suspected. This led to the total replacement of the windows and frames, the use of pressure grouting to restore the footing and load bearing capacity of a structural support masonry column, a thorough rehabilitation of the Guastavino tiled vaults and terra cotta columns, and the complete rebuilding of several of the Guastavino tiled arches. The jury cited the project solutions as “innovative and creative in the adaptive reuse of a space that changed the neighborhood around it.”



Guastavino's Restaurant at the Bridgemarket

## INNOVATIONS & ACCOMPLISHMENTS



Food Emporium & the Conran Shop at the Bridgemarket

### QUEENSBORO BRIDGE

At the time of its completion in March 1909, the Queensboro Bridge (popularly referred to as the 59<sup>th</sup> Street Bridge), was the longest continuous cantilever-truss bridge in the world. While its starring role in the hierarchy of bridges has since been eclipsed by longer and larger structures, the Queensboro Bridge's importance to the mobility and unity of New York City remains undimmed. The \$650 million reconstruction commenced in April 1981 with Contract #1, continues with Contract #6, (currently in the design phase and scheduled for completion in 2005), and will end with a seismic retrofit of the bridge, slated for completion in 2008. The work on this vital link between Manhattan and the outer boroughs will enable this 75,000-ton workhorse to better provide the citizens and commerce of New York City with a second century of reliable, prosperous transport. The Queensboro Bridge carried some 182,900 vehicles per day in 2000.

#### Contract #5

**Contract #5** included the rehabilitation of the bridge's north and south lower outer roadways. The rehabilitation work started in August 1995 and was completed on December 31, 2001. The project cost approximately \$210 million. This contract included the rehabilitation of stringers, floorbeams, tie angles, new curbs, barriers, railings, truss covers, a drainage system, necklace and navigational lighting, a new ramp at the Manhattan Approach, reinstallation of six Con-Edison high voltage main feeders, and the Maintenance Shops at the Manhattan Approach.

The entire Bridgemarket area was opened to the public. It features a restaurant (Guastavino's) and a food market (Food Emporium) adjacent to the Conran shop. The DOT has received several awards for the renovation of this historic facility.

## INNOVATIONS & ACCOMPLISHMENTS



New Lighting



North Outer Roadway

### Contract #6

Currently in the design phase, **Contract #6** will include the following: condition investigation of the eyebar heads and pins, replacement of the protective screening and the aviation warning lights, drainage improvements, rehabilitation of the overhead sign structures in Manhattan, the upgrading of roadway lighting, cleaning and miscellaneous repairs of the anchor piers, the geometric improvement of Crescent Street, and bikeway and walkway improvement. The work will also include the repair of the south upper roadway concrete overfill and overlay, as well as the underside of the 59th Street overpass. In addition, the kiosk in the plaza on the Manhattan side of the bridge will be restored. This small historical structure is in an advanced state of disrepair and has been damaged by repeated vehicular impacts. This \$36 million project is expected to start in 2003 and be completed in 2005.

### WILLIAMSBURG BRIDGE/BMT STRUCTURE AWARD

In June 2001, the reconstruction of the Williamsburg Bridge/BMT Structure (Contract #6) was selected as the 2001 Construction Achievement Project of the Year by the Metropolitan Section of the American Society of Civil Engineers. This \$130 million dollar DOT project included the removal and replacement of the structure supporting the BMT subway (including the rail and signal system), and the removal and replacement of the rail system, consisting of approximately 7,000 linear feet of structure and 14,000 linear feet of track. The project was completed 35 days ahead of schedule. The award recognized the project's excellence and the unique application of civil engineering principles.

## INNOVATIONS & ACCOMPLISHMENTS



Williamsburg Bridge

### **WILLIAMSBURG BRIDGE**

The largest of the three suspension bridges that traverse the East River, the Williamsburg Bridge carries some 183,000 daily commuters - 108,000 in vehicles and 75,000 via mass transit - on eight traffic lanes, two heavy rail transit tracks, and a pedestrian footwalk, between Manhattan and Brooklyn. The bridge supports a subway transit line upon which three different train lines operate (J, M, and Z).

In order to minimize disruption to the riding public and ensure that traffic is maintained across the bridge, the rehabilitation of the Williamsburg Bridge was divided into several contracts. In the three contracts completed to date, all four main cables have been completely rehabilitated, the south roadways of the bridge have been replaced and the BMT subway structure across the bridge was completely reconstructed.

#### **Contract #6**

The contract for the reconstruction of the BMT subway structure was extended beyond its original completion date of February 15, 2000, to include maintenance platform installation, bearing replacement, and completion of additional New York City Transit work. It was completed in July 2001, at a cost of approximately \$166 million.

## INNOVATIONS & ACCOMPLISHMENTS



Contract #6 Track Installation and Steel Installation



Contract #6 Rail and Track Installation

### Contract #7

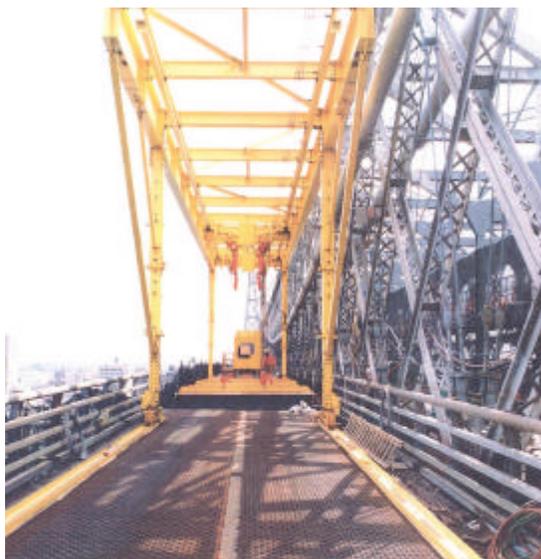
The reconstruction work on the north roadways of the Williamsburg Bridge is a mirror image of the completed reconstruction work on the south roadways. It includes the complete replacement of the main bridge deck with a steel orthotropic deck system and the construction of new structures on both the Manhattan and Brooklyn approaches. This \$202.8 million contract includes provisions for financial disincentives to ensure that the project is completed within the scheduled roadway closure period, thereby minimizing the impact the closures have on the public. The contract also contains incentive clauses to reward the contractor for early completion of each phase of the project.

## INNOVATIONS & ACCOMPLISHMENTS



Contract #7 Installing An Orthotropic Deck Panel

Work on the north roadway substructure (pile foundations, piers and columns), began in early 2000. All four lanes that constitute the north roadways of the bridge were closed to traffic on January 29, 2001 for demolition and reconstruction.



Contract #7

The two lanes on the north outer roadway were completed and reopened to traffic on December 10, 2001, 50 days ahead of schedule. This allowed four travel lanes into Manhattan during the morning rush hour, and four lanes into Brooklyn during the afternoon rush hour. In addition, Manhattan-bound truck traffic was restored to the two outer roadway lanes, decreasing the demand at both the Manhattan Bridge and the Queens Midtown Tunnel. The contractor earned \$100,000 per day (for a maximum of 50 days) in incentive payments for early completion. Construction continues on the two lanes of the north inner roadway, which are scheduled for completion and reopening in July 2002.

## INNOVATIONS & ACCOMPLISHMENTS

The Department will continue to maintain pedestrian/bike access across the bridge. The south footpath/bikeway will remain open at all times. During Contract #7, DOT will construct a new Manhattan approach ramp and north footpath/bikeway. Upon completion, the new footpath/bikeway will have one common access point for pedestrians and cyclists in Manhattan at Clinton Street, which will lead to a crossover before the main span of the bridge to enable people to access either the north or south paths. The north path will be dedicated to bicyclists and will lead to an access point at Washington Park in Brooklyn. The south path will be dedicated to pedestrians and will lead to an access point at Bedford Avenue. Completion of the new north walkway will also mean that, for the first time ever, the bridge will be accessible to wheelchair users and meet the requirements of the Americans with Disabilities Act.

### Contract #8

**Contract #8** is slated for bid in September 2002, started in February 2003, and finished by December 2006. This \$148 million project will see the rehabilitation of the tower bearings, the truss system, the steel structure of all eight towers, and the north comfort station houses, the replacement or adjustment of the cable suspenders, the installation of maintenance travelers (inspection platforms) under the main span, as well as painting of the stiffening trusses. Architectural work will include the restoration of decorative lights and the Brooklyn granite stone monument. Work inside the anchorage houses on both the Manhattan and Brooklyn sides will include the construction of new stairs, a hoisting system, ventilation and lighting, and oiling platforms. The project will also include the installation of an Intelligent Transportation System (ITS).



Brooklyn Tower Leg

Such improvements will not only restore the structural integrity of the Williamsburg Bridge, but will also allow it to carry an increasing number of pedestrians and bicyclists, thereby reducing automobile congestion and its concomitant air pollution in New York City.

## INNOVATIONS & ACCOMPLISHMENTS

### MANHATTAN BRIDGE

The youngest of the three suspension bridges that traverse the East River, the Manhattan Bridge carries some 341,700 commuters – 75,700 vehicles and 266,000 mass transit riders - between Manhattan and Brooklyn daily. It was designed by Leon Moisseiff and completed in 1909. The bridge supports a subway transit line upon which four different train lines operate.

#### Contract #8C

**Contract #8C**, for the painting and interim rehabilitation of the south side of the bridge, was awarded in FY 1997 at a cost of \$124.1 million. This was the first major painting in many years. In order to ensure the safety of the general public, existing lead paint was removed by abrasive blasting inside a full-containment structure with negative air pressure.



Full Containment on the Manhattan Bridge

A newly designed temporary jacking/support system was utilized for the replacement of the truss bearing on the approach to the bridge. The system was supported on the pier adjacent to the bearing and grillage that was replaced. Traffic was maintained during this project.

A track-mounted crane was utilized to remove and replace the stringers and floor beams supporting the south side subway tracks.

The Manhattan Arch and Colonnades were designed by the architectural firm of Carrere & Hastings and constructed between 1901 and 1909. The Manhattan Bridge Arch, inspired by François Blondel's Porte St. Denis in Paris, is one of only three triumphal arches in the United States (Washington Square Park and Grand Army Plaza contain the other two). The three sculpture groups in the arch are "The Spirit of Commerce" on the north pier of the arch and "The Spirit of Industry" on the south pier of the arch, both designed by Carl A. Hever, and the "Native American Buffalo Hunt," depicted in a 6 foot by 40 foot panel at the top of the arch, designed by Charles Cary Rumsey. The restoration was completed in December 2000. The work included reconstruction of the roof, together with new waterproofing and drainage systems; an architectural illumination system for the arch and colonnades; and the rehabilitation, cleaning, and graffiti protection of the masonry. In the Bridge Plaza, roadways and traffic islands were realigned, granite block paving was installed, lighting was improved, and trees were planted.

## INNOVATIONS & ACCOMPLISHMENTS

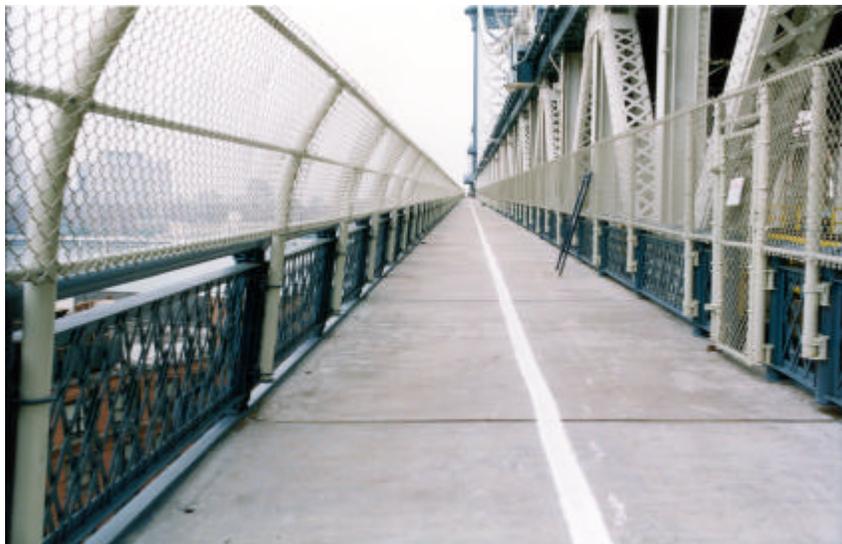


Manhattan Bridge Arch

The south lane of the lower roadway of the bridge was reopened to traffic in the Spring of 2001.

The Manhattan Bridge bicycle path was closed in the 1960's because it fell into such disrepair that it became unsafe. On May 16, 2001, Commissioner Weinshall cut the ribbon for the new 6,000-foot long pedestrian and bicycle path. The Commissioner then led the cyclists on a ceremonial ride to celebrate the historic opening of this Class I multi-use lane that serves as a new link between Manhattan's Chinatown and downtown Brooklyn. The lane, along the south side of the bridge, is designed for pedestrians, but will temporarily serve cyclists too, until they get their own lane on the north side in three years. The ceremony was scheduled during Bike Week, the annual celebration of bicycle culture organized by Transportation Alternatives and co-sponsored by DOT. The path officially opened on June 25, 2001, after construction was completed. All four of the East River bridges are now bicycle/pedestrian accessible.

## INNOVATIONS & ACCOMPLISHMENTS



Manhattan Bridge Pedestrian and Bicycle Path

The NYSDOT accepted design features proposed by the Division to reduce maintenance costs and activities on the Manhattan Bridge. The features include:

Installation of a new generation of Modular Joints designed to withstand the large fatigue forces present on the bridge. Since these modular joints are sealed, this eliminates the maintenance problems associated with finger joints; the replacement of current steel rocker bearings (which require cleaning and lubrication every 6 months) with new multi-rotational bearings which have stainless steel and Teflon sliding surfaces (these require no lubrication and limited cleaning); the installation of a new drainage system that will direct water to a large diameter downspout system, eliminating the need for sump pits; the installation of self-lubricating rockers in the anchorages; and the installation of maintenance platforms and debris netting under the approach spans to allow easier access to the bottom chord of the trusses.



First Saddle Repairs on the Manhattan Bridge Since 1909.

Construction started on July 7, 1997 and was substantially completed on October 15, 2001. This contract marked the end of the rehabilitation of the south side of the bridge.

## *INNOVATIONS & ACCOMPLISHMENTS*

### **Contract #10**

Begun in March 2001, and scheduled for completion in September 2004, **Contract #10** will bring the following improvements: rehabilitation of the north main span; refurbishment of the approach spans, tunnels and truss bearings; installation of a dedicated bicycle way on the bridge's north side, and painting.

The scope of work includes a new ITS. The ITS, providing coverage from Bowery Street in Manhattan to Tillary Street in Brooklyn, will consist of Closed Circuit Televisions (CCTV), and Variable Message Signs (VMS). This will provide full coverage for the Manhattan Bridge upper and lower roadways, including the south walkway and north bikeway. Ranging radar detectors will determine the volume and occupancy of the traffic on the bridge, and the CCTV will be utilized to confirm any incident. Operators at the Traffic Management Center in Long Island City will obtain data and video from the ITS. This will enhance the management of traffic on the bridge and its vicinity and assist incident management. A total of 19 cameras and 7 VMS will be installed on the bridge.

The north lane of the lower roadway was closed to traffic in June 2001 for use as a construction staging area. At the same time, the south lane of the lower roadway was reopened to traffic. Subway service was restored to the south tracks on July 22, 2001. On that same day, service was temporarily discontinued on the north tracks until January 31, 2004.

These upgrades will not only restore the structural integrity of the Manhattan Bridge, but will also allow it to carry an increasing number of pedestrians and bicyclists. This will reduce automobile congestion and its associated air pollution in New York City.

### **BROOKLYN BRIDGE**

In response to community complaints, an anti-pigeon sonic device was installed in March 2001 at the Brooklyn entrance to the Brooklyn Bridge pedestrian and bike walkway. The system is a large black box that produces sounds that cause the birds to move on to other locations. In addition, physical barriers were placed on the underside of the bridge for the pigeons who remained unaffected by the device.

The next work scheduled for the Brooklyn Bridge is a \$8 million project to replace the existing travelers with a state of the art technology system. Construction is scheduled to begin in the Fall of 2004 and conclude in the Fall of 2006.

### ***Movable Bridges***

As NYCDOT completes reconstruction work on the East River Bridges, more attention is being devoted to other key City-owned bridges, such as the movable bridges. Building on the success of the East River Bridge projects, the Department is implementing many of the innovative concepts originated during the rehabilitation of East River Bridges on these other major reconstruction projects.

## *INNOVATIONS & ACCOMPLISHMENTS*

### **BELT PARKWAY BRIDGE OVER MILL BASIN (BROOKLYN)**

When the Mill Basin Bridge was constructed during the first half of the 20<sup>th</sup> century, New York City's inland waterways were among the most heavily navigated thoroughfares in the country. However, as maritime traffic in New York City steadily decreased since the mid-1960s, the need for movable bridges lessened as well. In 1941, during its first full year of operation, the Mill Basin Bridge was opened 3,100 times; by 1953, that figure decreased to 2,173; by 2001, the number of openings declined further to a total of only 317 openings.

In addition, significant and costly traffic congestion results from the operation of this outmoded drawbridge. In 2000, the Mill Basin Bridge carried 145,070 vehicles per day. The average opening and closing time for the bridge (and others like it) is ten minutes. Thus, this structure's operation has a negative and significant effect on the efficiency of New York City's vehicular traffic flow.

The bridge is a 14 span structure, consisting of a double leaf steel bascule span. The substructure is made of reinforced concrete abutments and piers supported on precast concrete or timber piles.

Under the Department's current proposal, the Mill Basin Bridge will be replaced with a new, high-level, fixed bridge. The bridge will be constructed next to the existing structure so as to maintain traffic during the construction period. It will feature three lanes of vehicular traffic, as well as a 12-foot wide shoulder in each direction. A new sidewalk/bicycleway will be also be added.

Currently in its final design phase, the \$131 million reconstruction of the Mill Basin Bridge is scheduled to start in Fall 2004, and to last approximately 3½ years. The bridge will be reconstructed in four stages, while maintaining three traffic lanes in each direction and a bike/pedestrian path on the eastbound side during construction.

As an interim measure, beginning in September 2001, part of the existing deck grating (approximately 20 plated-over panels) of the bridge are being replaced. All work will be done at night. The project is expected to conclude in late Spring 2002.

### **MACOMBS DAM BRIDGE OVER THE HARLEM RIVER (BRONX/MANHATTAN)**

The Macombs Dam Bridge, which has one of the longest swing spans in the world, was opened in 1895. The \$136 million reconstruction of this landmark bridge includes the West 155<sup>th</sup> Street viaduct, the west approach plaza over the Harlem River Drive and Seventh Avenue, the swing span over the Harlem River, the deck and camelback trusses over Metro-North Railroad and Conrail, the Major Deegan interchange (consisting of the east approach and four ramps), and the Jerome Avenue viaduct. Each of the three stages of the contract includes an incentive for early completion of \$50,000 of per day with a cap of \$2 million. There is a disincentive of \$100,000 for each day the contractor is late in finishing a stage with no limit to the amount of penalty. The rehabilitation work will not only strengthen the structure, it will also return the bridge's appearance to its turn of the century grandeur.

As part of this project, the historic John Hooper Fountain, which dates from 1894, was fully rehabilitated in Fall 2000. After studying detailed old photographs, the globe and weather vane were recast and replicated. Cast aluminum was used with high impact glazing similar to the lanterns installed in Central Park in the 1980's. Just east of the fountain, a garden of rose bushes was added for the community's pleasure. Other additions include a new paved island, new curbs, and a steel fence. Bollards were installed at the western end of the island to protect the fountain from vehicular traffic.

## INNOVATIONS & ACCOMPLISHMENTS



John Hooper Fountain Globe

The first stage of construction was completed on March 31, 2001. It included the installation of structural components, as well as the deck replacement of the northern one-third area of the bridge and the West 155<sup>th</sup> Street viaduct. This milestone date was met even though thirty working days were lost from the work period due to the post season play of the New York Yankees. Essentially twelve months' worth of work was compressed into the five worst weather months of the year.



New Trusses at the Jerome Avenue Approach  
To the Macombs Dam Bridge

## *INNOVATIONS & ACCOMPLISHMENTS*

The second stage of construction began on November 2, 2001, after the conclusion of World Series play at Yankee Stadium. It consists of the installation of structural components as well as the deck replacement of the middle one-third area of the bridge. This stage is slated for completion by March 31, 2002. Expected completion of the bridge reconstruction is in Fall 2003.

### **SHORE ROAD BRIDGE OVER THE HUTCHINSON RIVER (BRONX)**

This bridge, built in 1908, was originally called the Pelham Parkway Bridge over Eastchester Bay. The \$5 million interim rehabilitation of the existing bridge superstructure and substructure will enable the Department to keep it operational for a period of 10 years while a new bridge is being designed and built adjacent to the existing bridge. The existing bridge will be demolished once the new bridge is in service. The rehabilitation project began in April 2001, and construction is scheduled to end in May 2002.

As of the end of 2001, various alternatives for the new bridge were being evaluated for further design. The \$100 million project to construct a new Shore Road Bridge is scheduled for construction between October 2008 and October 2012.

### **THIRD AVENUE BRIDGE OVER THE HARLEM RIVER (BRONX/MANHATTAN)**

The Third Avenue Bridge carried some 73,100 vehicles per day in 2000. The design of the approximately \$120 million reconstruction project of this rim bearing swing bridge was completed in October 2000. Construction began in July 2001. Reconstruction will include complete replacement of the approaches and the swing span. Elimination of the center median on the main span will greatly improve the traffic flow on the bridge. This bridge will use a center spherical roller thrust bearing for supporting the span and for seismic loads. The bearing will be the largest of this type made for this purpose. The existing pivot pier will also be reinforced for seismic loads. The approximate design loading is 7,000,000 lbs. vertical and 2,400,000 lbs. horizontal. A temporary bridge, adjacent to the current one, will be in place for five months to maintain two lanes of traffic into Manhattan while the swing span is being replaced. Completion is scheduled for Fall 2005.

### **WILLIS AVENUE BRIDGE OVER THE HARLEM RIVER (BRONX/MANHATTAN)**

Measuring 3,212 feet in length and opened to traffic on August 23, 1901, the Willis Avenue Bridge remains one of New York City's most heavily traveled bridges. The bridge is a bowstring truss swing bridge which spans the Harlem River, and connects Manhattan's First Avenue and 125th Street to Willis Avenue and 132nd Street in the Bronx. Engineered by Thomas C. Clarke, the bridge was designed to relieve traffic congestion on the Third Avenue Bridge.

A major hub between the FDR Drive in Manhattan, the Major Deegan Expressway and the Bruckner Expressway in the Bronx, the Willis Avenue Bridge carried approximately 71,500 vehicles per day in 1999. Ten local and interstate bus lines use the bridge as a principal route from New York City to points throughout the northeastern United States.

Because of substandard curves which are present on the structure's approaches, the Willis Avenue Bridge has been one of the City's most accident-prone crossings. Between 1992 and 1994, there were 809 vehicular accidents on the bridge, for an average of 269 per year. Under the Department's proposed reconstruction program, these substandard curves will be eliminated.

## *INNOVATIONS & ACCOMPLISHMENTS*

Because of the advanced age and condition of the Willis Avenue Bridge, the City of New York proposes to replace the existing bowstring truss swing bridge with a new swing span bridge constructed just to the south of the existing bridge. Elimination of the center median on the main span will greatly improve the traffic flow on the bridge. Due to begin in January 2008, this \$228 million project is slated for completion in January 2012. In the meantime, to minimize the chances of closures due to the deteriorated grating on the existing bridge, the grating will be replaced in 2003.

### **NINTH STREET BRIDGE AWARDS**

One of the smaller movable bridges in the City, the Ninth Street Bridge spans 80 feet over the Gowanus Canal, between Second Avenue and Smith Street in Brooklyn. Reconstruction of the bridge began on September 19, 1994. The bridge reopened to traffic on September 1, 1999.

The new vertical lift bridge replaces a bascule span which dated back to July 1905 and was in an advanced state of deterioration. The new structure provides an improved wider channel in the canal for unobstructed vessel passage. The installation of a closed circuit television system now allows the bridge operator to monitor the canal bridges from the operator's house. The silver and blue metal cladding that covers the bridge both protects its towers and powerful machinery and is aesthetically pleasing. The bridge has state-of-the-art electronically controlled lifting machinery that should provide 50 years of reliable service.

In March 2001, the American Consulting Engineers Council selected the reconstruction of the Ninth Street Bridge over the Gowanus Canal in Brooklyn as a National Finalist in its Engineering Excellence Awards Competition.

In May 2001 the New York Association of Consulting Engineers selected the reconstruction of the bridge as the "Movable Bridge Project for Engineering Excellence."

In October 2001, the Department was presented with another award for this reconstruction project. The National Steel Bridge Alliance selected DOT to receive the Prize Bridge Award in its Movable Span category. The Prize Bridge Awards honor significant and innovative steel bridges constructed within the United States. The awards are presented at the World Steel Bridge Symposium. The projects are judged on innovation, aesthetics, and design and engineering solutions.

### **145th STREET BRIDGE OVER THE HARLEM RIVER (BRONX/MANHATTAN)**

The 145<sup>th</sup> Street Bridge carries approximately 17,000 vehicles per day in each direction. This makes it one of the most essential routes for vehicles and pedestrians traveling between Manhattan and the Bronx. Vehicles, which cross this rim bearing swing bridge each day between the two boroughs, include buses, trucks and cars.

Scheduled for construction between February 2003 and August 2006, the \$60 million 145<sup>th</sup> Street Bridge Reconstruction project will include the complete replacement of the swing span and six approach spans, seismic retrofitting, partial reconstruction of substructures and the reconstruction of the approach roadways. The design for the bridge utilizes elements pre-fabricated off-site so as to allow a very quick replacement of the existing bridge in 3 stages totaling 18 months. Traffic will only be impacted for the 18-month period of March 1, 2005 to August 31, 2006.

These upgrades will restore the structural integrity and extend the useful life of the 145<sup>th</sup> Street Bridge. With the elimination of the center median and center truss, the lane widths in each direction will be increased to the standard width.

## *INNOVATIONS & ACCOMPLISHMENTS*

### **FLOAT OUT/FLOAT IN**

A technique referred to as “float out the old/float in the new” is being incorporated into replacement schemes for movable bridges. Under this scheme, the old spans are floated out in their entirety and the new spans are floated in. Having the new spans constructed off-site and barged to the project allows for quick and efficient replacement of the removed span. Current projects which will incorporate this technique are: Third Avenue Bridge, Willis Avenue Bridge, 145th Street Bridge, Hamilton Avenue Bridge, Borden Avenue Bridge, and Grand Street Bridge.

### **THREE TUNNEL PROJECT**

Rehabilitation work continued on the Battery Park Underpass, and the Park Avenue and First Avenue tunnels in Manhattan. The contract includes the rehabilitation of the mechanical and electrical systems, as well as the ventilation, fire, lighting and drainage systems. This project, particularly the Battery Park Underpass, (which was used as a route to remove debris), was greatly impacted by the World Trade Center disaster. The project is scheduled for completion in late 2002.

### **BRIDGE SEISMIC DESIGN AND RETROFITTING**

The seismic retrofitting of bridges in New York City is part of the inspection and rehabilitation program mandated by Congress and administrated by the FHWA through the local authorities. During the period of 1993 to 1996, four major bridge owners in the New York City area (NYCDOT, NYSDOT, MTA, and the Port Authority of New York and New Jersey) retained seismologists to study hard rock seismic ground motions. The rock motions generated by these studies differed from each other and from the AASHTO spectrum as modified by NYSDOT. The differences were such that the resulting retrofit costs varied widely, depending upon which motions were adopted. To resolve this issue, NYCDOT, in association with NYSDOT and the FHWA, retained Weidlinger Associates to assemble an expert panel to develop recommendations for rock motions that would be adopted uniformly by the New York City region. The panel consisted of a team of six internationally recognized experts in the fields of seismology, geology, earthquake engineering, ground motion, and geotechnical studies. There were several brainstorming workshops held in New York, where the senior officials from NYCDOT, NYSDOT, and the FHWA provided their input to the panel members. NYCDOT also invited other city agencies to participate in the process.

The expert panel came up with definitive recommendations regarding rock motions, time histories, ground motions and bridge performance criteria to be used for critical, essential or other bridges undergoing structural analyses. The panel detail findings are described in the report entitled "New York City, Seismic Hazard Study and its Applications, Final Report, December 1998." This report is now extensively used by NYCDOT, NYSDOT, the FHWA, their consultants, and other agencies in the New York area for bridge projects. Thus, NYCDOT's leading role and efforts to establish ground motion standards have brought uniformity in seismic design to the New York City area. This may result in savings in bridge retrofit costs.

## *INNOVATIONS & ACCOMPLISHMENTS*

In 1997, the Division began a unique project aimed at conducting a seismic evaluation and subsequent retrofit of the Macombs Dam and 145th Street Bridges over the Harlem River. Intended to develop schemes for the strengthening of the unreinforced masonry piers on these movable bridges, the project's findings may be applied to other NYC bridges that have similar masonry substructures.

### **WATERWAY STUDY**

In 1999, the Department procured the services of an engineering firm to undertake a comprehensive study of the City's 25 movable bridges. The surrounding areas, land use, maritime laws, regulations and other factors were considered to assist the Department of Transportation in providing justification to the U.S. Coast Guard for permission to either convert certain of these movable bridges to fixed structures, or to modify their status to reduce the number of bridge openings. Such conversions would save the City annual operation and maintenance costs.

DOT received permission from the Coast Guard and reclassified the Roosevelt Island Bridge to fixed status in March 1999. This change resulted in a total estimated saving of \$38,000 to the City because of reduced operating costs for this bridge. However, in June 2001, the Coast Guard rescinded its permission, citing construction activity and security concerns.

In April 1999, DOT proposed that the Wards Island Bridge be converted to fixed bridge status. The Coast Guard indicated that there was an excellent chance that this change in status would be successful. However, because of clearance needed for construction equipment to be used for planned reconstruction projects on several Harlem River bridges, including Third Avenue, Willis Avenue, and 145<sup>th</sup> Street, it was decided to delay conversion of the Ward's Island Pedestrian Bridge to fixed bridge status until all reconstruction projects are completed. DOT estimates completion in Fiscal 2012.

By the end of 2001, DOT advanced the waterway study to the point that we were able to identify those bridges that are realistic candidates to be converted to fixed status. Those bridges are the Borden Avenue and Hunters Point Avenue Bridges over Dutch Kills, the Grand Street Bridge over Newtown Creek, and the Bruckner Expressway over the Bronx River. The Grand Street Bridge is anticipated to be the first to be converted, beginning in Fiscal 2006. The next phase of this study will involve researching right-of-way, legal, and community impact issues. This phase will begin when the Coast Guard agrees to allow the permit process to proceed. This is expected to be sometime in the second half of Fiscal Year 2002.

### **BRIDGE CLASSIFICATION**

The Coast Guard regulations, which govern the operation of the City's movable bridges, define the owner's responsibility to the mariner by classifying a bridge as "open on demand" or "open on advance notice." An "on demand" bridge provides an immediate opening to any vessel wishing to pass the bridge. An "advance notice" bridge opens after the mariner requests an opening several hours in advance. "On demand" bridges must be staffed at all times. "Advance notice" bridges are staffed only when necessary. DOT redesigned the work process in order to reduce personnel costs to the City and improve the delivery of services to the maritime community.

## *INNOVATIONS & ACCOMPLISHMENTS*

In October 2000, the Department implemented the United States Coast Guard-approved changes, establishing a four-hour notice for the Harlem River bridges, and a two-hour notice for the remaining “advance notice” bridges. The “on demand” classification remains for three bridges. The revised advance notice requirements allowed the formation of mobile crews with overlapping responsibilities, meeting the mariners’ needs and, in some instances, improving service by providing two mobile crews to expedite a vessel’s travel along a waterway.

The reduction in planned personnel will save approximately \$884,000 annually. In addition, bridge operational capabilities, general maintenance, and debris and snow removal have been enhanced through the more efficient utilization of existing personnel.

The remaining task is the conversion of the three remaining bridges to “on demand” status. This will be achieved by the replacement of two of the bridges with new bridges built with higher clearances, thereby reducing the number of times the bridges must be opened.

## INNOVATIONS & ACCOMPLISHMENTS

### Summary of Vessel Openings 1988 - 2001

	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001
Brdn Ave. (Q)	77	39	218	282	107	141	0	0	105	15	0	3	0	28
Brdwy (B/M)	33	0	0	12	3	10	6	7	24	7	2	0	6	27
Brcknr Expwy (Estrn Blvd) (B)	3	0	3	0	0	0	0	0	0	0	0	0	0	0
Brcknr Expwy (Unnprt Brdg) (B)	591	676	745	743	635	554	594	431	386	363	257	345	385	420
Carroll St. (K)	0	243	552	517	627	669	704	432	245	142	110	174	102	80
Grand St. (K/Q)	51	162	610	419	549	224	254	239	189	37	23	24	17	50
Grnpoint Ave. (K/Q)	0	371	1390	1014	860	587	549	498	557	626	669	787	688	641
Hmltn Ave. (K)	1681	1475	1597	1466	1331	1300	1336	1246	1191	1157	996	982	933	832
Hntrs Point Ave. (Q)	77	30	157	264	106	141	0	0	113	15	0	1	0	36
Htchnsn River Pkwy (B)	197	59	30	8	0	0	0	37	31	32	75	46	5	120
Macombs Dam (B/M)	0	2	0	0	0	0	6	5	13	3	0	0	0	0
Mdsn Ave. (B/M)	2	4	9	3	1	5	5	0	0	0	0	0	0	0
Metrpplt Ave. (K)	756	694	351	301	356	225	310	272	407	423	448	513	279	366
Mill Bsn (K)	554	480	699	867	879	1151	1250	954	903	628	591	433	336	317
Pulaski (K/Q)	522	527	577	584	426	224	239	206	195	291	332	383	276	208
Rsvlt Islnd (M/Q)	14	0	2	0	0	0	0	0	0	0	4	0	58	48
Shore Rd (Pelham Pky) (B)	2689	2180	2457	1968	1996	2138	2222	2190	2167	2158	2274	2162	2168	2222
Union St. (K)	771	728	574	502	547	657	713	432	236	144	103	144	85	101
Ward's Isnd Pdstrn (M)	6	6	0	0	0	2	0	1	0	2	1	0	0	279
Willis Ave. (B/M)	7	8	9	15	6	8	18	24	17	9	0	4	4	40
3 <sup>rd</sup> Ave. (B/M)	2	3	7	3	1	7	19	20	18	9	0	2	1	1
3 <sup>rd</sup> St. (K)	791	762	638	410	549	663	732	432	256	149	112	157	178	117
9th St. (K)	1083	986	1082	864	984	927	836	0	0	0	0	192	513	808
145 <sup>th</sup> St. (B/M)	0	4	0	2	0	0	9	24	24	3	0	0	1	6
W.207 <sup>th</sup> St. (B/M)	10	0	0	0	0	1	6	4	12	7	2	0	6	14
<b>TOTAL</b>	<b>9917</b>	<b>9439</b>	<b>11707</b>	<b>10244</b>	<b>9963</b>	<b>9634</b>	<b>9808</b>	<b>7454</b>	<b>7089</b>	<b>6220</b>	<b>5999</b>	<b>6352</b>	<b>6041</b>	<b>6761</b>

# INNOVATIONS & ACCOMPLISHMENTS

## **Roadway Bridges**

### **INNOVATIONS**

Innovations in the design and construction of Roadway Bridges continued in 2001. The continued use of weathered steel for bridges over railroads eliminates expensive costs involved in maintenance painting. Where feasible, the continued use of precast elements in bridge reconstruction reduces construction duration and the resulting negative impacts on the traveling public. For example, the construction duration of the Kings Highway Bridge over NYCT project was reduced from seventeen months to seven months, and the projected necessary power outages required from the NYCT for the 15<sup>th</sup> and 17<sup>th</sup> Avenue Bridges over the Bay Ridge LIRR projects were reduced from 1,113 to 689. This represents an equivalent of eight weekends.

Stainless steel clad rebars and galvanized steel rebars, to reduce concrete deck deterioration, are being utilized in pilot projects such as the Congress Street Bridge over the Brooklyn-Queens Expressway, and the East Third Street Bridge over the Bay Ridge LIRR.

### **ANDREWS AVENUE OVER LIRR (QUEENS)**

The \$3 million replacement of this bridge in Maspeth, currently under design by the In-House Design Section, is scheduled to start in the Spring of 2003. The Division proposes utilizing precast modules for the abutment stems, wing walls and retaining walls. This will be the first use of this material in a NYCDOT bridge project. The proposed geometry of the south approach roadway requires the construction of a retaining wall at the edge of a soccer field, lumber yard, and other private properties, due to the rise in profile. The precast wall will require the excavation of only half a meter as compared to about two meters with the use of conventional cast-in-place concrete. The installation of these wall units could be done during the winter months in a relatively short time, and would greatly minimize the disturbance to the adjacent private properties. Precast wall units will also improve aesthetics of the playground and the area within the project limits. The use of precast concrete modules will give better quality concrete, and ease of installation will reduce the total construction time from 15 months to 9 months.

### **BELT PARKWAY BRIDGES OVER FRESH CREEK, GERRITSEN INLET, AND PAERDEGAT BASIN (BROOKLYN)**

On a New York State-mandated scale from 1 to 7, these three bridges possess a condition rating of "fair" (3.001 – 4.999). In 2001, the Fresh Creek Bridge was 3.17; Gerritsen Inlet was 3.58; and Paerdegat Basin was 3.24. While none of the bridges are in any immediate danger of structural failure, their reconstruction is required in order to maintain mobility and public safety on this vital artery.

Under the Department's current proposal, the existing 5 span, 264.5 foot Fresh Creek Bridge will be replaced with a new 3 span, 309 foot bridge; and the existing 11 span, 520 foot Gerritsen Inlet Bridge will be replaced with a new 3 span, 492 foot bridge. In both cases, the stopping sight distance for the bridge and approach roadway will be improved with a design speed of 60 MPH.

The \$48 million reconstruction of the Fresh Creek Bridge, currently in its final design phase, is scheduled to start in Spring 2004, and to last for approximately 3 years. The bridge will be constructed in four stages, while maintaining three traffic lanes in each direction and a bike path on the eastbound side during construction.

## *INNOVATIONS & ACCOMPLISHMENTS*

The \$67 million reconstruction of the Gerritsen Inlet Bridge, currently in its final design phase, is scheduled to start in Summer 2004, and will last for approximately 3½ years. The bridge will be constructed in multiple stages, while maintaining three traffic lanes in each direction and a bike/pedestrian path on the eastbound side during construction.

The Paerdegat Basin Bridge will be replaced by a new bridge (with complete replacement of the superstructure and substructure). It will be constructed on a new off-line alignment conforming to current standards. The new split bridge will be within the right-of-way of the parkway. This \$93 million project is scheduled to begin construction in the Summer of 2004, and to last for approximately four years.

A computerized traffic simulation model is under development in connection with the Division's plans to reconstruct seven bridges on the Belt Parkway. This model will serve as a useful tool to establish the impact of construction on the travelling public and to help determine appropriate construction schedules. In addition, it will enable us to rapidly evaluate the impact of a multitude of combinations of construction staging.

### **HARLEM RIVER DRIVE AT EAST 127<sup>th</sup> STREET (MANHATTAN)**

This \$48 million project, currently in its preliminary design phase, involves the replacement of the existing 11 span bridge and the construction of a flyover ramp over the Third Avenue Bridge, in addition to various highway improvements. It eliminates a major weaving problem between the southbound Harlem River Drive traffic destined for the Second Avenue exit and the Third Avenue Bridge exit ramp; allows at-grade access for a future Park/Promenade to be developed by the Department of Parks at 127<sup>th</sup> Street between the Harlem River Drive and the Harlem River; and improves operational characteristics of the Harlem River Drive from the Third Avenue Bridge to the Willis Avenue Bridge.

### **KINGS HIGHWAY BRIDGE OVER NYCT (BROOKLYN)**

The Department of Transportation marked the early re-opening of the Kings Highway Bridge with a ribbon-cutting ceremony on October 16, 2001 attended by business and civic leaders, elected officials, and Community Board members. This commercially vital bridge, which spans four rail tracks of NYC Transit's Seabeach line, reopened more than fifteen months ahead of the original schedule. The bridge was fully closed on April 23, 2001, and was completed on October 12, 2001.

The contractor for this \$4.2 million project was initially given a 21-month schedule to reconstruct the bridge. Business and civic leaders expressed a concern over the economic effects of having the bridge closed for two holiday seasons, so DOT and the contractor decided to use an innovative plan to install a pre-fabricated superstructure as they demolished the existing bridge. The new method enabled the Department to reduce the closure period to 6 months.

The new bridge is a single span pre-cast concrete and steel superstructure on an integral abutment and pile foundation. This is the first time a pre-fabricated bridge has been installed in this section of Brooklyn.

## *INNOVATIONS & ACCOMPLISHMENTS*

### **EAST 178<sup>TH</sup> STREET PEDESTRIAN BRIDGE OVER METRO NORTH (BRONX)**

This bridge was substantially completed on January 11, 2001. The project included the construction of new pedestrian ramps conforming to ADA requirements.

### **WEST 205<sup>TH</sup> STREET BRIDGE OVER NYCT IND YARDS (BRONX)**

This reconstruction project was completed on January 12, 2001, approximately one year ahead of the original schedule.

### **65<sup>TH</sup> STREET BRIDGE OVER LIRR (QUEENS)**

The bridge, which was closed to traffic on March 28, 2000, was re-opened on May 10, 2001, one month ahead of schedule.

### **CONEY ISLAND AVENUE OVER BELT PARKWAY (BROOKLYN)**

This project was substantially completed on December 7, 2001. This four span continuous steel structure was built in four stages while maintaining traffic in both directions and allowing pedestrian access.

### **FLATBUSH AVENUE BRIDGE OVER BELT PARKWAY (BROOKLYN)**

This bridge was substantially completed on December 28, 2001. This two span continuous steel structure was built in four stages while maintaining four lanes of two-directional traffic and allowing pedestrian access.

### **4<sup>TH</sup> AVENUE BRIDGE OVER NYCT (BROOKLYN)**

This bridge was substantially completed on July 12, 2001. This single span bridge was constructed in stages to maintain two-directional traffic and allow pedestrian access to 4<sup>th</sup> Avenue.

### **SOUTH AVENUE BRIDGE OVER B&O RAILROAD (STATEN ISLAND)**

The 150 foot-long South Avenue Bridge was originally built in 1938. A State inspection rated the bridge in poor condition, prompting DOT to replace the entire bridge's superstructure and substructure.

The bridge carries one lane of traffic and sidewalks in each direction, as well as a gas main, a water main, and electric and telephone conduits. About 120 feet of new roadway and sidewalks were reconstructed on each side of the bridge, and new street lighting was also installed. Approximately 8,000 vehicles cross South Avenue Bridge daily.

## INNOVATIONS & ACCOMPLISHMENTS

The bridge was opened to traffic on May 31, 2001, at a ceremony attended by Mayor Giuliani, Commissioner Weinshall, and Borough President Guy Molinari. The bridge, which links Forest Avenue to Richmond Terrace, was completed 1½ months ahead of the original contracted schedule, and two weeks ahead of the accelerated schedule agreed to in February 2001.

### **INSPECTION OF THE HIGHBRIDGE PEDESTRIAN BRIDGE OVER THE HARLEM RIVER (BRONX/MANHATTAN)**

In support of the Department of Parks and Recreation (DPR), the Division prepared a detailed scope of work for the comprehensive in-depth inspection of this eleven span landmark structure, the oldest (circa 1848) bridge over the Harlem River. The bridge is currently under DPR's jurisdiction.

Engineering consultants will conduct this inspection, which is scheduled for completion in the Spring of 2003, at an estimated cost of \$1.6 million. The Division will be administer and supervise this work.

The resultant report will be furnished to DPR to pursue rehabilitation of the structure. Its goal is to open the historic promenade level for public use by pedestrians and cyclists and, once again, link the Bronx and Manhattan portions of Highbridge Park.



Highbridge Pedestrian Bridge

## *INNOVATIONS & ACCOMPLISHMENTS*

### **WESTCHESTER AVENUE BRIDGE OVER THE HUTCHINSON RIVER PARKWAY (BRONX)**

This bridge supports a transit structure overhead and has substandard clearance over the highway below. In 2001, 14 unauthorized overheight vehicles struck the bridge's girders. A project to install an ITS solution, which includes the installation of an overheight vehicle detection system that will flash signs directing vehicles identified as being over 9' in height to exit the parkway, is scheduled for completion in December 2002. It also includes cameras that will be activated by acoustics and will document future damage to the bridge as well as the offending vehicles' descriptions and plate numbers for recoupment of costs by the City. A separate project is underway to reconstruct the bridge and lower the Parkway.

### **153<sup>rd</sup> STREET BRIDGE OVER METRO NORTH (BRONX)**

This \$28 million project, currently in the design and environmental impact assessment stage, will include a two-span, single tower, cable stayed vehicular bridge. It will be the first of its kind in New York City. The new four lane bridge will extend East 153<sup>rd</sup> Street in the Bronx across the Mott Haven rail yards from Morris Avenue to the Grand Concourse just north of Hostos Community College in the Melrose Section of the Bronx. This bridge will complete a link the street lost in the early 1980's when the old turn-of-the-century bridge was closed and demolished because of its age and deterioration. Construction of the new bridge is tentatively scheduled to begin in 2005 and be completed in 2007.

The new bridge will significantly ease congestion on the current east-west streets in the South Bronx, along 149<sup>th</sup> and 161<sup>st</sup> Streets as well as the local streets in this neighborhood. With this bridge, East 153<sup>rd</sup> Street will be a continuous east-west thoroughfare from the commercial hub of Third Avenue to the Civic Center area of the Grand Concourse. It will serve the new revitalization projects of Melrose Commons, the Concourse Shopping Plaza and the Bronx Criminal Court Complex.

The bridge's graceful design, similar to the Tampa Bay Bridge in Florida, will create a very prominent landmark for this neighborhood. The cable-stayed structure will contain a tower rising above East 153<sup>rd</sup> Street to add to the Bronx skyline, with ribbons of steel cables holding up the roadway structure.

### **GUY BREWER BOULEVARD OVER THE BELT SYSTEM – SOUTHERN PARKWAY (QUEENS)**

The Guy Brewer Boulevard Bridge was built in 1937. Because a recent inspection revealed significant deterioration, DOT decided to replace the entire bridge. The existing two span bridge consists of reinforced concrete arch rigid frames with variable frame slabs. The new bridge will consist of four spans with three new steel piers, a concrete grid deck, and concrete parapet walls with protective bridge fencing. The approach slabs, adjacent curb, sidewalk, roadway and guiderails will be replaced. New traffic signals, traffic regulatory signs, street lighting and thermoplastic stripping will be installed. The utilities, including the water main, gas main, telephone cable and Fire Department cable will be installed across the Belt Parkway under the bridge deck. Approximately 300 new trees will be planted as part of the project's landscaping improvements. To improve safety, the safety barriers will be rebuilt on the Belt Parkway adjacent to the bridge piers in the median areas.

The contract includes incentive and disincentive clauses. \$4,000 per day (up to \$360,000 for a maximum of 90 days) will be awarded for early completion of bridge construction, with a unlimited disincentive of \$8,000 per day for late completion.

## *INNOVATIONS & ACCOMPLISHMENTS*

The Division is reconstructing this bridge in a single stage with full bridge closure. This will reduce the construction time from 24 months to 12 months. However, pedestrian access across the Belt Parkway will be maintained at all times during construction using a temporary pedestrian bridge. This \$11.8 million project began in July 2001, and is scheduled for completion in Spring 2003.

### **91<sup>ST</sup> PLACE OVER LIRR (QUEENS)**

The 91<sup>st</sup> Place Bridge over the LIRR in Elmhurst was built in 1927. Because a recent inspection revealed significant deterioration, DOT decided to replace the entire bridge. This \$4.5 million project includes removal of the existing superstructure and replacement with a single steel span structure, removal of part of the existing abutments and piers and construction of new abutments, replacement of the existing roadway pavement, sidewalks and curbs, installation of a new water main, electrical conduits and Time Warner cable conduits.

The bridge will be reconstructed in three stages. During the first stage, one lane will be opened in each direction. At the community's request, only one lane, northbound, will be opened to traffic during the second stage. The southbound traffic will be detoured. During the third stage, one lane will be maintained in each direction.

The contract includes incentive and disincentive clauses. \$10,000 per day (up to \$250,000 for a maximum of 25 days) will be awarded for early completion of Stage II, with a unlimited disincentive of \$10,000 per day for late completion. \$5,000 per day (up to \$125,000 for a maximum of 25 days) will be awarded for early completion of Stage III, with an unlimited disincentive of \$5,000 per day for late completion.

At the community's request, the bridge will be widened to accommodate an additional lane by reducing the sidewalk width. Construction began in September 2001, and is expected to be complete by April 2003.

### **GRAND CONCOURSE OVER EAST 161<sup>ST</sup> STREET (BRONX)**

A temporary vehicular fly-over bridge will be installed on the Grand Concourse at East 161<sup>st</sup> Street prior to the total reconstruction of the 161<sup>st</sup> Street underpass. This will allow traffic to flow unimpeded along the Grand Concourse during the reconstruction. Construction of the bridge is scheduled to begin in September 2004.

### **QUEENS BOULEVARD AND HONEYWELL STREET BRIDGES OVER AMTRAK AND LIRR YARD (QUEENS)**

Age, weather and increased traffic have taken their toll on the Queens Boulevard Bridge, which was built in 1910. The structural steel which supports the bridge, roadway surface and bridge joints has severely deteriorated. The bridge has outlived its useful life and needs to be rebuilt to maintain and improve the service it provides as a connector to and from Manhattan.

The Honeywell Street Bridge was closed in 1979, because it did not meet Department safety standards. The defunct bridge runs between Skillman Avenue and Northern Boulevard. It carries numerous utilities, including Amtrak high voltage catenary lines and other electrical facilities. By the end of 2001, preparatory work for the demolition of the bridge was complete, and demolition of the utility bay and sidewalk was underway.

In April 2001, DOT began a \$79.4 million reconstruction of both bridges, which run over the Sunnyside Rail Yard. Besides connecting Sunnyside and Long Island City in Queens, the

## INNOVATIONS & ACCOMPLISHMENTS

Queens Boulevard Bridge is a vital link between western Queens and Manhattan via the Queensboro Bridge.

Rather than completely close the Queens Boulevard Bridge during reconstruction, DOT studied the traffic patterns in the area and decided to rebuild the bridge in two stages, half of the bridge at a time, while keeping it partially open to traffic.

Our analysis revealed that at all times, traffic flow is heavier into Manhattan than into Queens. Thus, the bridge remains open to Manhattan-bound traffic during construction. However, the number of available travel lanes was reduced from three lanes to two.

Queens-bound traffic follows a carefully planned and clearly marked detour designed to minimize impacts on area businesses, the local community, and the traveling public. Service on the elevated #7 train that runs above the Queens Boulevard Bridge was not affected.

Both bridges are undergoing a complete reconstruction. Over the course of this project, the major improvements will include the reconstruction of concrete abutments, crash walls and steel piers; new bridge steel; the installation of new concrete decks and approach pavement; new sidewalks including a walkway/bikeway separated from traffic by concrete barrier; a new and improved overhead lighting system; and the installation of an ITS consisting of nine closed circuit television cameras to monitor traffic and roadway conditions. It will also include installation of temporary traffic signals and modifications to the existing signal timing. Nine electronic message boards will provide motorists with real-time traffic information.

The contracts include incentive and disincentive clauses. On the Queens Boulevard Bridge, \$50,000 per day (up to \$3 million for a maximum of 60 days) will be awarded for early completion of the project, and disincentives of \$50,000 for each day the work continues beyond September 30, 2002. On the Honeywell Street Bridge, \$15,000 per day (up to \$900,000 for a maximum of 60 days) will be awarded for early completion, and disincentives of \$15,000 for each day the work is delayed beyond September 30, 2002.

The ITS installation was completed by the end of March 2001. The first stage of the reconstruction of the Queens Boulevard Bridge was completed on December 28, 2001. This included construction of a roadway slab and concrete barrier, installation of sidewalk slab, completion of street light work, watermain and approach work, striping, and installation of a temporary pedestrian barrier. Traffic has been moved from the existing portion of the bridge to the newly constructed portion of the bridge. The bridge will continue to provide two lanes of westbound traffic and a shared pedestrian/bicycle path.

The Department entered into an expedited contract and the project is scheduled to be completed by the end of 2002. By that time, both the Queens Boulevard and Honeywell Street Bridges will be completely rebuilt and reopened to traffic. The Queens Boulevard Bridge will carry three westbound lanes, three eastbound lanes and two shared sidewalk/bicycle paths. The Honeywell Street Bridge will carry two traffic lanes in each direction and two sidewalks.

### ***Design-Build***

In 2001 the Department continued to use the Design-Build process to expedite capital bridge rehabilitation. These contracts retain the same company for both design and construction on selected projects. It is evident that there are many advantages to the Design-Build program, including the use of one consolidated procurement rather than two or more, resulting in significant time savings; the ability to commence construction before design completion; the avoidance of project escalation costs as construction commences two or three years earlier than with the conventional design-bid-build method; minimization of design change orders; and better

## *INNOVATIONS & ACCOMPLISHMENTS*

coordination between design and construction, as critical field issues are addressed expeditiously. In addition, the design is custom made and reflects the capabilities and strength of the specific contractor; the Department establishes a single point of contact for communicating its goals and objectives; and overall costs are reduced substantially.

### **THIRD AVENUE AND RIDGE BOULEVARD BRIDGES OVER SHORE ROAD DRIVE (BROOKLYN)**

On February 15, 2001, elected officials, community board members and civic leaders attended a ribbon-cutting ceremony for the early reopening of these bridges, 13½ months ahead of the original schedule, and 1½ months ahead of the accelerated schedule. This \$7 million project rehabilitated the two masonry arch bridges over Shore Road Drive in Brooklyn. The contractor began construction work in April 2000. The local community board approved an accelerated schedule, shutting down both bridges, and thus a one-year, rather than two-year, construction project. Traffic was accommodated by providing a temporary road through parkland, reversing the entrance ramp to the Belt Parkway, and maintaining pedestrian access to the bridge. The erection of arches underneath the truss used to support the utilities was innovative and expedited the project. Another innovation was designing around the existing scroll monuments at Ridge Boulevard and cleaning them in place, thus eliminating the need to remove, clean, and reinstall them. In addition, the decision to use form liners rather than stone veneer resulted in a \$150,000 savings, while providing for a safer structure. Erection of the superstructure was completed in Fall 2000. Shore Road Drive was opened to traffic on March 16, 2001, and the project was completed on June 7, 2001.



Third Avenue Bridge over Shore Road Drive

### **BELT PARKWAY BRIDGE OVER OCEAN PARKWAY (BROOKLYN)**

This \$62 million project involves the replacement of the Belt Parkway Bridge over Ocean Parkway, reconfiguration of the interchange, roadway work on approximately a mile of the Belt Parkway, and roadway and associated landscaping work on Ocean Parkway from approximately Avenue Z to West End Avenue.

## *INNOVATIONS & ACCOMPLISHMENTS*

The bridge needs to be replaced because of its deteriorating condition, which cannot be done without affecting the already substandard ramps. This necessitated the re-design of the entire interchange and the associated work on Belt Parkway and on Ocean Parkway.

The Belt Parkway is a significant corridor of the Regional Transportation System with daily volumes of 166,000 vehicles. Coupled with the rapid deterioration of the bridge, the possibility of closure, and our concern for public safety, the New York State Department of Transportation (NYSDOT) requested that NYCDOT procure this project using Design-Build. NYSDOT will act as the Federal Highway Administration's representative. The project has secured 80% federal funding since it involves this significant corridor of the Belt Parkway, as well as the Historic Ocean Parkway, which was the first parkway of its kind in the United States. It is part of the Special Experimental Project No. 14 Program, a Federal Program that allows innovative contracting practices to be used.

Three of the six traffic lanes on the Belt Parkway will be maintained in each direction during all stages of construction. The project will include incentives and disincentives and liquidated damages clauses to ensure timely completion of critical activities and to minimize the inconvenience to the public. The Department expects to issue a Notice To Proceed in the Summer of 2002; construction is expected to commence in the Fall of 2002 and be complete by the Fall of 2004.

### **PEDESTRIAN BRIDGES**

The Division is currently working on the preliminary engineering to be included in the Design-Build RFP (Request for Proposals) to replace 12 pedestrian bridges in all five boroughs at an estimated construction cost of \$18 million. The bridges are Bethel Avenue over SIRT, Cedarview over SIRT, and Fremont Avenue over SIRT in Staten Island; 51<sup>st</sup> Avenue over LIRR, Crocheron Park over BCIP, 94<sup>th</sup> Street over LIRR, 55<sup>th</sup> Avenue over LIRR, and 216<sup>th</sup> Street over LIRR in Queens; 204<sup>th</sup> Street over Metro North in the Bronx; Pedestrian Bridge over East 128<sup>th</sup> Street in Manhattan; 17<sup>th</sup> Avenue over BSHP, and 92<sup>nd</sup> Street over BSHP in Brooklyn. The RFP is scheduled for completion in November 2002. Construction is expected to begin in 2004, and be complete in 2005.

### **RIKERS ISLAND BRIDGE OVER RIKERS ISLAND CHANNEL (QUEENS)**

This \$41 million project, currently in the preliminary engineering phase, involves replacing the superstructure of this rapidly deteriorating bridge. Cores taken from the bridge deck reveal that the estimated useful life of the deck will expire in 2005, thus making bridge rehabilitation necessary.

The Division had previously completed the replacement of the bridge's substructure in 1998. The salty environment of the channel significantly contributes to the deterioration of the superstructure. This continued deterioration could also negatively impact the recently completed substructure work. The Division considered Design-Build to be the best project delivery method for this project, as it can expeditiously bring projects to the construction stage, and is the preferred method in all cases where time is of the essence. As the bridge exclusively serves the Rikers Island Correctional Facility, this project will require coordination with the Department of Corrections. Construction is expected to begin in Summer 2005, and be complete in Summer 2007.

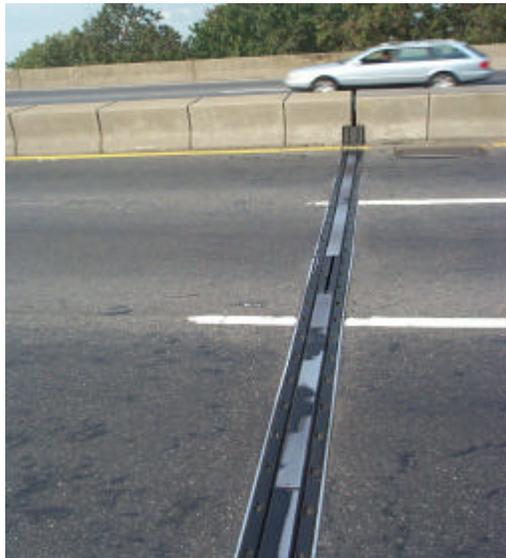
## INNOVATIONS & ACCOMPLISHMENTS

### *When and Where Unit*

#### **HENRY HUDSON PARKWAY VIADUCT FROM WEST 72<sup>ND</sup> TO WEST 79<sup>TH</sup> STREET (MANHATTAN)**

The expansion joints on the viaduct began to deteriorate, bounce, leak and allow the steel below to corrode. The community complained about the loud noise created by vehicular traffic crossing these joints. Several flags were issued to repair or replace the expansion joints, and the Division considered various types of expansion joint systems to resolve the problem.

The When and Where Unit located a firm that markets a joint repair system that has the potential for making a more successful repair than that produced by previous attempts. A demonstration repair proved successful, as the system did indeed provide a watertight seal that could be compacted and leveled to the existing pavement surface, resulting in a smooth, noise-free ride. In addition, this system could be quickly installed, and easily repaired. Utilizing the new system, 21 expansion joints (approximately 1450 linear feet) were completely repaired in 4½ months with minimal lane closures and insignificant disruption to traffic.



Failed Expansion Joint on the HHP Viaduct

# INNOVATIONS & ACCOMPLISHMENTS

## ***Engineering Review and Support***

### **IN-HOUSE DESIGN**

In-House Design staff prepares plans and specifications for bridge rehabilitation/reconstruction projects that enable the Division to restore bridges considered “structurally deficient” to a “very good” condition rating. This unit handles urgent Division projects, as well as special projects under construction by the Bureau of Bridge Maintenance, Inspection and Operations. Projects underway in 2001 included 145<sup>th</sup> Street Bridge over the Harlem River, Belt Parkway Bridge over Paerdegat Basin in Brooklyn, Andrews Avenue Bridge over LIRR, Hempstead Avenue Bridge over Cross Island Parkway, Springfield Boulevard Bridge over Belt Parkway, Union Turnpike Bridge over Cross Island Parkway (and Creedmoor Center Road), and the Steinway Street Bridges over the Grand Central Parkway in Queens.

In the aftermath of the World Trade Center disaster, a massive deployment of heavy equipment and removal of debris was undertaken. This required allowing overweight vehicles over bridges in and around the City. Division engineers coordinated with the State and other agencies and established routes for these vehicles to move into and out of the City from all directions. In-house design engineers created 24 new drawings, for different routes to and from the World Trade Center and disposal sites.

### **SUPERSIZED LOADS**

The weight and frequency of very heavy loads traveling over the City's bridges and roadways have taken a toll on the bridges' infrastructure. The Engineering Review Section is very involved in reviewing the requests for issuing permits for these vehicles. NYSDOT has a project to develop a computerized Automated Overweight Permitting Program for use on State-owned bridges that will handle the complete permitting process and its accompanying required analyses. At the request of NYCDOT, the State is including our locations in their ongoing consultant contract. This will ensure both a lower development cost for the City as well as compatibility between the two systems (routes often pass over both City and State owned bridges). This project is expected to begin at the end of 2002.

The new system will have the following benefits:

As the turn-around time will be days instead of weeks, truckers will be more likely to apply for permits rather than ignoring the restrictions and driving without permits on the bridges.

Ease permit rule enforcement efforts by the NYPD, as they will have access to the system.

The program will create a database of bridges used by the trucks on the approved routes. This will help the Division to assess the affected bridges when creating the scope of work for rehabilitation and/or reconstruction, and when deciding whether or not to design them for higher loads.

Many consumers are now buying merchandise via the Internet. Giant warehouses are being built around the country for packaging and shipping these goods by trucks. We are expecting a large increase of overweight truck movement in the City in the near future. The new permitting computer program will be able to handle a large number of permit requests.

A streamlined vehicle permitting approval process coupled with the ongoing inspections of the bridges being subjected to repetitive super-loads will actually reduce the yearly capital outlays of the Department in the long run.

# INNOVATIONS & ACCOMPLISHMENTS

## RETAINING WALL STUDY

The purpose of this study, begun in 1999, was to identify, locate, determine ownership, and make condition assessments of the retaining walls under the City's jurisdiction, and to inventory the retaining walls associated with the arterial highways and streets within the City's five boroughs, as well as the retaining walls associated with the 752 City-owned bridges. The walls were inventoried and assigned Wall Identification Numbers (WIN). A computerized database with the capability to link to a GIS system was developed. A similar project for the State-owned retaining walls, following the City's established system, is being planned by the State. The Division's project was completed in May 2001. Prior to completion, the consultant installed the computer program and database at the Department's MIS office. All project related information and reports were turned over to the DOT's Division of Street and Arterial Maintenance for their use, and subsequent handling.

## CONVERSION OF DIVISION ENGINEERING ARCHIVES

In 2001, the Division prepared a justification for emergency funds for electronic conversion of existing Division engineering archives and the creation of a remote management system. These items were being damaged by the temperature and humidity at their Battery Maritime Building storage area. These records include 73,000 frames of microfilm, 20,000 original construction photographs, 12,000 full-sized original drawings, and one million letter-size design documents.

## MARINE BORER STUDY

Marine borers pose an immediate and serious danger to the thousands of piles and other structures of timber built in the marine environment. In New York Harbor, as the water quality improved due to many years of clean up efforts, marine borer ( Limnoria, Teredo, etc.) activity has increased significantly in recent years. The recent inspections of timber structures by various local agencies (such as The Port Authority of NY & NJ, NYS Department of Transportation, NYC Department of Sanitation, and NYC Economic Development Corporation) indicate increasing damage to their structures resulting from marine borer activity. These agencies are implementing measures to protect the structures against marine borers.



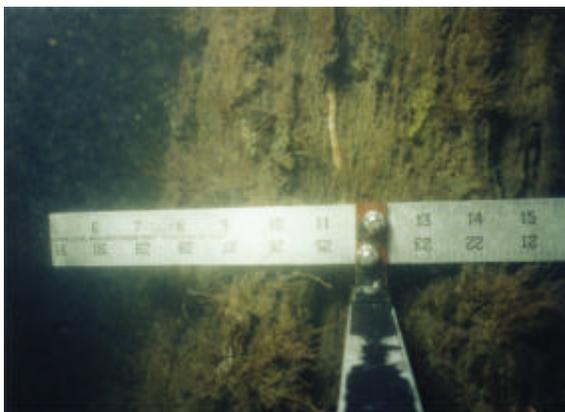
Marine Borer – Limnoria Species



Marine Borer – Teredo Species

## INNOVATIONS & ACCOMPLISHMENTS

In October 1999, the Department began a study to assess the existing damage caused by marine borers as well as the potential for future damage at several waterfront DOT structures, including the supporting structures of the relieving platforms along the FDR and Harlem River Drives, and the timber piles and structures of the Carroll Street and Ocean Avenue bridges in Brooklyn. The underwater inspection of timber piles supporting the FDR Drive began on May 8, 2000. Inspection of the Brooklyn sites was conducted during the week of October 23, 2000. The inspections were completed in October 2000, and the Marine Borer Evaluation Report and the Marine Borer Evaluation Report was published in June 2001. Using the results of the underwater inspections, preliminary plans were developed for the implementation of repairs and remediation measures to protect the structures from attack. These preliminary plans were completed in December 2001. The cost of the construction work, which is expected to commence in 2004, is estimated to be \$35 to \$40 million.



Medium Limnoria Infestation



Teredo Damage (holes up to ¼" diameter)

Based upon information gathered during this study, DOT has expanded the scope of the study to include the inspection of other City-owned property not under the jurisdiction of the Agency. In addition to timber pile supported low level relieving platforms, these structures include masonry or crib-type gravity retaining walls, high level decks, steel sheet pile bulkheads and rip rap embankments. Non-DOT structure inspections began in Spring 2001 and will be completed in February 2002.

A critical condition along the esplanade at East River Park was identified during the week of June 25, 2001 and reported to the Department of Parks and Recreation and other City agencies. Contract documents for the repair of this esplanade under a change order are being prepared, and the remediation of this condition, which is estimated to cost approximately \$30 million, will be the financial responsibility of the Department of Parks.

### TRUMP/NEW WORLD PROJECT

The Trump/New World project (Riverside Drive between 59<sup>th</sup> and 72<sup>nd</sup> Streets) includes the construction of six new bridges, a ramp, and connector roads along Riverside Drive as a part of the residential and commercial development in the former Penn Central Rail Yard. When completed, the infrastructure network will be transferred to DOT for maintenance. The Division is providing engineering review of the design drawings, as well as quality assurance inspections, to ensure the developer's compliance with DOT's construction and design standards. The project is now 50 percent complete.

## INNOVATIONS & ACCOMPLISHMENTS

### **BRIDGESCOPE**

The Bureau of Engineering Review and Support has undertaken the responsibility, on behalf of the end users, to ensure that the new Bridgescope application performs as defined in the consultant's scope. Bridgescope is a computer program developed in two phases. Phase I is the Memorandum of Bids, which is in production now. This application allows engineers to input engineers' estimates and contractors' bids into the system's database. The system can then print Certificate to Proceed reports and Memorandum of Bid reports, which are required for the registration of construction contracts. Phase II is the tracking system, which is under development now. This application will allow engineers to input all the information about any projects under design. This system will track all the milestones for a particular project and alert engineers and supervisors if any milestones are delayed and the consequences of this delay on the project schedule. Eventually Phase I and Phase II will be linked so that anyone can track a project from the initiation to the close out of construction of the project.

### **QUEENS BOULEVARD AND HONEYWELL STREET BRIDGES OVER AMTRAK AND LIRR YARD (QUEENS)**

The Lead Waste and Hazardous Waste Unit is handling the environmental issues that arise during the reconstruction of the Queens Boulevard and Honeywell Street Bridges. These bridges cross the Sunnyside Rail Yard. This yard is listed by the federal government as an inactive hazardous waste site and Amtrak is under a consent order from the New York State Department of Environmental Conservation (NYSDEC) to clean the site. The reconstruction of these bridges requires excavation and other construction activities in the Sunnyside Yard. Amtrak previously had the responsibility of cleaning the soil and groundwater contamination prior to bridge reconstruction activities. However, Amtrak turned this operation over to DOT. As a result, the Lead Waste and Hazardous Waste Unit is responsible for performing soil and groundwater collection and analysis, developing hazardous waste and contamination clean-up protocols, coordinating work with the NYSDEC, overseeing the contractors' environmental remediation plans, placing groundwater monitoring wells overseeing worker protection and monitoring, and serving as the primary responsible party for ensuring environmental compliance on the project.

### ***Bridge Maintenance, Inspection and Operations***

#### **SEPTEMBER 11, 2001**

In the aftermath of the terrorist attack on the World Trade Center on September 11, 2001, Division personnel, including ironworkers, electricians, carpenters, oilers and others, responded to the emergency effort in many ways. They supplied and monitored light stands and generators, pumped water from the basement of the NYPD Command Center next to 40 Rector Street, swept the Battery Park Underpass and the West Street Tunnel, cleaned three Staten Island ferries prior to the resumption of regular ferry service, provided crowd control at the St. George Ferry Terminal, maintained the emergency lane delineators on the Brooklyn Bridge, washed down streets in lower Manhattan, and assisted OEM and NYPD in setting up MPT schemes on the Brooklyn Bridge.

## *INNOVATIONS & ACCOMPLISHMENTS*

Division electricians assisted with the evacuation of pedestrians across the Brooklyn Bridge immediately after the attack, provided continual light and power at Ground Zero for emergency services, wired the DOT Command Centers at 158th Street and Pier 11, maintained tunnel lighting and pumping equipment in the Battery Park Underpass and the West Street Tunnel, delivered materials ordered by OEM to designated sites, and evaluated a proposal to restore power to 40 Worth Street by means of a generator.

Division carpenters assisted with the evacuation of pedestrians across the Williamsburg Bridge immediately after the attack, constructed ramps over fire hoses, fueled lighting and power equipment at Ground Zero, and delivered materials ordered by OEM to designated sites. Division ironworkers burned steel and cleared debris at Ground Zero in the immediate aftermath of the attack, fabricated steel docking fenders for a new ferry landing, repaired ramps over fire hoses in the WTC vicinity and delivered construction materials to designated sites.

At the Coast Guard's request, crews assisted in the installation of chain-link fencing to protect the pilot houses and ventilation systems on the Staten Island ferries. Division oilers maintained generators, pumps, and light towers at Ground Zero, supplied fuel to generators, mobile morgues, pump sets, trucks, and heavy equipment, pumped water from basements of buildings in the area, and removed debris.

Division engineers provided direction and supervision to the trades and sections involved in the rescue and relief efforts. Bridge Inspections personnel performed emergency inspections of the city's bridges and tunnels, as well as buildings and streets in the WTC vicinity, and conducted security inspections on the Harlem River Bridges.

Other employees pumped out the Battery Park Underpass to maintain access to West Street and access to WTC, maintained emergency generators and lighting, cleaned streets and sidewalks in the WTC vicinity, and assisted with security inspections on the Harlem River Bridges. The Division also assisted in staffing the Midtown Command OEM Center, the DOT Call Center, the Whitehall Ferry Terminal, and the 58th Street Ferry Terminal.

### **EAST RIVER BRIDGES ANTI-ICING PROGRAM**

Traditional snow and ice control practices rely heavily on the use of salt, a material known to corrode steel and accelerate the deterioration of concrete and asphalt surfaces. A new method of snow and ice control was needed to protect the City's \$2.5 billion investment in the rehabilitated East River Bridges. This method, known as anti-icing, involves the application of a chemical freezing point depressant to the roadway surface to prevent snow and ice from bonding to the roadway. Frequent plowing removes any accumulation of unbonded snow or ice before traffic is affected.

The Division's Anti-Icing Program uses the chemicals potassium acetate and magnesium chloride. The anti-icing fleet consists of five spray trucks, eighteen plow trucks and several smaller plows. Additional spray systems are being installed on ten of the eighteen plow trucks. Four installations were completed as of January 2002, and all installations are expected to be complete before the end of the winter season. Six additional chemical storage tanks were purchased and installed in 2001, increasing storage capacity from 33,000 gallons to 76,250 gallons.

In the winter of 2000-2001, a total of 100,000 gallons of anti-icing chemicals were applied on the roadways of all four East River Bridges.

## INNOVATIONS & ACCOMPLISHMENTS

Following the success of the pilot Fixed Anti-Icing Spray Technology (FAST) system on the Brooklyn Bridge, the Department expects to augment its effectiveness by using it in conjunction with a Road Weather Information System (RWIS), which is designed to collect data on weather and bridge pavement conditions using atmospheric and pavement sensors. Using information collected by the RWIS to automate the operation of a FAST system will allow the almost immediate application of anti-icing agents when weather conditions necessitate. The Department's inaugural pilot installation of a combined RWIS/FAST system is scheduled for a portion of the Queensboro Bridge in December 2003.

### BROOKLYN BRIDGE PROMENADE

The replacement of the Brooklyn Bridge promenade deck and stringers by Division personnel was completed in December 2000. The temporary footbridge, which had been built several years earlier and maintained throughout the project, was removed. The replacement of the deteriorated sections of promenade railing with identical replicas of the existing steel will continue through Summer 2002. Virtually all of the work is done from the promenade, closing the left roadway lane as little as possible.

### INSPECTIONS

In 2001, Inspections covered 65 bridges and 476 spans. Emphasis was placed on ensuring public safety through the monitoring of potentially hazardous conditions and temporary repairs. The unit performed 380 monitoring inspections, and 532 special winter monitoring inspections of cellular structures, shorings, and potential fire hazards. In addition, 213 emergency inspections were conducted in response to hot line calls, in-house requests, or citizen complaints.



Bridge Inspectors in Snoopers under the Macombs Dam Bridge and the Mill Basin Bridge

# INNOVATIONS & ACCOMPLISHMENTS

## CLEANING

In 2001, 11,777 cubic yards of debris were removed from bridges and their surrounding areas, and 1,601 drains were cleaned.

## PAINTING

In 2001, the following bridges were painted: Bell Boulevard (Motor Parkway) Pedestrian Bridge, Belt Parkway over Bay Parkway, Belt Parkway over Bay Ridge Avenue, Belt Parkway over Ocean Parkway, Borden Avenue Bridge over Dutch Kills, Braddock Avenue over Cross Island Parkway, Brighton 8th Street Access Ramp over Belt Parkway, Broadway Bridge over Harlem River, Brooklyn-Queens Expressway over Cadman Plaza, Brooklyn-Queens Expressway over Nassau Street, Brooklyn-Queens Expressway over Prospect Street, Brooklyn-Queens Expressway over Sands Street, Brooklyn-Queens Expressway over Washington Street, Brooklyn-Queens Expressway over York Street, Bronx River Parkway at Bronx Boulevard (railings), Bryant Avenue Bridge over Amtrak, Claremont Parkway over Metro North, Clintonville Street over Cross Island Parkway, Cohancy Street over Southern Parkway, Concourse Village Avenue over Metro North, Crocheron Park Pedestrian Bridge over Cross Island Parkway, Cropsey Avenue Bridge over Coney Island Creek, Cross Bay Boulevard Bridge over Belt Parkway, Dyckman Street Pedestrian Bridge at 10th Avenue, East Tremont Avenue Bridge over Bronx River, East Tremont Avenue Bridge over Hutchinson River Parkway, Elliot Avenue over Queens Boulevard, Farmers Boulevard over Southern Parkway, Flushing Meadow Park over Meadow Lake & 69th Road, Grand Concourse Bridge over Burnside Avenue, Guy R. Brewer Boulevard over Southern Parkway, Hamilton Avenue Bridge over the Gowanus Canal, Highland Boulevard over Jackie Robinson Parkway, Hutchinson River Parkway over the Hutchinson River, Jamaica Avenue over Cross Island Parkway, Knapp Street over Belt Parkway, Lawrence Street Pedestrian Bridge at Flushing Meadow Park, Linden Boulevard Bridge over Conduit Avenue, Motor Parkway Pedestrian Bridge over Francis Lewis Boulevard, Motor Parkway Pedestrian Bridge over 73rd Avenue, Myrtle Avenue Bridge over Jackie Robinson Parkway, Northern Boulevard Bridge over Alley Creek, Pennsylvania Avenue over Belt Parkway, Prospect Park Lake Pedestrian Bridge, Pulaski Bridge over Newton Creek, Queensboro Bridge, Rikers Island Bridge, Riverside Drive over West 158th Street, Roosevelt Avenue Bridge over Conrail, Roosevelt Avenue Bridge over the Van Wyck Expressway, Shore Road over Metro North, South Conduit Boulevard over Belt Parkway, Union Turnpike over Cross Island Parkway, Westchester Avenue Bridge over Hutchinson River Parkway, Whitelaw Pedestrian Bridge over Conduit Avenue, Williamsburg Bridge, Willis Avenue Bridge, Winchester Boulevard over Cross Island Parkway, Woodhaven Boulevard over Queens Boulevard, Yankee Stadium Pedestrian Bridge over East 153rd Street & Metro North, 14th Avenue over Cross Island Parkway, 27th Street Pedestrian Bridge over Belt Parkway, 28th Avenue Pedestrian Bridge over Cross Island Parkway, 81st Street Pedestrian Bridge over Belt Parkway, 92nd Street Pedestrian Bridge over Belt Parkway, 102nd Street over Hawtree Basin, 150th Street rails over Cross Island Parkway, 160th Street over Cross Island Parkway, East 162nd Street over Metro North, West 176th Street Pedestrian Bridge over the approach to the George Washington Bridge, and West 181st Street ramp to the George Washington Bridge.

## *INNOVATIONS & ACCOMPLISHMENTS*

During 2001 the following structures were also painted: Borden Avenue Bridge Operator House, Railings on the ramp from the eastbound BQE to the Manhattan Bridge, Carroll Street Bridge Operator House, Railings at Cypress Hill Street over Jackie Robinson Parkway, Railings of 5 bridges in Flushing Meadow Park (north of the LIE), Greenpoint Avenue Bridge Operator House, Hamilton Avenue Bridge Operator House, Hunterspoint Avenue Bridge Operator House, Mill Basin Bridge Operator House, Third Street Bridge Operator House, Union Street Bridge Operator House, Harper Street Fleet Services Facility, 59th Street Bridge Facility, 5th Avenue railings between 23rd and 24th Streets, DEP Plants at Coney Island, Rockaway, West 135th Street, and Oakwood Beach, Staten Island, Cross Bay Boulevard at the South Conduit railings, and the St. George Ferry Terminal ramps and ceiling.

### **GRAFFITI REMOVAL**

In 2001, 7,483,000 square feet of graffiti were eliminated. This program focuses its primary attention on the four East River bridges, as well as the following 21 arterial highways: Clearview Expressway, Gowanus Expressway, Major Deegan Expressway, Harlem River Drive, Van Wyck Expressway, Brooklyn-Queens Expressway, Jackie Robinson Parkway, Sheridan Expressway, Hutchinson River Parkway, Henry Hudson Parkway, West Shore Expressway, Richmond Parkway, Martin Luther King Jr. Expressway, Staten Island Expressway, Bruckner Expressway, Prospect Expressway, Grand Central Parkway, Long Island Expressway, Cross Bronx Expressway, Nassau Expressway, and Bronx River Parkway.

During 2001 graffiti was also removed from the following structures : Austin Street underpass of the Jackie Robinson Parkway between 80th Road and Union Turnpike, Austin Street at 80th Street, Avenue H over the Long Island Railroad, Brooklyn-Queens Expressway at the Brooklyn Battery Tunnel, Brooklyn-Queens Expressway at Prospect Street, Brooklyn Queens Expressway/Long Island Expressway interchange near 48th Street, Clintonville Street underpass of the Cross Island Parkway, Cooper Avenue at 74th Street, Cross Island Parkway, Cross Island Parkway at I-95, Douglaston Parkway underpass of the LIRR, Drumgoole Road West at Albee Avenue, Fieldston Road overpass of the Henry Hudson Parkway, Flatbush Avenue over the Long Island Railroad, Francis Lewis Boulevard underpass of the Cross Island Parkway, Francis Lewis Boulevard near Lock Avenue, FDR Drive, FDR Drive at East 6th and East 10th Streets, FDR Drive at 79th – 80th Streets, Grand Concourse over Burnside Avenue, Grand Concourse at 204th Street and Kingsland Road, Hamilton Avenue Bridge, Long Island Expressway between 40th Street and 39th Place, Long Island Expressway at 80th Street, New York City Marathon Route, Nostrand Avenue, Nostrand Avenue over the Long Island Railroad, Pulaski Bridge, Riverdale Avenue from 231st Street to 236th Street, NYC Municipal Parking Lot at Steinway Street, Thomson Avenue, Throgs Neck Expressway, Tillary Street Pedestrian Bridge, Union Turnpike between Woodhaven Boulevard and Trotting Course Lane, Utopia Parkway underpass of the Cross Island Parkway, Whitestone Expressway at 20th Avenue, Woodhaven Boulevard Bridges over Atlantic Avenue between 91st Avenue and 94th Avenue Woodhaven Boulevard at Jackie Robinson Parkway, Woodhaven Boulevard Bridges over railroad property between Union Turnpike and Metropolitan Avenue, Third Avenue Bridge, 12 bridges along NYCT's N & B lines from 5th Avenue to 18th Avenue in Bay Ridge, 14th Avenue underpass of the Cross Island Parkway, 43rd Street between 10th and 11th Avenues, 73rd Street Pedestrian Bridge over the Long Island Expressway, 65th Street at 3rd Avenue, 84th Street Pedestrian Bridge over the Long Island Expressway, 84th Street at the FDR Drive (East End Avenue Tunnel), 88th Road at the Cross Island Parkway, Path opposite 88th Road, 134th Street underpass at Alexander Avenue, 147th Street underpass of the Cross Island Parkway, 174th Street at Bronx River Avenue, 150th Street underpass of the Cross Island Parkway, 163rd Street Pedestrian Bridge over the Hawtree Basin, 179th Street at Amsterdam Avenue, 191st Street Tunnel, 215th Street at Broadway, 216th

## INNOVATIONS & ACCOMPLISHMENTS

Street Pedestrian Bridge over the LIRR, Top West side of the 232nd Street overpass of the Henry Hudson Parkway, 239th Street Bridge over the Henry Hudson Parkway, and 241st Street Pedestrian Bridge at Carpenter Avenue.

### RESEARCH AND PRESENTATIONS

In 2001, research work of the Division was presented in the following proceedings:

Annual Bridge Engineering Day, Sapporo, Japan, February 2001. Yanev, B. *Bridge Management in the United States*. In addition, Dr. Yanev, Executive Director of Inspections and Bridge Management, delivered a similar presentation to the Metropolitan Transit Authority in Tokyo, Japan.

The 6th International Symposium on Non-Destructive Evaluation for Health Monitoring & Diagnostics, Newport Beach, California, March 2001. Dubin, E. (FHWA) and Yanev, B. *The Management of the East River Bridges in NYC*.

ASCE Spring Seminar, New York City, 23 April 2001. Perahia, Henry D. *The New York City Bridge Program*.

ASCE Structures Congress, Washington, D.C., May 2001. Yanev, B. *The Williamsburg Bridge, 12 Years Later*.

First US-Japan Bridge Management Workshop, May 2001, *Life-Cycle Cost Assessment for Bridge Maintenance*.

Barbas, J., Patel, Jay A., and Progl, F. X., "Many Projects Aid Williamsburg Bridge Rehab," *Better Roads*, May 2001.

The 18<sup>th</sup> International Bridge Conference, Pittsburgh, Pennsylvania, 4 – 6 June 2001. This is the largest annual bridge conference held in the country. The NYC DOT representatives presented a paper on the reconstruction of the East River Bridges. New York State was the featured State in this year's conference, and NYC DOT was part of the State's exhibit.

Tsinghua University and the Department of Transportation, Beijing, China, 19 – 23 September 2001. Dr. Yanev taught a brief course on bridge management.

Yamaguchi University, Yamaguchi, Japan, 28 September 2001. Yanev, B. *Maintenance Level Assessment for the New York City Bridges*.

New York City Bridge Conference, New York, New York, 29 – 30 October 2001. Perahia, Henry D. *New York City Bridge Rehabilitation Program*. In addition, Dr. Yanev was on the steering committee and chaired the session on "Examples from Worldwide Bridge Experience."

Dr. Yanev's article, "Bridge Maintenance Life-Cycle Cost Assessment" appears in *Life-Cycle Cost Analysis of Civil Infrastructure Systems*, American Society of Civil Engineers, 2001.

In addition, Dr. Yanev participated on the technical advisory panels of the National Council for Highway Research (NCHR) for the following projects: FHWA DTFH61-98-C-00094 *Seismic Vulnerability of the Highway System* and NCHRP 10-57 *Strength Evaluation of Parallel Wire Suspension Bridge Cables*.

In addition, the Division sponsors a in-house lecture series, inviting speakers from industry and academia several times a month.

## Appendix A

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### BRIDGE CAPITAL PROGRAM

<b>East River Bridge Rehabilitation Plans</b>	<b>A-1</b>
<b>Bridges Under Construction</b>	<b>A-2</b>
<b>Component Rehabilitation</b>	<b>A-3</b>
<b>Bridges Under Design</b>	<b>A-4</b>

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<b>MANHATTAN BRIDGE</b>	
REHABILITATION ITEMS	
TOTAL ESTIMATED COST	
	Est. Cost (\$ in millions)
• Repair floor beams. (1982)	0.70*
• Replace inspection platforms, subway stringers on approach spans. (1992)	6.30*
• Install truss supports on suspended spans (1985)	0.50*
• Partial rehabilitation of walkway. (1989)	3.00*
• Rehabilitate truss hangers on east side of bridge. (1989)	0.70*
• Install anti-torsional fix (side spans) and rehabilitate upper roadway decks on approach spans on east side; replace drainage system on approach spans, install new lighting on entire upper roadways east side, including purchase of fabricated material for west side of bridge. (1989)	40.30*
• Eyebar rehabilitation - Manhattan anchorage Chamber "C". (1992)	12.20*
• Replacement of maintenance platform in the suspended span. (1996)	4.27*
• Reconstruct maintenance inspection platforms, including new rail and hanger systems and new electrical and mechanical systems; over 2,000 interim repairs to structural steel support system of lower roadway for future functioning of roadway as a detour during later construction contracts. (1997)	23.50*
• Install anti-torsional fix on west side (main and side spans); west upper roadway decks, replace drainage systems on west suspended and approach spans; walkway rehabilitation (install fencing, new lighting on west upper roadways and walkways); rehabilitate cables in both Brooklyn and Manhattan anchorage chambers; dehumidify Brooklyn and Manhattan anchorages.(1993)	96.90**
• Installation of test panels. (1985)	1.55****
• Removal of existing suspender ropes and sockets in the suspended spans; replacement with new suspender ropes and sockets in the suspended spans and re-tensioning of suspender ropes bearing plates; re-tensioning of cable band bolts; removal of existing main cable wrapping; cleaning of main cables; application of new protective paste on main cables; replacement of new main cable wrapping; reinforcement of truss verticals and gusset plates. (1987)	70.00***
• Interim Steel Rehabilitation and Painting - cable and saddle repairs lower roadway floorbeams @PP 37/38 on approaches and at anchorages; west side truss rockers and grillages on approaches; cable and suspender repairs. Removal of parking desk. Painting entire west side, all four cables. (1997)	124.10*

**MANHATTAN BRIDGE**  
**REHABILITATION ITEMS**  
**TOTAL ESTIMATED COST**

	Est. Cost (\$ in millions)
<ul style="list-style-type: none"> <li>• Stiffening of Main Span; Reconstruction of North Subway framing; reconstruction of North upper roadway deck at suspended spans; rehabilitation of north approach span trusses; replace overlay on north upper roadway approach spans; rehabilitation of north elevated structures and subway tunnels; removal of railing on truss "D" in the north spans; painting of north side of bridge; new inspection platforms and debris protection in approach spans; construction of new north bikeway, replacement of approach span bearings and grillages; installation of Intelligent Vehicle Highway System for North and South Upper Roadways as well as for Lower Roadway.(Present)</li> </ul>	175.38**
<ul style="list-style-type: none"> <li>• Rehabilitation of Lower Roadway; rehabilitation of anchorage roofs under lower roadway; rehabilitation of substructures and retaining walls in Brooklyn and Manhattan approaches; installation of new signage on bridge and at plaza areas; installation of new lighting on lower roadway and plaza areas; clean and paint lower roadway; installation of grating platform under towers at lower roadway; canopy lighting at towers. (Present)</li> </ul>	117.00***
<ul style="list-style-type: none"> <li>• Seismic Retrofit</li> </ul>	20.00***
<b>TOTAL: \$ 696.40</b>	

- \* Construction Complete
- \*\* In Construction
- \*\*\* In Design
- \*\*\*\* Research and Development (completed)

**QUEENSBORO BRIDGE**  
**REHABILITATION ITEMS**  
**TOTAL ESTIMATED COST**

	Est. Cost (\$ in millions)
• Repair lower outer roadways / reconstruct two ramps in lower Queens (1984)	18.80*
• Reconstruct south upper roadway, replace inspection platforms, lighting (1986)	31.50*
• Interim rehabilitation, contracts A, B, & C (repairs to lower deck and main bridge approaches). (1985)	2.80*
• Interim rehabilitation, contract D (repairs to lower deck, main bridge, and new median barrier). (1988)	3.00*
• Reconstruct north upper roadway and Queens approaches A & B, rehabilitate bearings at Queens approach. (1989)	50.00*
• Reconstruct ramps C & D (Queensboro only, not Thompson Ave.) (1988)	10.40*
• Rehabilitate bridge bearings, pier tops, and truss lower chords. (1989)	18.00*
• Rehabilitate Queens approach trusses, lower inner roadways on the main span and approaches. (1996)	172.00*
• Rehabilitate lower outer roadways main span and approaches, (bikeway) cleaning and painting. (2001)	212.10*
• Cleaning and painting main bridge upper trusses. (In Progress)	81.16***
• Miscellaneous Items (In Progress)	26.86***
• Seismic Retrofit	15.00***
	<b>TOTAL: \$ 641.62</b>

\* Construction Complete

\*\* In Construction

\*\*\* In Design

**WILLIAMSBURG BRIDGE**  
**REHABILITATION ITEMS**  
**TOTAL ESTIMATED COST**

	Est. Cost (\$ in millions)
• Replace main span outer roadway. (1983)	11.20*
• Replace one third of suspenders. (1984)	3.20*
• Repair pier 20E foundation, and replace bulkhead. (1986)	2.30*
• Paint side spans and towers. (1985)	1.10*
• Paint main and approach spans. (1989)	4.24*
• Emergency interim repairs. (1989)	10.00*
• Install temporary hand-rope system on main cables. (1990)	0.63*
• Main cable preservation (field test - oiling). (1991)	0.44*
• Main cable strand splicing at Manhattan anchorage. (1991)	0.29*
• Interim pedestrian walkway. (1994)	1.05*
• Component repairs of flag conditions on the north outer roadway and north inner roadway. (1994)	4.12*
• Rehabilitate main cables and new redundant suspender system. (1996)	74.00*
• Demolish existing building under approaches. (1993)	1.50*
• Testing Program for bored-in piles. (1993)	0.74*
• Demolish DOS and DOH buildings, replace entire south outer roadway approach structures, rehabilitate south outer roadway deck and south inner roadway deck of the main bridge, and replace south inner roadway substructure of the approaches. (1998)	155.00*

**WILLIAMSBURG BRIDGE**  
**REHABILITATION ITEMS**  
**TOTAL ESTIMATED COST**

	Est. Cost (\$ in millions)
• Portion of Contract #6 BMT track structure work transferred to ongoing Contract #5 south approach roadway reconstruction work. (1998)	65.00*
• Paint main and intermediate towers. (2001)	14.90 (1)
• Reconstruct BMT Subway structure; install new signals, tracks and communication system. (2000)	166.00*
• Miscellaneous rehabilitation work: rehabilitation of towers, replace bearings, travelers, architectural work, painting of north and south trusses, suspender adjustment, tower jacking, construction of colonnades.	148.00***
• Replace north approach structures (Manhattan / Brooklyn), and rehabilitate north half of bridge. (In Progress)	202.80**
• Seismic Retrofit	10.00***
	<b>TOTAL: \$ 876.51</b>

\* Construction Complete

\*\* In Construction

\*\*\* In Design

(1) Painting suspended in 1996 pending publication of Environmental Impact Statement (EIS) in 1998. Painting resumed under a new schedule in 1999 and was completed in 2001.

**BROOKLYN BRIDGE**  
**REHABILITATION ITEMS**  
**TOTAL ESTIMATED COST**

	Est. Cost (\$ in millions)
• Brooklyn Tower protection and new sign gantries. (1981)	2.72*
• Rehabilitate promenade between towers. (1983)	0.94*
• Rehabilitate cables in anchorage and replace short rod suspenders; rehabilitate balance of promenade and construct bikeway and new pedestrian ramp. (1988)	22.68*
• Rehabilitate and paint York, Main, William and Prospect Street structures and main bridge roadway deck overlay. (1988)	6.21*
• Replace suspenders, cable posts, stay cables, hand-rope necklace lights, main cable wrapping; paint suspended spans. (1991)	53.57*
• Rehabilitate ramp E. concrete piers of ramp C and abutment at ramps C & I, and rehabilitate Sands and Washington Street structures in Brooklyn. (1991)	4.73*
• Rehabilitate ramp D and H in Manhattan; permanent improvement of promenade at Manhattan approach. (1993)	17.92*
• Rehabilitate floor systems, stiffening trusses, roadways of suspended spans and Franklin Square trusses. (1994)	66.30*
• Rehabilitate Manhattan traveler (electrical work). (1997)	1.83*
• Rehabilitate ramp D and widening along the FDR Drive. (1996)	11.50*
• Arch supports for Franklin Square truss structure.	9.50*
• Replacement of Suspended Span Deck (2000)	33.8*
• Resurfacing of the main spans (1998)	6.67*

**BROOKLYN BRIDGE**  
 REHABILITATION ITEMS  
 TOTAL ESTIMATED COST

	Est. Cost (\$ in millions)
• • Improvement of Manhattan end of promenade (2001)	4.50*
• Rehabilitate Brooklyn approach & ramps (B, S, F) and Rehabilitate Manhattan approaches and remaining ramps (A, B, C, F, G, I, J). (In Progress)	115.00**
• Painting	74.00**
• Seismic Retrofit	25.00**
• • Replacement of Travelers	7.20**

**TOTAL: \$ 464.07**

\* Construction Complete

\*\* In Design

\*\*\* In Construction

**BRIDGES UNDER CONSTRUCTION**

CALENDAR YEAR 2001

<b>CONTRACT #</b>	<b>BRIDGE</b>
HBXC007	East 178 <sup>th</sup> Street Pedestrian Bridge over Metro North RR
HBX526	West 205th Street over NYCT Yards
HBX644R	Madison Avenue Bridge over the Harlem River
HBX663	3rd Avenue over Harlem River (& 3rd Avenue Ramp to Bruckner Boulevard)
HBX1030	East Tremont Avenue over Metro North RR
HBX1106	East 161st Street over Conrail Port Morris
HBX1148R	Shore Road over Hutchinson River
HBK543	Kings Highway over BMT Sea Beach
HBK549R	4 <sup>th</sup> Avenue Bridge over NYCT BMT Tracks
HBK1021	Coney Island Avenue Bridge over BSHP
HBK1022	Flatbush Avenue Bridge over BSHP
HBK1051	Ridge Boulevard Bridge over Shore Road Drive
HBK1052	3 <sup>rd</sup> Avenue Bridge over Shore Road Drive
HBK1048	8 <sup>th</sup> Avenue Bridge over LIRR & Sea Beach
HBK1049	New Utrecht Avenue Bridge over LIRR Bay Ridge
HBK1099	6 <sup>th</sup> Avenue Bridge over LIRR & Sea Beach
HBQ432A	Honeywell Street Bridge over Amtrak and LIRR Yard
HBQ448	Queens Boulevard Bridge over Amtrak and LIRR Yard
HBQ662	Guy Brewer Boulevard over Belt System—Southern Parkway
HBQ1076	65 <sup>th</sup> Street Bridge over LIRR
HBQ1110	91st Place over LIRR
HBRC033	Hope Avenue over Abandoned Railroad (demolition)
HBR657	South Avenue Bridge over B&O Railroad
HBR659	Hylan Boulevard Bridge over Lemon Creek
HBR1108	Greaves Avenue Bridge (Great Kill Road) over SIRT
BRC156C	Manhattan Bridge – Contract #10
BRC231B	Queensboro Bridge – Contract #5 - Lower Outer Roadways
BRC291	9 <sup>th</sup> Street Bridge over the Gowanus Canal
BRC253C	Williamsburg Bridge – Reconstruction of North Roadways
BRC1568C	Manhattan Bridge Painting and Interim Rehabilitation
BRX287R	Macombs Dam Bridge over Harlem River
HBMC023	Rehabilitation of electrical/mechanical components for First Avenue Tunnel, Park Avenue Tunnel, and Battery Park Underpass

BRIDGE CONSTRUCTION	
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*Projects Completed in Calendar Year 2001*

CONTRACT #	BRIDGE
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HBXC007	East 178th Street Pedestrian Bridge over Metro North
HBX526	West 205th Street over NYCT Yards
HBK543	Kings Highway over BMT Sea Beach
HBK549R	4 <sup>th</sup> Avenue Bridge over NYCT BMT Tracks
HBK1021	Coney Island Avenue Bridge over BSHP
HBK1022	Flatbush Avenue Bridge over BSHP
HBK1051	Ridge Boulevard Bridge over Shore Road Drive
HBK1052	3rd Avenue Bridge over Shore Road Drive
HBQ1076	65th Street over LIRR
HBR657	South Ave. over B&O Railroad
HBR1108	Greaves Avenue Bridge (Great Kill Road) over SIRT
BRC231B	Queensboro Bridge – Contract #5 - Lower Outer Roadways
BRC1568C	Manhattan Bridge Painting and Interim Rehabilitation

### Component Rehabilitation

The following table illustrates the program's performance over the last eight years:

	FY 94	FY 95	FY 96	FY 97	FY 98	FY 99	FY 00	FY 01
Number of Bridges	20	35	13	30	13	21	24	16
Construction Cost	\$19.1 M	\$18.9 M	\$8.7 M	\$15.9 M	\$8.8 M	\$15.7 M	\$5.26 M	\$13.2 M

No contracts were bid during the 2001 calendar year.

In 2001, work was completed at the following bridges, in the indicated boroughs, at the final cost shown, in millions:

Willis Avenue/Harlem River (BX/M)	\$ 0.802
Ocean Parkway/LIRR (K)	\$ 0.795
Sixth Avenue/LIRR (K)	\$ 0.275
Corbin Place Overpass/Corbin Place (M)	\$ 0.277
Myrtle Avenue/Jackie Robinson Parkway (Q)	\$ 0.772
Slater Boulevard/New Creek (R)	\$ 0.548
Martling Avenue/Richmond Lake Dam (R)	\$ 0.114
McClellan Avenue/Abandoned B&O RR (R)	\$ 0.996
<b>TOTAL</b>	<b><u>\$ 4.579 M</u></b>

During calendar year 2001, work commenced at the following bridges:

Fieldston Road/Henry Hudson Parkway (BX)
Sixth Avenue/LIRR (K)
HHP/Pedestrian Underpass at West 148 <sup>th</sup> Street (M)
Riverside Drive Bridge/West 96 <sup>th</sup> Street (M)
Corbin Place Overpass/Corbin Place (M)
Tudor City Place/East 42 <sup>nd</sup> Street (M)
Myrtle Avenue/Jackie Robinson Parkway (Q)
McClellan Avenue/Abandoned B&O RR (R)
Huguenot Avenue/SIRT (R)
Slater Boulevard/New Creek (R)

### Component Rehabilitation

There are two projects “still under construction” since the 2000 *Annual Report* was issued.

Walton Avenue/Metro North (BX)  
New Dorp Lane/SIRT (R)

18 component rehabilitation projects are slated to continue, commence or be completed in the 2002 calendar year. They are:

East Tremont Avenue/HRP (BX)  
Fieldston Road/HHP (BX)  
Grand Concourse/East 170<sup>th</sup> Street (BX)  
Riverdale Avenue/HHP (BX)  
Walton Avenue/Metro North (BX)  
West 246<sup>th</sup> Street/HHP (BX)  
Broadway Bridge/Harlem River (BX/M)  
HHP/Pedestrian Underpass at West 148<sup>th</sup> Street (M)  
Isham Park Vehicular Road/Harlem River Inlet (M)  
Riverside Drive Bridge /West 96<sup>th</sup> Street (M)  
Tudor City Place/East 42<sup>nd</sup> Street (M)  
West 45<sup>th</sup> Street/Amtrak (M)  
Cypress Hills Cemetery Road (E)/JRP (Q)  
Cypress Hills Cemetery Road (W)/JRP (Q)  
Rockaway Boulevard/Thurston Basin (Q)  
Huguenot Avenue/SIRT (R)  
New Dorp Lane/SIRT (R)  
Travis Avenue/Main Creek (R)

## BRIDGES UNDER DESIGN BY NEW YORK CITY

BIN NO.	CAPIS NO.	FEATURE CARRIED	FEATURE CROSSED	FY CNST	PHASE	BORO
2241840	HBCREPL98B	BEDFORD PARK BLVD	METRO NORTH RR	2003	FD	B
2075820	HBCREPL98B	E. TREMONT AVE	HRP	2003	FD	B
2242300	HBCREPL98B	GRAND CONCOURSE	E. 170 <sup>th</sup> ST.	2003	FD	B
2242329	HBCREPL98B	GRAND CONCOURSE	E. 175 <sup>th</sup> ST.	2004	FD	B
2229510	HBCREPL98B	RIVERDALE AVE	HHP	2003	FD	B
2241040	HBCREPL98B	3 <sup>RD</sup> AVE	CONRAIL PORT MORRIS	2003	FD	B
2241560	HBCREPL98B	E 149 <sup>TH</sup> ST	METRO NORTH RR	2003	FD	B
2241010	HBCREPL98B	E 156 <sup>TH</sup> ST	CONRAIL PORT MORRIS	2003	FD	B
2241660	HBCREPL98B	E 168 <sup>TH</sup> ST	METRO NORTH RR	2003	FD	B
2241720	HBCREPL98B	E 173 <sup>RD</sup> ST	METRO NORTH RR	2003	FD	B
1067150	HBCREPL98B	E 238 <sup>TH</sup> ST	BRP & METRO NORTH	2003	FD	B
2229490	HBCREPL98B	W 246 <sup>TH</sup> ST	HHP	2003	FD	B
2242071	HBCREPL99A	BRONX BLVD SB	BRONX RIVER	2003	FD	B
2242072	HBCREPL99A	BRONX BLVD NB	BRONX RIVER	2003	FD	B
2241330	HBCREPL99A	UNION PORT RD	AMTRAK & CONRAIL	2004	FD	B
2241129	HBCREPL99A	E 149 <sup>TH</sup> ST	AMTRAK	2004	FD	B
2241259	HBPED1	204TH ST PED BRIDGE	METRO NORTH RR	2003	DB	B
2241570	HBX199	E 153RD ST.	METRO NORTH RR	2005	PD	B
2075837	HBX1086	WESTCHESTER AVENUE	HRP	2004	FD	B
2241590	HBX1103	CONCOURSE VILL AVE	METRO NORTH RR HAR	2003	FD	B
2242259	HBX1104	GRAND CONCOURSE	E 161ST ST	2004	FD	B
2075849	HBX1127	BRONX PELHAM PKWY	HUTCHINSON RVR PKWY	2004	FD	B
1066510	HBX1131	BRUCKNER EXP.	WESTCHESTER CREEK	2006	PD	B
2241800	HBX1139	E 183RD ST	METRO NORTH RR HAR	2003	FD	B
	NEW					
2240200	HBX1148B	SHORE ROAD (NEW)	HUTCHINSON RIVER	2008	PD	B
2241210	HBX1152	BRYANT AVE	AMTRAK	2005	PD	B
2229480	HBX1155	MANHATTAN COLL PKWY	HHP	2003	FD	B
2229470	HBX1156	W 239TH ST	HHP	2003	FD	B
2229500	HBX1157	W 252ND ST	HHP	2003	FD	B
2229450	HBX1158	W 232ND ST	HHP	2003	FD	B
2241710	HBX1160	CLAREMONT PKWY	METRO NORTH RR HAR	2004	FD	B
2241860	HBX1163	GUN HILL RD	METRO NORTH RR HAR	2003	FD	B
2240210	HBX1164	CITY ISLAND ROAD	EASTCHESTER BAY	2007	PD	B
2241810	HBX1172	E 188TH ST	METRO NORTH RR HAR	2004	PD	B
2241409	HBX1190	GRAND CONCOURSE	METRO NORTH RR HUD	2005	PD	B
2242319	HBX1191	GRAND CONCOURSE	E 174 <sup>TH</sup> ST	2005	PD	B
2241390	HBX1195	SHORE RD CIRCLE	AMTRAK	2003	FD	B
2240137	HBM1147	BROADWAY	HARLEM RIVER	2006	PD	BM
2240079	HBX644S	MADISON AVE	HARLEM RIVER	2007	PD	BM
1240090	BRX287S	MACOMBS DAM BRIDGE	HARLEM RIVER	2006	PD	BM
2240089	HBX1029	145TH ST BRIDGE	HARLEM RIVER	2003	FD	BM
2240027	BRC156A	MANHATTAN BRIDGE (LL)	EAST RIVER	2004	FD	KM
2240027	BRC156R	MANHATTAN BRIDGE (LL)	EAST RIVER	2006	PD	KM
2240028	BRC156R	MANHATTAN BRIDGE (UL)	NYCTA TRACKS-BMT	2006	PD	KM
2240028	BRC156SR	MANHATTAN BRIDGE (UL)	NYCTA TRACKS-BMT	2007	PD	KM

PD=Preliminary Design; FD=Final Design; DB=Design Build  
1/22/02

## BRIDGES UNDER DESIGN BY NEW YORK CITY

BIN NO.	CAPIS NO.	FEATURE CARRIED	FEATURE CROSSED	FY CNST	PHASE	BORO
2240039	BRC253CC	WILLIAMSBURG BRIDGE	EAST RIVER	2003	FD	KM
2240019	BRC270C	BROOKLYN BRIDGE	2781 (B.Q.E.)	2007	FD	KM
2240019	BRC270S	BROOKLYN BRIDGE	2781 (B.Q.E.)	2007	PD	KM
2240019	BRC270T	BROOKLYN BRIDGE	2781 (B.Q.E.)	2005	FD	KM
VARIOUS	HBCBORERS-R	VARIOUS	VARIOUS	2005	FD	KM
2240310	HBCREPL99A	3 <sup>RD</sup> AVE	GOWANUS CANAL	2003	FD	K
2231419	HBCREPL99B	BSHP	OCEAN AVENUE	2004	FD	K
2243480	HBCREPL99B	OCEAN AVE	LIRR	2004	FD	K
2243420	HBKC059	E 3RD ST	LIRR BAY RIDGE	2003	FD	K
2243710	HBKC062	19TH AVE	BMT SEA BEACH	2007	PD	K
2243390	HBKC063	52ND ST	LIRR BAY RIDGE	2003	FD	K
2243100	HBKC064	BEVERLY ROAD	BMT SUBWAY, BRIGHTON	2004	FD	K
2243010	HBKC065	LINCOLN ROAD	BMT SUBWAY, BRIGHTON	2003	FD	K
VARIOUS	HBKC1144	BQE JOINTS	VARIOUS LOCATIONS	2003	FD	K
2231300	HPED1	17 <sup>TH</sup> AVE PED BRIDGE	BSHP	2003	DB	K
2231260	HPED1	92 <sup>ND</sup> ST PED BRIDGE	BSHP	2003	DB	K
2269260	HPED2	W 8 <sup>TH</sup> ST PED BRIDGE	SURF AVE	2004	DB	K
2243020	HBK530	PARKSIDE AVE	BMT SUBWAY, BRIGHTON	2005	FD	K
2243050	HBK531	CATON AVE	BMT SUBWAY, BRIGHTON	2005	FD	K
2243690	HBK538	17TH AVE	BMT SEA BEACH	2003	FD	K
2243720	HBK539	20TH AVE	BMT SEA BEACH	2003	FD	K
2243820	HBK548	21ST AVE	BMT SEA BEACH	2007	PD	K
2231450	HBK643	BSHP	GERRITSEN INLET	2004	FD	K
2231370	HBK668	E 8TH ST ACCESS RMP	BSHP	2003	FD	K
2231479	HBK1023	BSHP	MILL BASIN	2005	FD	K
2231489	HBK1024	BSHP	PAERDEGAT BASIN	2004	FD	K
2243080	HBK1032	CHURCH AVE	BMT SUBWAY, BRIGHTON	2005	FD	K
2243850	HBK1034	LIBERTY AVE	LIRR BAY RIDGE	2003	FD	K
2243890	HBK1035	SUTTER AVE	LIRR BAY RIDGE	2003	FD	K
2243670	HBK1039	15TH AVE	BMT SEA BEACH	2003	FD	K
2243700	HBK1040	18TH AVE	BMT SEA BEACH	2003	FD	K
2243510	HBK1046	FLATBUSH AVE	LIRR BAY RIDGE	2004	FD	K
2231509	HBK1072	BSHP	FRESH CREEK	2004	FD	K
2231249	HBK1089	BSHP	BAY RIDGE AVE	2005	PD	K
2231439	HBK1090	BSHP	NOSTRAND AVE	2005	PD	K
2231499	HBK1091	BSHP	ROCKAWAY PKWY	2005	PD	K
2243870	HBK1097	PITKIN AVE	LIRR BAY RIDGE	2003	FD	K
2240231	HBK1140	HAMILTON AVE BRIDGE	GOWANUS CANAL	2004	FD	K
2240232	HBK1140	HAMILTON AVE BRIDGE	GOWANUS CANAL	2004	FD	K
2240290	HBK1149	METROPOLITAN AVE	ENGLISH KILLS	2003	FD	K
2230887	HBK1151	278I W.B. (B.Q.E.)	CADMAN PLAZA	2003	FD	K
2230888	HBK1151	278I E.B. (B.Q.E.)	CADMAN PLAZA	2003	FD	K
2243140	HBK1153	NEWKIRK AVE	BMT SUBWAY, BRIGHTON	2003	FD	K
2243040	HBK1154	CROOKE AVE	BMT SUBWAY, BRIGHTON	2003	FD	K
2244470	HBK1167	SEELEY ST	PROSPECT AVE	2003	FD	K
2230390	HBK1168	CONGRESS ST	278I (B.Q.E.)	2003	FD	K
2231360	HBK1193	BSHP	OCEAN PKY	2003	DB	K

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BIN NO.	CAPIS NO.	FEATURE CARRIED	FEATURE CROSSED	FY CNST	PHASE	BORO
2243860	HBK1196	GLENMORE AVE	LIRR	2003	FD	K
2243569	HBK1201	ATLANTIC AVE	LIRR ATLANTIC AVE	2007	PD	K
2240270	HBK1213	UNION STREET BRIDGE	GOWANUS CANAL	2006	PD	K
2240390	HBK1161	GRAND ST BRIDGE	NEWTON CREEK	2006	PD	KQ
2240047	BRC231C	QUEENSBORO BRIDGE (LL)	EAST RIVER	2003	FD	MQ
2240047	BRC231S	QUEENSBORO BRIDGE (LL)	EAST RIVER	2007	PD	MQ
2240048	BRC231C	QUEENSBORO BRIDGE (UL)	EAST RIVER	2003	FD	MQ
2240048	BRC231S	QUEENSBORO BRIDGE (UL)	EAST RIVER	2007	PD	MQ
2240640	HBC1117	ROOSEVELT ISLAND	E. RIVER E. CHANNEL	2005	PD	MQ
2246500	HBCREPL99A	FORT TYRONE PLACE	ENT. FR. RIVERSIDE DR.	2003	FD	M
M00001	HBCREPL99A	191 <sup>ST</sup> ST TUNNEL	BROADWAY	2003	FD	M
2246570	HBCREPL99B	UNITED NATIONS PLAZA	1 <sup>ST</sup> AVE TUNNEL	2004	FD	M
2245090	HBMC032	W 43 <sup>RD</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2008	PD	M
2245130	HBMC033	W 47 <sup>TH</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2007	PD	M
2245150	HBMC034	W 49 <sup>TH</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2007	PD	M
2245340	HBMC035	W 50 <sup>TH</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2007	PD	M
2245180	HBMC036	W 53 <sup>RD</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2007	PD	M
224501C	HBMC037	W 33 <sup>RD</sup> ST	LAND ADJ TO AMTRAK	2008	PD	M
2245300	HPED2	INWOOD HILL PARK FOOTBRIDGE	AMTRAK 30 <sup>TH</sup> ST BRANCH	2004	DB	M
2246620	HPED1	PED BRIDGE	E 128 <sup>TH</sup> ST	2003	DB	M
2246430	HPED2	WEST DRIVE	PED WALK OPP 109 <sup>TH</sup> ST BRIDGE	2004	DB	M
2245230	HPED2	W 148 <sup>TH</sup> ST PED BRIDGE	AMTRAK 30 <sup>TH</sup> ST BRANCH	2004	DB	M
2229400	HPED2	W 181 <sup>ST</sup> ST PED BRIDGE	HHP NB	2004	DB	M
2246540	HBM551	E 34TH ST	PARK AVE TUNNEL	2006	PD	M
2233059	HBM1027	HARLEM RIVER DRIVE	RAMP TO HRD N.B.	2007	PD	M
2245010	HBM1120	11 <sup>th</sup> AVE VIADUCT	LIRR WEST SIDE YARD	2008	PD	M
2240059	HBM1124	WILLIS AVENUE	HARLEM RIVER	2007	FD	BM
224005A	HBM1124	FROM FDR DRIVE	HARLEM RIVER DRIVE	2007	FD	M
224005B	HBM1124	TO BRUCKNER BLVD (WILLIS)	RELIEF	2007	FD	M
2246490	HBM1145	A.C. POWELL BLVD N.B.	A.C. POWELL BLVD	2006	PD	M
2246710	HBM1145B	W 153 ST	A.C. POWELL BLVD	2006	PD	M
2232000	HBM1146	BATTERY PLACE	FDR DRIVE	2004	PD	M
2240620	HBM1159	WARDS ISLAND PED BRDG	HARLEM RIVER	2010	PD	M
2246720	HBM1165	RIVERSIDE DRIVE	W 158TH ST	2007	PD	M
226672A	HBM1171	W 31ST ST	AMTRAK LAYUP TRACKS	2004	FD	M
2245070	HBM1174	W 38 <sup>TH</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2008	PD	M
2245080	HBM1175	W 39 <sup>TH</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2008	PD	M
2245100	HBM1176	W 44 <sup>TH</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2007	PD	M
2245120	HBM1177	W 46 <sup>TH</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2007	PD	M
2245140	HBM1178	W 48 <sup>TH</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2007	PD	M
2245210	HBM1179	W 42 <sup>ND</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2008	PD	M
2245440	HBM1180	W 40 <sup>TH</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2008	PD	M
2245330	HBM1183	W 41 <sup>ST</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2008	PD	M
224501B	HBM1184	W 33 <sup>RD</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2008	PD	M
224501D	HBM1185	W 34 <sup>TH</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2008	PD	M

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BIN NO.	CAPIS NO.	FEATURE CARRIED	FEATURE CROSSED	FY CNST	PHASE	BORO
224501E	HBM1186	W 35 <sup>TH</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2008	PD	M
224501F	HBM1187	W 36 <sup>TH</sup> ST	AMTRAK 30 <sup>TH</sup> ST BRANCH	2008	PD	M
2245209	HBM1188	11 <sup>TH</sup> AVE	AMTRAK 30 <sup>TH</sup> ST BRANCH	2008	PD	M
2229290	HBM1189	W 79 <sup>TH</sup> ST	AMTRAK	2007	PD	M
2267717	HBM1189	79 <sup>TH</sup> ST PED PLAZA	79 <sup>TH</sup> ST BOAT BASIN GARAGE	2004	PD	M
2267718	HBM1189	79 <sup>TH</sup> ST TRAFFIC CIRCLE	79 <sup>TH</sup> ST PED PLAZA	2004	PD	M
226771A	HBM1189	79 <sup>TH</sup> ST RAMP TO HHP	79 <sup>TH</sup> ST BOAT BASIN GARAGE	2004	PD	M
226771B	HBM1189	79 <sup>TH</sup> ST RAMP TO GARAGE	79 <sup>TH</sup> ST BOAT BASIN GARAGE	2004	PD	M
226771C	HBM1189	GARAGE RAMP TO 79 <sup>TH</sup> ST	79 <sup>TH</sup> ST BOAT BASIN GARAGE	2004	PD	M
226771D	HBM1189	SB HHP RAMP TO 79 <sup>TH</sup> ST	79 <sup>TH</sup> ST BOAT BASIN GARAGE	2004	PD	M
2230890	HBCREPL99A	49 <sup>TH</sup> ST	GCP	2003	FD	Q
2231819	HBCREPL99B	JAMAICA AVE	BCIP	2003	FD	Q
2231710	HBCREPL99B	MERRICK BLVD	BLP EB	2003	FD	Q
2231720	HBCREPL99B	MERRICK BLVD	BLP WB	2003	FD	Q
2247500	HBCREPL99B	METROPOLITAN AVE	CONRAIL	2004	FD	Q
224004F	HBCREPL99B	TO NY FROM 21 <sup>ST</sup> ST	21 <sup>ST</sup> ST (QUEENS)	2004	FD	Q
2231730	HBCREPL99B	130 <sup>TH</sup> AVE	BLP EB	2003	FD	Q
2247080	HBCREPL99B	149 <sup>TH</sup> ST	LIRR	2003	FD	Q
2240660	BRC289A	RIKERS ISLAND BRIDGE	RIKERS ISLAND CHANNEL	2004	DB	Q
2231880	HBPED1	CROCHERON PARK PED BRIDGE	BCIP	2003	DB	Q
1247280	HBPED1	51 <sup>ST</sup> AVE PED BRIDGE	LIRR MAIN LINE	2003	DB	Q
2247190	HBPED1	55 <sup>TH</sup> AVE PED BRIDGE	LIRR MAIN LINE	2003	DB	Q
2247020	HBPED1	94 <sup>TH</sup> ST PED BRIDGE	LIRR N SIDE	2003	DB	Q
7703720	HBPED1	216 <sup>TH</sup> ST PED BRIDGE	LIRR PORT WASH BRANCH	2003	DB	Q
1247560	HBQ1112	METRO AVE (FRESH POND)	LIRR MONTAUK DIV	2004	FD	Q
2231780	HBQ1114	HEMPSTEAD AVE	BCIP	2005	PD	Q
2266149	HBQ1114	HEMPSTEAD AVE	RAMP TO BCIP NB	2005	PD	Q
2231850	HBQ1115	UNION TPKE	BCIP	2006	PD	Q
2247120	HBQ1130	WOODSIDE AVE	LIRR MAIN LINE	2003	FD	Q
2248159	HBQ1134	WOODHAVEN BLVD	QUEENS BLVD	2004	PD	Q
2248160	HBQ1137	ELLIOT AVE	QUEENS BLVD	2007	PD	Q
2240410	HBQ1162	BORDEN AVE	DUTCH KILLS	2005	PD	Q
2231760	HBQ1173	BCIP	DUTCH BRDWAY-115 AVE	2006	PD	Q
2247530	HBQ1199	ANDREWS AVE.	LIRR MONTAUK DIV	2003	PD	Q
2231630	HBQ1200	SPRINGFIELD BLVD	BSOP	2006	FD	Q
R00049	HBRC1145	VAN PELT AVE	WALKER ST	2004	PD	R
2249820	HBRC1149	ARTHUR KILL ROAD	ARTHUR KILL STREAM	2005	FD	R
2249250	HBPED1	BETHEL AVE PED BRIDGE	SIRT SOUTH SHORE	2003	DB	R
2249390	HBPED1	CEDARVIEW PED BRIDGE	SIRT SOUTH SHORE	2003	DB	R
2249450	HBPED1	FREMONT AVE PED BRIDGE	SIRT SOUTH SHORE	2003	DB	R
2249330	HBR1166	ANNADALE ROAD	SIRT SOUTH SHORE	2003	FD	R

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## Appendix B

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### FLAG CONDITIONS

<b>Definitions and Procedures</b>	<b>B-1</b>
<b>1997-2001 Red, Yellow and Safety Flags</b>	<b>B-2</b>
<b>Flag Reporting and Tracking Process</b>	<b>B-3</b>

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**FLAG DEFINITIONS AND PROCEDURES**

(Source: NYSDOT *Engineering Instruction 94-002*)

New York State Department of Transportation (NYSDOT) bridge inspection procedures require that "Flags" be issued to report the existence of conditions that pose a clear and present danger, or conditions which, if left unattended for an extended period, would likely become a clear and present danger.

A "Flag" is classified as either a Red Flag, Yellow Flag or Safety Flag.

*Red Flag* is used to report the failure or potentially imminent failure of a critical primary structural component. Potentially imminent means that a failure is likely before the next scheduled inspection. The maximum time between bridge inspections is two years. Red Flags must be addressed within six weeks.

*Yellow Flag* is used to report a potentially hazardous condition which, if left unattended beyond the next scheduled inspection, would likely become a clear and present danger. A Yellow Flag shall also be used to report the actual or imminent failure of a non-critical primary structural component, where its failure may diminish the reserve capacity or redundancy of the bridge but would not result in structural collapse or a clear and present danger.



Flag Engineer Inspecting a Yellow Flag (Loose Masonry Panel) on the BQE under the Brooklyn Bridge.

**FLAG DEFINITIONS AND PROCEDURES**

(Source: NYSDOT *Engineering Instruction 94-002*)

*Safety Flag* is used to report a condition that presents a clear and present vehicle or pedestrian traffic hazard, but there is no danger of structural failure or collapse.



Flag Engineer Inspecting a Safety Flag (Exposed Electrical Wiring)  
on the Brooklyn Bridge Promenade.

Certain Red or Safety Flags may be further classified as Prompt Interim Action (PIA) flags. PIA flags must be addressed within 24 hours of discovery.

FLAG CONDITIONS BY CALENDAR YEAR						
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**Citywide**

	1997*	1998*	1999*	2000*	2001*	% increase (1997-2001)
FLAGS ROUTED	1,093	1,938	1,489	1,161	1150	5%
RED	36	55	50	39	24	-33%
YELLOW	272	412	495	304	399	47%
SAFETY	785	1,471	944	818	727	-7%
TTL FLGS ELIMINATED	1,162	1,785	1,517	1,335	1369	18%
RED	45	39	46	42	32	-29%
YELLOW	218	377	564	368	452	107%
SAFETY	899	1,369	907	925	885	-2%
TTL FLGS OUTSTANDING	1,921	2,074	2,046	1,872	1650	-14%
RED	18	34	38	34	26	44%
YELLOW	948	983	914	851	797	-16%
SAFETY	955	1,057	1,094	987	827	-13%

**Division of Bridges Workload**

FLAGS ROUTED	900	1,556	1,384	987	1038	15%
RED	35	52	49	39	23	-34%
YELLOW	158	397	506	301	399	152%
SAFETY	707	1,107	829	647	616	-13%
FLAGS ELIMINATED	930	1,396	1,362	1,068	1230	32%
RED	41	36	44	40	31	-24%
YELLOW	207	373	561	349	451	118%
SAFETY	682	987	757	679	748	10%
FLAGS OUTSTANDING	1,475	1,635	1,657	1,581	1392	-6%
RED	14	30	35	34	26	86%
YELLOW	919	943	888	835	782	-15%
SAFETY	542	662	734	712	584	8%

\*The number of flags routed, eliminated, and outstanding has been revised since the 2000 Annual Condition Report.

## FLAG REPORTING AND TRACKING PROCESS

There are three primary sources from which flags originate:

- NYSDOT inspectors
- NYCDOT inspectors
- NYCDOT Communications Center

### State DOT Inspectors

1. State inspectors identify flag conditions.
2. Written notification of flag conditions are sent to the Bridge's Flags unit. (Immediate verbal notification is given for Red Flags and PIA flags.)
3. Flag condition reports are entered into the Division's "City Flag" and "State Flag" database.
4. Flag conditions are reviewed by City engineers who have four routing options:
  - ◆ assign flags to outside agencies for repair, or
  - ◆ have City inspectors monitor flags until further action is desired, or
  - ◆ assign flags to the Maintenance Section for in-house or contractor repair, or
  - ◆ assign flags to the Construction Section for Capital contractor repair.
5. Each flag condition is assigned a City Flag number, and routed to the appropriate group.
6. When flag conditions are eliminated, the respective databases are updated.

### City DOT Division of Bridges Inspectors

1. City inspectors identify flag conditions and prepare a scope of work. (Immediate verbal notification is given for Red Flags and PIA flags.)
2. Flag condition reports are received and reviewed by the Flags unit.
3. Flag condition reports are entered into the "City Flag" database.
4. Flag conditions are reviewed by City engineers who have four routing options:
  - ◆ assign flags to outside agencies for repair, or
  - ◆ have City inspectors monitor flags until further action is desired, or
  - ◆ assign flags to the Maintenance Section for in-house or contractor repair, or
  - ◆ assign flags to the Construction Section for Capital contractor repair.
5. When flag conditions are eliminated, the database is updated.

### City DOT Communications Center

1. Flag condition is phoned in.
2. City inspectors visit the site to review the reported condition.
3. If the deficiency warrants, a flag condition report is filed.
4. Flag condition reports are entered into the "City Flag" database.
5. Flag conditions are reviewed by City engineers who have four routing options:
  - ◆ assign flags to outside agencies for repair, or
  - ◆ have City inspectors monitor flags until further action is desired, or
  - ◆ assign flags to the Maintenance Section for in-house or contractor repair, or
  - ◆ assign flags to the Construction Section for Capital contractor repair.
6. When flag conditions are eliminated, the database is updated.

## Appendix C

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### 2001 INVENTORY

<b>Inventory Summary</b>	<b>C-1</b>
<b>Posted, Partially Closed &amp; Closed Bridges</b>	<b>C-2</b>
<b>Bridge Identification Numbers</b>	<b>C-3</b>
<b>New York State Inspection System</b>	<b>C-4</b>
<b>Standard Abbreviations</b>	<b>C-5</b>
<b>Information on Inventory Lists</b>	<b>C-6</b>
<b>Adjustments to the Inventory</b>	<b>C-7</b>
<b>Listing of Bridge Inventory and Conditions</b>	<b>C-8</b>

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## Inventory Summary

In Calendar Year 2001, the Division of Bridges demolished or transferred ownership of seven bridge structures, bringing the total number of bridge and tunnel structures under the jurisdiction the New York City Department of Transportation (NYCDOT) to 752. In 1999, a Memorandum of Understanding between NYCDOT and the New York City Department of Environmental Protection (NYCDEP) added 67 culverts in Staten Island to the Division's Inventory. While the Division is responsible for the capital rehabilitation of these structures, maintenance and inspection responsibilities remain with NYCDEP.

The condition of New York City's 752 elevated bridge structures (including six tunnels), as measured by the City's general condition rating, are as follows: 9 structures were rated *Poor*, 459 structures were rated *Fair*, 196 structures were rated *Good*, and 88 structures were classified *Very Good*.

The bridges in the Division's inventory connect a vast and diverse highway and street network throughout the City. The impressive East River crossings – the Brooklyn, Manhattan, Williamsburg, and Queensboro Bridges – are the most visible and famous structures, but are by no means representative of all the bridges in the City's inventory. Two hundred eighty-four (38%) of the Division's structures consist of one span (the portion of a bridge between two supports). Seventy-six (10%) bridges carry pedestrian traffic. Of the 752 structures in the City's inventory, 82 (11%) cross waterways; of these, 19 connect the boroughs of the Bronx, Brooklyn, Manhattan and Queens. Three hundred fifteen (42%) structures cross the City's labyrinthine system of railroad and subway tracks. Two hundred forty-two (32%) structures cross or connect arterial highways, such as the Henry Hudson Parkway, the Brooklyn-Queens Expressway, and the Belt Parkway, which facilitate traffic flow through and around the five boroughs of the City of New York.

### Rating System

The Division of Bridges bases its general condition ratings directly on the numerical ratings assigned during bridge inspections. Federal law mandates that bridge structures be inspected at least once every two years. The New York State Department of Transportation hires engineering consultants to perform biennial inspections for all bridge structures except pedestrian bridge structures, and bridge structures less than 20 feet in length. Bridge structures not inspected by the State are inspected by the NYC Department of Transportation's Division of Bridges.

The State inspected 666 (89%) bridge structures. The balance of 86 (11%) were inspected by the City. Each structure in a biennial inspection is given an overall numerical condition rating from 1 (structural failure) to 7 (new condition), reflecting a weighting of key features of the structure (see Appendix C-4). In certain cases, where a bridge structure is closed to traffic, only a city condition rating is given.

City condition ratings coincide with the following ranges of State ratings:

State Numerical Rating	=	City Condition Rating
1.000 – 3.000	=	POOR
3.001 – 4.999	=	FAIR
5.000 – 6.000	=	GOOD
6.001 – 7.000	=	VERY GOOD

This method is used as a guide in assessing what operational action is needed. The overall bridge rating, in and of itself, is not always indicative of whether a bridge needs major rehabilitation. Further inspection and analysis must be done to determine specific rehabilitation or corrective repair needs.

### Summary of 2001 Structure Conditions

Rating	Number of Structures	Percent	Number of Spans	Percent	Deck Area Sq Ft	Percent
Poor	9	1.20%	335	7.34%	1,686,761	11.90%
Fair	459	61.04%	3256	71.34%	9,521,561	67.15%
Good	196	26.06%	656	14.37%	2,081,894	14.68%
Very Good	88	11.70%	317	6.95%	889,987	6.28%
Total	752	100%	4564	100%	14,180,203	100%

As of December 31, 2001, the condition of the City's bridges and tunnels indicated that 1.20% were rated as *Poor*; 61.04% were classified as *Fair*; 26.06% were awarded ratings of *Good*; and 11.70% as *Very Good*. Those structures given ratings of *Poor* and *Fair* encompassed 78.68% of bridge spans.

Rating	1998		1999		2000		2001	
Poor	24	3.12%	16	2.09%	13	1.71%	9	1.20%
Fair	516	67.10%	507	66.36%	481	63.37%	459	61.04%
Good	154	20.03%	160	20.94%	180	23.72%	196	26.06%
Very Good	75	9.75%	81	10.60%	85	11.20%	88	11.70%
Total	769	100%	764	100%	759	100%	752	100%

During 2001, Staten Island had the highest percentage of bridge structures rated *poor* – 1.89% - as well as the highest percentage of bridge structures classified as *good* - 33.96%, and *very good* - 30.19%, for a total of 66.04%. In 2001, Brooklyn again had no bridges rated as *poor*, and the second highest percentage of bridge structures rated as *fair* – 60.92%. Queens had the second highest percentage of bridge structures rated as *good* – 31.02%. Manhattan had the highest percentage of bridge structures rated *fair* – 71.18%, as well as the second highest percentage classified as *poor* – 1.76%.

Borough*	Poor	% of Boro	Fair	% of Boro	Good	% of Boro	Very Good	% of Boro	Total
Bronx	1	0.67%	88	59.06%	37	24.83%	23	15.44%	149
Brooklyn	0	0.00%	106	60.92%	42	24.14%	26	14.94%	174
Manhattan	3	1.76%	121	71.18%	38	22.35%	8	4.71%	170
Queens	1	0.53%	113	60.43%	58	31.02%	15	8.02%	187
Staten Island	1	1.89%	18	33.96%	18	33.96%	16	30.19%	53
<b>Total</b>	<b>6</b>	<b>1%</b>	<b>446</b>	<b>61%</b>	<b>193</b>	<b>26%</b>	<b>88</b>	<b>12%</b>	<b>733</b>

\*Does not include borough-crossing bridges (see next table).

### Summary of 2001 Structure Conditions

Just over eighty-four percent (84.21%) of the 19 bridge structures that service the five boroughs were rated in either *poor* or *fair* condition in 2001, and 15.79% were rated *good*.

Boro-Crossing	Poor	% of Boro Crossing	Fair	% of Boro Crossing	Good	% of Boro Crossing	Very Good	% of Boro Crossing	Total
Bronx-Manhattan	1	11.11%	6	66.67%	2	22.22%	0	0.00%	9
Brooklyn-Manhattan	2	50.00%	2	50.00%	0	0.00%	0	0.00%	4
Queens-Manhattan	0	0.00%	3	100.00%	0	0.00%	0	0.00%	3
Brooklyn-Queens	0	0.00%	2	66.67%	1	33.33%	0	0.00%	3
<b>Total</b>	<b>3</b>	<b>15.79%</b>	<b>13</b>	<b>68.42%</b>	<b>3</b>	<b>15.79%</b>	<b>0</b>	<b>0.00%</b>	<b>19</b>

These figures evidence that the Division is continuing to make progress in improving the conditions of the City's bridges. The number of bridges rated *Poor* and *Fair* has decreased over the past few years while the number of bridges rated *Good* and *Very Good* has increased. However, it continues to remain essential that the overall bridge program include an expansion of the Preventive Maintenance and Corrective Repair programs which have traditionally slowed the deterioration of *good* and *very good* bridges.

During 2001, the total number of closed or partially closed bridge structures was two, with one closed and one partially-closed structure (see Appendix C-2).

**Bridges with Posted Weight Restrictions**  
**NEW YORK CITY DEPARTMENT OF TRANSPORTATION**

BIN	BOROUGH	LOCATION FEATURE-1	LOCATION FEATURE-2	LOCATION FEATURE-3	FISCAL YEAR*	POSTED TONS	REMARKS
2-23145-0	BROOKLYN	BELT SHORE PKWY.	GERRITSEN INLET		2004	5	CONDITION OF PAERDEGAT BASIN BRIDGE
2-23147-9	BROOKLYN	BELT SHORE PKWY.	MILL BASIN CREEK		2004	5	CONDITION OF PAERDEGAT BASIN BRIDGE
2-23148-9	BROOKLYN	BELT SHORE PKWY	PAERDEGAT BASIN		2005	5	
2-23149-9	BROOKLYN	BELT SHORE PKWY.	ROCKAWAY PKWY.		2005	5	PASSENGER CARS ONLY
2-23206-0	MANHATTAN	FDR DRIVE (NB & SB)	23 <sup>RD</sup> TO 63 <sup>RD</sup> STREET			4	PASSENGER CARS ONLY
2-23304-0	MANHATTAN	EAST 60 <sup>TH</sup> STREET	FDR DRIVE			7	TO BE LET BY NYSDOT
2-24001-9	BROOKLYN & MANHATTAN	BROOKLYN BRIDGE	EAST RIVER	INCLUDING RAMPS	2004	3	NO COMMERCIAL TRAFFIC NO TRUCKS, NO BUSES
2-24003-9	BROOKLYN & MANHATTAN	WILLIAMSBURG BRIDGE	EAST RIVER		2005		INNER ROADWAYS, NO TRUCKS
2-24004-7	MANHATTAN & QUEENS	QUEENSBORO BRIDGE	EAST RIVER		2003	3	LOWER OUTER ROADWAYS POSTED AS H-3; UPPER ROADWAYS DESIGNED FOR H-15, NO TRUCKS
2-24026-0	BROOKLYN	CARROL STREET BRIDGE	GOWANUS CANAL	CARROL STREET		25	
2-24064-0	MANHATTAN & QUEENS	ROOSEVELT ISLAND	EAST CHANNEL OF THE EAST RIVER			36	
2-24066-0	BRONX	RIKERS ISLAND BRIDGE	RIKERS ISLAND CHANNEL			36	
2-24331-0	BROOKLYN	2 <sup>ND</sup> AVENUE BRIDGE	LIRR BAY RIDGE LINE		2003	12	
2-24339-0	BROOKLYN	52 <sup>ND</sup> AVENUE BRIDGE	LIRR BAY RIDGE LINE		2003	16	
2-24386-0	BROOKLYN	GLENMORE AVENUE	LIRR BAY RIDGE		2003	10	
2-24655-0	MANHATTAN	PARK AVENUE VIADUCT	42 <sup>ND</sup> STREET			15	NO COMMERCIAL TRAFFIC
2-24753-0	QUEENS	ANDREWS AVENUE	LIRR MONTAUK DIV		2003	10	
2-24759-0	QUEENS	FOREST PARK DRIVE	LIRR		2002	18	AFTER CONSTRUCTION
R-00056	STATEN ISLAND	RICHMOND TERRACE	WESTERN AVENUE			4	WEST RAMP CLOSED

19 COUNT

\* - CONSTRUCTION CONTRACT LETTING

## Partially Closed Bridges

### NEW YORK CITY DEPARTMENT OF TRANSPORTATION

BIN	BOROUGH	LOCATION FEATURE-1	LOCATION FEATURE-2	LOCATION FEATURE-3	FISCAL YEAR*	REMARKS
2-23087-0	BROOKLYN	COLUMBIA HEIGHTS	B.Q.E.	MIDDAGH ST.	2001	CLOSED TO TRAFFIC OPEN TO PEDESTRIANS (TO BE DONE BY NYS W/B.Q.E)

1 COUNT

\* - CONSTRUCTION CONTRACT LETTING

## Closed Bridges

### NEW YORK CITY DEPARTMENT OF TRANSPORTATION

BIN	BOROUGH	LOCATION FEATURE-1	LOCATION FEATURE-2	LOCATION FEATURE-3	FISCAL YEAR*	REMARKS
2-24540-0	MANHATTAN	PEDESTRIAN BRIDGE WEST OF 8 <sup>TH</sup> AVE.	W 155 <sup>TH</sup> STREET		2005	PED BRIDGE (FOOTBRIDGE)

1 COUNT

\* - CONSTRUCTION CONTRACT LETTING

## Bridge Identification Numbers

In 1972, the State of New York developed a computerized system to store inventory and inspection data on bridges that are greater than 20 feet in length. In New York City, structures that are 20 feet in length or less, “mini-bridges,” are tracked independently by the City. Each structure is distinguished by a separate Bridge Identification Number (B.I.N.).

A six-digit B.I.N. identifies a single structure or group of connected or associated structures, while the seven-digit B.I.N. identifies each of those connected or associated bridge structures individually. Each level of a bi-level bridge, each separate bridge structure in a parallel configuration, and each ramp attached to a main bridge is considered an individual structure and assigned its own unique B.I.N. for example, the Brooklyn Bridge has one six-digit B.I.N., 2-24002, which incorporates the entire bridge. All ramps and secondary structures, as well as the main structure, are identified by their own seven-digit numbers, such as 2-24001-A, 2-24001-B, etc.

### **If the prefix (first number) of the B.I.N. is:**

**1**, the bridge is considered part of the **State** bridge system. This number might include City bridges if maintenance is shared between City and State.

**2**, the bridge is considered part of the **City** bridge system. This number might include State bridges if maintenance is shared between City and State.

**M, Q, or R**, the bridge is a “mini-bridge,” and is considered part of the **City** bridge system. They are located in Manhattan, Queens, or Staten Island, respectively.

### **If the suffix (last character) of the B.I.N. is:**

**1 through 6**, the bridge is in parallel configuration. The left-most bridge in the Direction of Orientation has a last character of 1. The next left-most bridge has a last character of 2, and so on.

**7 or 8**, the bridge is in a bi-level configuration. Seven indicates the lower level and eight indicates the upper level.

**0 or 9**, the bridge is not in parallel or bi-level configuration.

**A letter of the alphabet**, the structure is a ramp physically attached to the main bridge. If more than one ramp is attached to the same span of the main bridge, the characters are assigned alphabetically starting with the left-most ramp in the Direction of Orientation. Other ramps attached to the bridge are assigned alphabetical characters in a clockwise direction.

### New York State Biennial Bridge Inspection and Condition Rating System

During the regularly scheduled State biennial bridge inspections, each bridge element is investigated and its structural condition is numerically rated according to the system indicated below:

<u>Numerical Rating</u>	<u>Description</u>
1	Potentially Hazardous
2	Used to shade between a rating of 1 and 3
3	Serious deterioration, or not functioning as originally designed
4	Used to shade between a rating of 3 and 5
5	Minor deterioration, and is functioning as originally designed
6	Used to shade between a rating of 5 and 7
7	New condition
8	Not Applicable
9	Unknown (due to inaccessibility, e.g. footings or piles)

Based on these individual ratings for each element, a weighted average rating is computed for the entire structure.

These ratings (both individual and weighted average) are recorded on New York State Department of Transportation Inspection report Forms. Together with photographs and explanatory descriptions, the ratings provide the Division with information on the existing condition of each bridge.

A description of the condition ratings 1 through 7, with programmed responses to certain critical ratings, demonstrates the importance of these inspections:

A rating of 1 describes an extremely serious condition which is deemed potentially hazardous. This rating, which is phoned in by the inspection leader, necessitates that the Division respond immediately by 1) closing the structure either completely or partially until emergency repairs are made, or 2) limiting the vehicle weight permitted on the structure and then performing repairs on a timely basis.

A rating of 3 describes a bridge element that is not functioning as designed. Although not considered hazardous, such members require extensive rehabilitation. A determination is then made to repair such rated members either by the Division's in-house repair personnel, the critical maintenance contractor (When and Where contracts), or a major capital contract. Until such repairs are made, this condition is periodically monitored.

A rating of 5 indicates the member is functioning as designed but exhibits minor deterioration. These members are prioritized and scheduled for repair by the Bridge Maintenance, Inspection and Operations Bureau.

A rating of 7 indicates a new condition requiring no remediation.

The ratings of 2, 4, and 6 are utilized to shade between each of the above ratings.

## Standard Abbreviations

### General Abbreviations :

APP:	Approach
AVE:	Avenue
BLVD:	Boulevard
BR:	Bridge
CPK:	Central Park
DR:	Drive
EB:	Eastbound
EXPWY:	Expressway
I:	Interstate
LN:	Lane
NB:	Northbound
PED BR:	Pedestrian Bridge
PKWY:	Parkway
PL:	Place
RD:	Road
SB:	Southbound
ST:	Street
TPKE:	Turnpike
WB:	Westbound
X:	No State accepted mileage markers exist on this route

### Routes :

<u>No.</u>	<u>Borough</u>	<u>Name</u>
25	Queens	Union Turnpike
25A	Queens	Northern Boulevard
27	Brooklyn	Southern Parkway
I-87	Manhattan, Bronx	Major Deegan Expressway
I-95	Manhattan, Bronx	Cross Bronx Expressway
I-278	Brooklyn, Queens	Brooklyn-Queens Expressway
I-278	Bronx	Bruckner Expressway
I-278	Staten Island	Staten Island Expressway
I-295	Queens	Clearview Expressway
I-295	Bronx	Throgs Neck Expressway
I-440	Staten Island	Richmond Parkway
I-478	Brooklyn	Brooklyn Battery Tunnel
I-495	Queens	Long Island Expressway
I-678	Queens	Whitestone Expressway, Van Wyck
I-878	Queens	Nassau Expressway
I-895	Bronx	Sheridan Expressway

## Standard Abbreviations

### Highways :

BCIP:	Belt System -- Cross Island
BE:	Bruckner Expressway
BLP:	Belt System -- Laurelton Parkway
BPP:	Bronx Pelham Parkway
BQE:	Brooklyn-Queens Expressway
BRPC:	Bronx River Parkway (in NYC)
BSHP:	Belt System -- Shore Parkway
BSOP:	Belt System -- Southern Parkway
CBE:	Cross Bronx Expressway
FDRD:	Franklin D. Roosevelt Drive
GCP:	Grand Central Parkway
GW:	George Washington Bridge
HHP:	Henry Hudson Parkway
HRD:	Harlem River Drive
HRPC:	Hutchinson River Parkway (in NYC)
IP:	Jackie Robinson (Interborough) Parkway
LIE:	Long Island Expressway
MAP:	Marine Parkway
MDE:	Major Deegan Expressway
MP:	Mosholu Parkway
OCP:	Ocean Parkway
PR:	Prospect Expressway
RP:	Richmond Parkway
VWE:	Van Wyck Expressway
WLMBRG:	Williamsburg Bridge
WSE:	West Shore Expressway



<b>2001 Bridge Inventory Adjustments</b>
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B.I.N.	BORO	FEATURE CARRIED	FEATURE CROSSED	EXPLANATION
<b>- Bridges removed from the City's Inventory:</b>				
2241850	B	WOODLAWN ROAD	METRO NORTH RR HAR	TRANSFERRED TO NYPD
2249020	R	HOPE AVENUE	B&O RR (ABANDONED)	DEMOLISHED (ON GRADE)
2232060	M	FDR DRIVE VIADUCT	AVENUE C TO E. 25 <sup>TH</sup> STREET	TRANSFERRED TO NYSDOT
2266630	M	E. 48 <sup>TH</sup> STREET RAMP	FDR DRIVE S.B.	TRANSFERRED TO NYSDOT
2231549	Q	BSHP	84 <sup>TH</sup> STREET	TRANSFERRED TO NYSDOT
2244422	K	WILLIAMSBURG BRIDGE SOUTH APPROACH	DRIGGS AVENUE	DEMOLISHED (INCORPORATED INTO WILLIAMSBURG APPROACH)
2241240	B	E. 172 STREET-BX RVR AVE	AMTRAK	DEMOLISHED

REV. DATE February 5, 2002

**INVENTORY SORTED BY B.I.N.**

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
1065210	Q	WHITESTONE EXP NB	BCIP (2065210)		A	1	STATE	05/01/00	4.682	FAIR	2500	\$3,600,000.00	7
1066510	B	BRUCKNER EXP.(2066510)	WESTCHESTER CREEK		WM	17	STATE	07/27/01	3.835	FAIR	39400	\$56,736,000.00	9
1067150	B	NEREID AVE (2241880)	BRONX RIVER PKWY	M	O	10	STATE	11/20/01	4.21	FAIR	57750	\$83,160,000.00	12
1240090	BM	MACOMBS DAM BRIDGE	HARLEM RIVER		WM	52	STATE	10/12/01	2.722	POOR	139100	\$200,304,000.00	10
1247010	Q	91 PLACE (2247010)	LIRR PT WASH BRANCH	L	O	3	STATE	06/30/00	3.318	FAIR	4200	\$6,048,000.00	4
1247200	Q	67 AVE PED BR 2247200	LIRR MAIN LINE	L	O-PED	3	CITY	11/19/01	4.479	FAIR	1300	\$1,872,000.00	6
1247280	Q	51 AVE PED BR.2247280	LIRR MAIN LINE	L	O-PED	5	CITY	11/20/01	3.355	FAIR	700	\$1,008,000.00	2
1247560	Q	METROPOLITAN AVE	LIRR MONTAUK DIV	L	O	2	STATE	07/31/01	3.888	FAIR	20900	\$30,096,000.00	5
2055801	Q	NORTHERN BLVD W.B.	FLUSHING RIVER		W	40	STATE	07/28/00	4.746	FAIR	71900	\$103,536,000.00	7
2055802	Q	NORTHERN BLVD E.B.	FLUSHING RIVER		W	40	STATE	08/29/00	4.38	FAIR	78894	\$113,607,360.00	7
205580A	Q	N.BLVD WB TO 678I SB	VACANT LAND		AR	16	STATE	09/14/00	5.09	GOOD	8600	\$12,384,000.00	7
2065629	B	BRONX RVR PKWY	BOSTON RD BX ZOO		A	1	STATE	09/20/01	5.275	GOOD	6300	\$9,072,000.00	27
2066002	Q	495I (2066000)	WOODHAVEN BLVD		A	2	STATE	05/15/01	4.319	FAIR	25200	\$36,288,000.00	6
2066100	K	5TH AVE	27 X PROSPECT EXPWY		A	1	STATE	01/27/00	5.25	GOOD	8800	\$12,672,000.00	7
2066671	B	BRUCKNER EXPWY SB	BRONX RIVER		WM	3	STATE	07/20/01	5.527	GOOD	12400	\$17,856,000.00	2
2066672	B	BRUCKNER EXPWY NB	BRONX RIVER		WM	8	STATE	07/30/01	4.761	FAIR	22300	\$32,112,000.00	2
2066720	B	E 174TH ST	SHERIDAN EXPWY/AMTRAK	A	A	13	STATE	06/15/00	4.486	FAIR	47430	\$68,299,200.00	9
206672A	B	174TH ST-NTH PED BRDG	895I - SHERIDAN EXPWY		A-PED	4	CITY	12/12/00	4.958	FAIR	1800	\$2,592,000.00	9
206672B	B	174TH ST-STH PED BRDG	895I - SHERIDAN EXPWY		A-PED	4	CITY	12/12/00	4.0903	FAIR	1900	\$2,736,000.00	9
2066919	BM	WASHINGTON BRIDGE	HARLEM RIVER		W	9	STATE	10/27/00	4.88	FAIR	128339	\$184,808,160.00	12
2075351	B	BRUCKNER EXPWY SB	AMTRAK	A	A	1	STATE	07/14/00	3.718	FAIR	11600	\$16,704,000.00	2
2075352	B	BRUCKNER EXPWY NB	AMTRAK	A	A	1	STATE	07/12/00	3.484	FAIR	10900	\$15,696,000.00	2
2075820	B	E TREMONT AVE	HUTCHINSON RVR PKWY		A	2	STATE	08/14/01	4.152	FAIR	10200	\$14,688,000.00	10
2075837	B	WESTCHESTER AVE	HUTCHINSON RVR PKWY		A	2	STATE	05/21/01	4.388	FAIR	15858	\$22,835,520.00	10
2075849	B	BRONX PELHAM PKWY	HUTCHINSON RVR PKWY		A	2	STATE	06/30/00	4.184	FAIR	17600	\$25,344,000.00	10
2075859	B	HUTCHINSON RVR PKWY	HUTCHINSON RIVER		WM	7	STATE	10/13/00	5.375	GOOD	60500	\$87,120,000.00	10
2076109	B	BE NB SERVICE RD	HUTCHINSON RVR PKWY		A	2	STATE	10/09/01	4.736	FAIR	7800	\$11,232,000.00	10
2076129	B	BE SB SERVICE RD	HUTCHINSON RVR PKWY		A	2	STATE	02/09/00	5	GOOD	7100	\$10,224,000.00	10
2076640	B	DEPOT PLACE	CONRAIL HUDSON DIV	C	O	11	STATE	10/31/01	5.611	GOOD	30192	\$43,476,480.00	4
2076929	B	BRUCKNER EXPWY	AMTRAK	A	A	1	STATE	07/02/01	4.9	FAIR	3800	\$5,472,000.00	2
2229289	M	HHP VIADUCT	W 72 ST TO W 79 ST	A	A	145	STATE	10/25/00	3.388	FAIR	236100	\$339,984,000.00	7
2229290	M	W 79 ST	AMTRAK	A	A	1	STATE	10/17/00	4.559	FAIR	4500	\$6,480,000.00	7
2229309	M	HHP	RIVERSIDE PARK		A	1	STATE	02/11/00	5.1	GOOD	2400	\$3,456,000.00	7
2229311	M	HHP SB	RAMP TO 96 ST		A	1	STATE	02/16/00	4.181	FAIR	2000	\$2,880,000.00	7
2229312	M	HHP NB	RAMP TO 96 ST		A	1	STATE	02/16/00	4.272	FAIR	2000	\$2,880,000.00	7
2229321	M	HHP SB	RAMP TO 96 ST		A	1	STATE	07/13/00	5.2	GOOD	2000	\$2,880,000.00	7
2229322	M	HHP NB	RAMP TO 96 ST		A	1	STATE	07/13/00	5.433	GOOD	2000	\$2,880,000.00	7
2229339	M	HHP	ST CLAIR PLACE		A	64	STATE	03/21/00	3.887	FAIR	370000	\$532,800,000.00	9
222933A	M	RAMP FROM S.B. HHP	W 135 ST		AR	9	STATE	07/21/00	4.802	FAIR	12900	\$18,576,000.00	9
222933B	M	RAMP TO N.B. HHP	W 135 ST		AR	14	STATE	01/20/00	4.422	FAIR	14400	\$20,736,000.00	9
2229349	M	HHP	W 158 ST	A	A	44	STATE	11/08/00	4	FAIR	140000	\$201,600,000.00	12
222934A	M	RAMP TO N.B. HHP	AMTRAK WEST SIDE	A	AR	26	STATE	11/07/00	3.722	FAIR	10800	\$15,552,000.00	12
2229400	M	W 181ST ST PED BRDG	HHP N.B.		A-PED	6	CITY	10/24/00	3.429	FAIR	1500	\$2,160,000.00	12
2229440	B	HHP	KAPPOCK ST		A	1	STATE	09/21/01	4.655	FAIR	3900	\$5,616,000.00	8
2229450	B	232ND ST	HHP		A	2	STATE	10/12/01	4.342	FAIR	4900	\$7,056,000.00	8
2229460	B	236TH ST PED BRDG	HHP		A-PED	3	CITY	11/13/01	4.672	FAIR	2500	\$3,600,000.00	8
2229470	B	239TH ST	HHP		A	2	STATE	08/02/01	4.71	FAIR	6100	\$8,784,000.00	8
2229480	B	MANHATTAN COLL PKWY	HHP		A	3	STATE	06/26/01	4.184	FAIR	6200	\$8,928,000.00	8
2229490	B	246TH ST	HHP		A	2	STATE	06/26/01	4.552	FAIR	5600	\$8,064,000.00	8
2229500	B	252ND ST	HHP		A	2	STATE	01/14/00	4.342	FAIR	4500	\$6,480,000.00	8
2229510	B	RIVERDALE AVE	HHP		A	2	STATE	10/09/01	4.052	FAIR	5200	\$7,488,000.00	8
2229520	B	FIELDSTON ROAD	HHP		A	1	STATE	10/10/01	4.793	FAIR	6600	\$9,504,000.00	8
2229530	B	HHP	BROADWAY		A	1	STATE	10/11/01	4.595	FAIR	7500	\$10,800,000.00	8
2229540	B	VAN CRTLDT PARK	HHP		A-PED	2	CITY	10/09/01	4.565	FAIR	3900	\$5,616,000.00	26
2229550	B	VAN CRTLDT EQUES	HHP		A-PED	2	CITY	10/09/01	4.825	FAIR	2100	\$3,024,000.00	26
2229560	B	BRONX PELHAM PKWY	AMTRAK,METRO NORTH	MA	A	3	STATE	07/06/00	4.861	FAIR	24591	\$35,411,040.00	11
2229579	B	BOSTON POST ROAD	HUTCHINSON RIVER		W	14	STATE	07/13/01	4.611	FAIR	95700	\$137,808,000.00	12
2230000	K	HIGHLAND BLVD E.B.	JACKIE ROBINSON PKWY		A	1	STATE	02/09/00	4.933	FAIR	4900	\$7,056,000.00	5
2230010	K	HIGHLAND BLVD W.B.	JACKIE ROBINSON PKWY		A	1	STATE	02/09/00	5.266	GOOD	3500	\$5,040,000.00	5
2230020	K	HIGHLAND BLVD W.B.	JACKIE ROBINSON PKWY		A	2	STATE	02/09/00	4.947	FAIR	4700	\$6,768,000.00	5
2230040	Q	CYPRESS HILLS ST	JACKIE ROBINSON PKWY		A	1	STATE	09/06/00	5.888	GOOD	5000	\$7,200,000.00	5
2230050	Q	CYP HILLS CEM WEST	JACKIE ROBINSON PKWY		A	3	STATE	04/24/01	4	FAIR	4400	\$6,336,000.00	5
2230070	Q	CYP HILLS CEM EAST	JACKIE ROBINSON PKWY		A	3	STATE	02/29/00	4.113	FAIR	4400	\$6,336,000.00	5
2230099	Q	JACKIE ROBINSON PKWY	CYPRESS HILLS CEMETRY		A	1	STATE	01/05/00	5.482	GOOD	4200	\$6,048,000.00	5
2230120	Q	MYRTLE AVE	JACKIE ROBINSON PKWY		A	1	STATE	03/01/00	5	GOOD	6400	\$9,216,000.00	82
2230179	Q	JACKIE ROBINSON PKWY	METROPOLITAN AVE		A	2	STATE	01/13/00	5.035	GOOD	8673	\$12,489,120.00	82
2230180	Q	UNION TPKE	JACKIE ROBINSON PKWY		A	1	STATE	02/16/00	5.812	GOOD	5359	\$7,716,960.00	82
2230190	Q	MARKWOOD ROAD	JACKIE ROBINSON PKWY		A	1	STATE	02/23/00	5.333	GOOD	4400	\$6,336,000.00	82
2230209	Q	QUEENS BLVD	JACKIE ROBINSON PKWY	T	A	5	STATE	05/19/00	4.698	FAIR	90000	\$129,600,000.00	9
2230220	K	HIGHLAND BLVD NB	VERMONT AVE		A	1	STATE	05/08/01	6.328	VGOOD	3995	\$5,752,800.00	5
2230250	B	MOSHOLU PARKWAY	BRONX RIVER		A	5	STATE	01/04/00	4.263	FAIR	16300	\$23,472,000.00	27
2230260	B	MOSHOLU PARKWAY	METRO NORTH	M	A	1	STATE	03/17/00	6.484	VGOOD	8880	\$12,787,200.00	27
2230270	B	MOSHOLU PARKWAY	WEBSTER AVE		A	1	STATE	04/12/01	6.015	VGOOD	8480	\$12,211,200.00	27
2230287	B	JEROME AVE	MOSHOLU PARKWAY	T	A	3	STATE	06/25/01	5.052	GOOD	11800	\$16,992,000.00	7
2230290	B	MOSHOLU PARKWAY	EQUESTRIAN PATH		A	1	STATE	01/20/00	4.724	FAIR	4300	\$6,192,000.00	26
2230300	B	MOSHOLU PARKWAY	CONRAIL (ABANDONED)	C	A	1	STATE	09/18/00	4.229	FAIR	5200	\$7,488,000.00	26
2230310	B	MOSHOLU PARKWAY	SB RAMP TO HHP		A	2	STATE	10/30/01	5.243	GOOD	7400	\$10,656,000.00	26
2230350	K	SUMMIT ST PED BRDG	278I (B.Q.E.)		A-PED	2	STATE	10/03/00	4.714	FAIR	1400	\$2,016,000.00	6
2230360	K	UNION ST	278I (B.Q.E.)		A	2	STATE	03/10/00	4.486	FAIR	5000	\$7,200,000.00	6
2230370	K	SACKETT ST	278I (B.Q.E.)		A	2	STATE	03/10/00	4.625	FAIR	5000	\$7,200,000.00	6
2230380	K	KANE ST	278I (B.Q.E.)		A	2	STATE	03/06/00	4.458	FAIR	5000	\$7,200,000.00	6
2230390	K	CONGRESS ST	278I (B.Q.E.)		A	2	STATE	11/13/00	4.426	FAIR	5000	\$7,200,000.00	6
2230400	K	278I (B.Q.E.)	ATLANTIC AVE		A	1	STATE	10/04/00	5.88	GOOD	14230	\$20,491,200.00	6
2230410	K	278I (B.Q.E.)	WASHINGTON ST		A	1	STATE	10/12/00	4.656	FAIR	2500	\$3,600,000.00	2
2230420	K	278I (B.Q.E.)	WASHINGTON ST		A	1	STATE	10/12/00	4.906	FAIR	2500	\$3,600,000.00	2
2230430	K	278I (B.Q.E.)	PROSPECT ST		A	1	STATE	01/06/00	5.266	GOOD	1100	\$1,584,000.00	2
2230440	K	278I (B.Q.E.)	ADAMS ST N.B.		A	1	STATE	01/05/00	5.2	GOOD	2700	\$3,888,000.00	2
2230450	K	278I (B.Q.E.)	ADAMS ST S.B.		A	1	STATE	01/05/00	4.933	FAIR	2500	\$3,600,000.00	2

## INVENTORY SORTED BY B.I.N.

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2230460	K	278I (B.Q.E.)	PEARL ST		A	1	STATE	01/04/00	5.333	GOOD	4500	\$6,480,000.00	2
2230470	K	278I (B.Q.E.)	JAY ST		A	1	STATE	01/04/00	5.233	GOOD	5100	\$7,344,000.00	2
2230480	K	278I (B.Q.E.)	PROSPECT ST		A	1	STATE	01/06/00	5.351	GOOD	8400	\$12,096,000.00	2
2230490	K	278I (B.Q.E.)	SANDS ST		A	1	STATE	01/06/00	5.277	GOOD	12600	\$18,144,000.00	2
2230500	K	278I (B.Q.E.)	RAMP TO BQE EB		A	1	STATE	01/06/00	5.566	GOOD	1300	\$1,872,000.00	2
2230510	K	278I (B.Q.E.)	NASSAU ST		A	6	STATE	01/13/00	4.444	FAIR	51200	\$73,728,000.00	2
2230520	Q	65TH PLACE	278I (B.Q.E.)		A	2	STATE	01/11/00	4.75	FAIR	11600	\$16,704,000.00	2
2230530	Q	QUEENS BLVD	278I (B.Q.E.)		A	2	STATE	06/27/00	4.138	FAIR	23500	\$33,840,000.00	2
2230540	Q	WOODSIDE AVE	278I (B.Q.E.)		A	1	STATE	01/03/00	5.14	GOOD	7500	\$10,800,000.00	2
2230550	Q	69TH ST	278I (B.Q.E.)		A	2	STATE	03/02/00	5.017	GOOD	12600	\$18,144,000.00	2
2230560	Q	70TH ST	278I (B.Q.E.)		A	2	STATE	03/03/00	5.055	GOOD	8500	\$12,240,000.00	2
2230570	Q	41ST AVE	278I (B.Q.E.)		A	3	STATE	03/03/00	4.93	FAIR	8800	\$12,672,000.00	2
2230587	Q	ROOSEVELT AVE	278I (B.Q.E.)		A	2	STATE	01/19/00	4.529	FAIR	6600	\$9,504,000.00	2
2230590	Q	BROADWAY	278I (B.Q.E.)		WO	2	STATE	04/20/00	3.894	FAIR	16000	\$23,040,000.00	2
2230600	Q	STEINWAY ST	278I W.B. (B.Q.E.)		A	1	STATE	01/13/00	4.333	FAIR	4200	\$6,048,000.00	1
2230610	Q	STEINWAY ST	278I E.B. (B.Q.E.)		A	1	STATE	01/12/00	4.027	FAIR	4200	\$6,048,000.00	1
2230620	Q	37TH ST	278I (B.Q.E.)		A	2	STATE	03/10/00	4.486	FAIR	5300	\$7,632,000.00	1
2230630	Q	35TH ST	278I (B.Q.E.)		A	4	STATE	06/21/00	4.875	FAIR	9000	\$12,960,000.00	1
2230640	Q	32ND ST	278I (B.Q.E.)		A	2	STATE	05/04/01	4.93	FAIR	8100	\$11,664,000.00	1
2230657	Q	31ST ST	278I (B.Q.E.)		A	2	STATE	06/02/00	5.083	GOOD	9500	\$13,680,000.00	1
2230669	Q	278I (B.Q.E.)	35TH AVE		A	1	STATE	04/26/01	3.718	FAIR	6500	\$9,360,000.00	2
2230679	Q	278I (B.Q.E.)	34TH AVE		A	3	STATE	03/30/00	4.166	FAIR	9500	\$13,680,000.00	2
2230680	Q	278I (B.Q.E.)	NORTHERN BLVD		A	1	STATE	03/28/00	4.377	FAIR	5900	\$8,496,000.00	2
2230690	Q	BQE EAST LEG NB	32ND AVE		A	1	STATE	04/25/01	4.312	FAIR	6160	\$8,870,400.00	1
2230700	Q	BQE EAST LEG	TO BQE WEST LEG		A	14	STATE	03/20/00	3.486	FAIR	16800	\$24,192,000.00	1
2230710	Q	278I S.B. (B.Q.E.)	32ND AVE		A	1	STATE	08/31/00	4.39	FAIR	4500	\$6,480,000.00	1
2230720	Q	BQE EAST LEG	BQE NB WEST LEG		A	1	STATE	03/22/00	4.328	FAIR	2700	\$3,888,000.00	1
2230730	Q	31ST AVE	278I (B.Q.E.)		A	1	STATE	05/24/01	3.546	FAIR	3700	\$5,232,000.00	1
2230740	Q	BQE WEST LEG SB	31ST AVE		A	1	STATE	06/26/00	4.531	FAIR	3700	\$5,328,000.00	1
2230750	Q	BQE EAST LEG SB	31ST AVE		A	1	STATE	07/03/00	4.156	FAIR	2900	\$4,176,000.00	1
2230760	Q	BQE WEST LEG NB	31ST AVE		A	1	STATE	07/25/01	4.109	FAIR	2900	\$4,176,000.00	1
2230770	Q	BQE WEST LEG	30TH AVE		A	1	STATE	06/18/01	4.468	FAIR	6500	\$9,360,000.00	1
2230780	Q	BQE EAST LEG	30TH AVE		A	3	STATE	03/08/00	4.097	FAIR	9400	\$13,536,000.00	3
2230790	Q	BULOVA AVE	BQE WEST LEG		A	2	STATE	03/03/00	5.761	GOOD	3300	\$4,752,000.00	1
2230800	Q	49TH ST	BQE WEST LEG		A	2	STATE	03/10/00	5.388	GOOD	4900	\$7,056,000.00	1
2230810	Q	ASTORIA BLVD E.B.	BQE WEST LEG		A	4	STATE	03/29/00	4.308	FAIR	8200	\$11,808,000.00	1
2230820	Q	47TH ST	GCP		A	2	STATE	03/22/00	4.541	FAIR	5700	\$8,208,000.00	1
2230830	Q	BQE WEST LEG	GCP		A	2	STATE	06/09/00	4.916	FAIR	7600	\$10,944,000.00	1
2230840	Q	44TH ST	GCP		A	2	STATE	03/14/00	4.791	FAIR	5000	\$7,200,000.00	1
2230857	K	278I (B.Q.E.)	JORALEMON ST		A	1	STATE	09/07/00	5.03	GOOD	2100	\$3,024,000.00	2
2230858	K	278I (B.Q.E.)	JORALEMON ST / BQE WB		A	2	STATE	09/08/00	3.758	FAIR	5900	\$8,496,000.00	2
2230869	Q	QUEENS BLVD	ACCESS RD BQE S.B.		A	1	STATE	04/10/00	4.09	FAIR	7900	\$11,376,000.00	2
2230870	K	COLUMBIA HEIGHTS	278I (B.Q.E.)		A	1	STATE	11/27/00	4.583	FAIR	16500	\$23,760,000.00	2
2230887	K	278I W.B. (B.Q.E.)	CADMAN PLAZA		A	2	STATE	10/18/00	4.338	FAIR	4500	\$6,480,000.00	2
2230888	K	278I E.B. (B.Q.E.)	CADMAN PLAZA / 278I WB		A	2	STATE	11/13/00	4.842	FAIR	4500	\$6,480,000.00	2
2230890	Q	49TH ST	GCP		A	2	STATE	06/01/00	4.777	FAIR	5500	\$7,920,000.00	1
2231249	K	BSHP	BAY RIDGE AVE		A	1	STATE	11/27/00	3.566	FAIR	4900	\$7,056,000.00	10
2231250	K	81ST ST PED BR	BSHP		A-PED	5	CITY	11/07/00	5.222	GOOD	3100	\$4,464,000.00	10
2231260	K	92ND ST PED BR	BSHP		A-PED	6	CITY	05/09/00	4.161	FAIR	3000	\$4,320,000.00	10
2231270	K	4TH AVE	BSHP		A	2	STATE	01/24/00	4.71	FAIR	6100	\$8,784,000.00	10
2231290	K	BAY 8TH ST	BSHP		A	1	STATE	05/09/01	6.206	VGOOD	4920	\$7,084,800.00	11
2231300	K	17TH AVE PED BRDG	BSHP		A-PED	1	CITY	12/15/00	3.846	FAIR	2100	\$3,024,000.00	11
2231319	K	BSHP	BAY PKWY		A	1	STATE	10/25/00	4.345	FAIR	7200	\$10,368,000.00	11
2231329	K	BSHP	26TH AVE		A	1	STATE	10/25/00	4.466	FAIR	6700	\$9,648,000.00	13
2231330	K	27TH AVE PED BRDG	BSHP		A-PED	1	CITY	06/07/00	4.366	FAIR	2100	\$3,024,000.00	13
2231340	K	CROPSY AVE	BSHP		A	2	STATE	10/24/00	4.944	FAIR	13100	\$18,864,000.00	13
2231360	K	BSHP	OCEAN PKWY		A	2	STATE	05/30/01	3.361	FAIR	11800	\$16,992,000.00	13
2231370	K	B 8TH ST ACCESS RMP	BSHP		A	4	STATE	05/31/00	4.097	FAIR	12800	\$18,432,000.00	13
2231380	K	CONEY ISLAND AVE	BSHP		A	4	STATE	02/17/00	3.555	FAIR	20600	\$29,664,000.00	13
2231390	K	E 12TH ST	BSHP		A	4	STATE	02/15/00	5.013	GOOD	17200	\$24,768,000.00	15
2231409	K	BSHP	SHEEPSHEAD BAY ROAD		A	1	STATE	01/19/00	4.967	FAIR	6500	\$9,360,000.00	15
2231419	K	BSHP	OCEAN AVE		A	3	STATE	01/19/00	4.43	FAIR	14000	\$20,160,000.00	15
2231429	K	BSHP	BEDFORD AVE		A	3	STATE	08/04/00	4.388	FAIR	12000	\$17,280,000.00	15
2231439	K	BSHP	NOSTRAND AVE		A	3	STATE	08/04/00	4.041	FAIR	13000	\$18,720,000.00	15
2231449	K	KNAPP ST	BSHP		A	1	STATE	01/21/00	4.796	FAIR	9500	\$13,680,000.00	15
2231450	K	BSHP	GERRITSEN INLET		WA	11	STATE	08/03/01	3.582	FAIR	46400	\$66,816,000.00	56
2231460	K	FLATBUSH AVE	BSHP		A	2	STATE	07/28/00	3.694	FAIR	13600	\$19,584,000.00	56
2231479	K	BSHP	MILL BASIN		WM	14	STATE	07/23/01	3.313	FAIR	73500	\$105,840,000.00	18
2231489	K	BSHP	PAERDEGAT BASIN		WA	15	STATE	07/20/01	3.24	FAIR	58300	\$83,952,000.00	18
2231499	K	BSHP	ROCKAWAY PKWY		A	4	STATE	05/31/01	3.833	FAIR	11500	\$16,560,000.00	56
2231509	K	BSHP	FRESH CREEK		WA	5	STATE	07/17/01	3.166	FAIR	23000	\$33,120,000.00	56
2231519	K	PENNSYLVANIA AVE	BSHP		A	2	STATE	05/18/01	6.277	VGOOD	6191	\$8,915,040.00	56
2231559	Q	CROSS BAY BLVD	BSHP		A	4	STATE	03/14/00	5.25	GOOD	23205	\$33,415,200.00	10
2231560	Q	S CONDUIT BLVD	BSOP		A	2	STATE	03/15/00	5.633	GOOD	15776	\$22,717,440.00	10
2231570	Q	COHANCY ST	BSOP		A	2	STATE	03/15/00	4.727	FAIR	6400	\$9,216,000.00	10
2231580	Q	AQUEDUCT RCTK RAMP	BSOP		A	4	STATE	08/28/00	4.375	FAIR	14000	\$20,160,000.00	10
2231590	Q	130TH ST	BSOP		A	2	STATE	01/14/00	4.818	FAIR	6800	\$9,792,000.00	10
2231610	Q	GUY R. BREWER BLVD	BSOP		A	2	STATE	05/22/01	4.113	FAIR	7300	\$10,512,000.00	13
2231620	Q	FARMERS BLVD	BSOP		A	2	STATE	06/07/01	4.568	FAIR	6400	\$9,216,000.00	13
2231630	Q	SPRINGFIELD BLVD	BSOP		A	2	STATE	03/15/00	4.636	FAIR	8500	\$12,240,000.00	13
2231640	Q	225TH ST	BSOP		A	2	STATE	04/26/00	4.545	FAIR	7000	\$10,080,000.00	13
2231650	Q	SUNRISE HWY W.B.	BLP E.B.		A	1	STATE	03/02/00	4.622	FAIR	4100	\$5,904,000.00	13
2231660	Q	SUNRISE HWY W.B.	BLP W.B.		A	2	STATE	04/28/00	4.656	FAIR	5350	\$7,704,000.00	13
2231670	Q	N CONDUIT AVE W.B.	BLP E.B.		A	1	STATE	01/05/00	4.916	FAIR	4000	\$5,760,000.00	13
2231680	Q	N CONDUIT AVE WB	BLP W.B.		A	2	STATE	01/07/00	4.84	FAIR	6500	\$9,360,000.00	13
2231690	Q	FRANCIS LEWIS BLVD	BLP E.B.		A	1	STATE	03/13/00	5.333	GOOD	6000	\$8,640,000.00	13
2231700	Q	FRANCIS LEWIS BLVD	BLP W.B.		A	1	STATE	02/24/00	5.066	GOOD	6000	\$8,640,000.00	13
2231710	Q	MERRICK BLVD	BLP E.B.		A	1	STATE	03/10/00	4.133	FAIR	6000	\$8,640,000.00	13
2231720	Q	MERRICK BLVD	BLP W.B.		A	1	STATE	03/10/00	4.2	FAIR	6000	\$8,640,000.00	13

**INVENTORY SORTED BY B.I.N.**

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	INVENTORY SORTED BY B.I.N.										CD
				RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST		
2231730	Q	130TH AVE	BLP E.B.		A	1	STATE	01/03/00	5	GOOD	4400	\$6,336,000.00	13	
2231740	Q	130TH AVE	BLP W.B.		A	1	STATE	01/04/00	4.666	FAIR	4400	\$6,336,000.00	13	
2231750	Q	LINDEN BLVD	BCIP		A	2	STATE	01/28/00	4.068	FAIR	6700	\$9,648,000.00	13	
2231760	Q	BCIP	DUTCH BROADWAY-115 AVE		A	1	STATE	01/14/00	4.428	FAIR	7300	\$10,512,000.00	13	
2231770	Q	BELMONT PARK RAMP	BCIP		A	1	STATE	02/24/00	4.875	FAIR	3200	\$4,608,000.00	13	
2231780	Q	HEMPSTEAD AVE	BCIP		A	2	STATE	05/01/01	4.225	FAIR	14200	\$20,448,000.00	13	
2231800	Q	SUPERIOR ROAD	BCIP		A	2	STATE	02/28/00	4.227	FAIR	7000	\$10,080,000.00	13	
2231819	Q	JAMAICA AVE	BCIP		A	2	STATE	02/17/00	4.59	FAIR	11500	\$16,560,000.00	13	
2231829	Q	BRADDOCK AVE	BCIP		A	2	STATE	02/01/00	4.681	FAIR	10600	\$15,264,000.00	13	
2231840	Q	HILLSIDE AVE	BCIP		A	2	STATE	05/19/00	4.184	FAIR	9672	\$13,927,680.00	13	
2231850	Q	UNION TPKE	BCIP		A	2	STATE	08/29/01	4.318	FAIR	13600	\$19,584,000.00	13	
2231860	Q	W ALLEY ROAD	BCIP		A	2	STATE	06/06/00	5.636	GOOD	7200	\$10,368,000.00	11	
2231870	Q	NORTHERN BLVD	BCIP		A	2	STATE	12/08/00	6.652	VGOOD	8900	\$12,816,000.00	11	
2231880	Q	CROCHERON PK PED	BCIP		A-PED	9	CITY	02/27/01	3.806	FAIR	2300	\$3,312,000.00	11	
2231890	Q	28TH AVE PED BRDG	BCIP		A-PED	24	CITY	03/15/01	4.833	FAIR	7600	\$10,944,000.00	11	
2231900	Q	BCIP	FORT TOTTEN ENTRANCE		A	1	STATE	03/23/00	4.484	FAIR	4900	\$7,056,000.00	7	
2231910	Q	UTOPIA PKWY	BCIP		A	2	STATE	01/18/00	4.789	FAIR	7200	\$10,368,000.00	7	
2231920	Q	160TH ST	BCIP		A	2	STATE	05/09/01	6.319	VGOOD	5500	\$7,920,000.00	7	
2231930	Q	FRANCIS LEWIS BLVD	BCIP		A	3	STATE	01/20/00	4.772	FAIR	9100	\$13,104,000.00	7	
2231940	Q	CLINTONVILLE ST	BCIP		A	2	STATE	01/21/00	4.727	FAIR	7400	\$10,656,000.00	7	
2231950	Q	150TH ST	BCIP		A	2	STATE	01/21/00	4.363	FAIR	5900	\$8,496,000.00	7	
2231960	Q	149TH ST	BCIP		A	2	STATE	01/13/00	4.5	FAIR	6100	\$8,784,000.00	7	
2231970	Q	14TH AVE	BCIP		A	2	STATE	01/13/00	4.613	FAIR	8100	\$11,664,000.00	7	
2231980	Q	147TH ST	BCIP		A	2	STATE	01/12/00	4.727	FAIR	6300	\$9,072,000.00	7	
2232000	M	BATTERY PLACE	FDR DRIVE		AT	2	CITY	06/13/01	4.614	FAIR	75000	\$108,000,000.00	1	
223201A	M	FDR DR N.B. OFF RMP	FDR DR & SOUTH ST		AR	17	STATE	03/14/00	3.686	FAIR	102225	\$147,204,000.00	1	
223201B	M	STH ST RMP TO FDR S.B.	SOUTH ST		AR	10	STATE	02/24/00	3.716	FAIR	44625	\$64,260,000.00	1	
223201C	M	STH ST RMP TO FDR	SOUTH ST		AR	8	STATE	03/03/00	4.641	FAIR	39150	\$56,376,000.00	1	
223201D	M	RAMP TO N.B. FDR DRIVE	FDR & SOUTH ST.		AR	22	STATE	06/29/00	5.622	GOOD	15825	\$22,788,000.00	1	
2232029	M	CORLEARS PARK ROAD	FDR DRIVE		A	4	STATE	03/23/00	4.272	FAIR	4100	\$5,904,000.00	3	
2232030	M	DELANCEY ST PED BRDG	FDR DRIVE		A-PED	9	CITY	07/29/01	4.406	FAIR	2900	\$4,176,000.00	3	
2232040	M	HOUSTON ST	FDR DRIVE		A	2	STATE	07/06/01	3.09	FAIR	11010	\$15,854,400.00	3	
223204A	M	FDR NB TO HOUSTON ST	RELIEF		AR	4	STATE	03/22/00	3.9	FAIR	7642	\$11,004,480.00	3	
223204B	M	HOUSTON ST RAMP TO FDR	RELIEF		AR	4	STATE	04/03/00	4.333	FAIR	7642	\$11,004,480.00	3	
2232050	M	E 6TH ST PED BRDG	FDR DRIVE		A-PED	22	CITY	12/07/01	4.356	FAIR	2200	\$3,168,000.00	3	
2232070	M	25TH ST PED BRDG	FDR DRIVE		A-PED	4	CITY	06/03/01	5.266	GOOD	1700	\$2,448,000.00	6	
2232100	M	E 51ST ST PED BRDG	FDR DRIVE		A-PED	10	CITY	10/22/00	4.156	FAIR	2800	\$4,032,000.00	6	
2232110	M	E 64TH ST PED BRDG	FDR DRIVE		A-PED	13	CITY	06/27/01	5.266	GOOD	2100	\$3,024,000.00	8	
2232120	M	E 71ST ST PED BRDG	FDR DRIVE		A-PED	19	CITY	05/31/01	7	VGOOD	1800	\$2,592,000.00	8	
2232140	M	E 78TH ST PED BRDG	FDR DRIVE		A-PED	9	CITY	01/17/02	3.475	FAIR	1700	\$2,448,000.00	8	
2232158	M	FDR DRIVE S.B.	FDR DRIVE N.B.		AT	56	STATE	11/15/01	4.772	FAIR	54302	\$78,194,880.00	8	
2232167	M	PROMENADE OVER FDR	FDR/E79TH ST-E91ST ST		A-PED	53	STATE	11/12/01	3.285	FAIR	93000	\$133,920,000.00	8	
2232168	M	BREARLY SCHOOL	FDR DR PROMENADE		A	7	STATE	05/16/97	4.649	FAIR	3700	\$5,328,000.00	8	
2232180	M	E 103RD ST PED BRDG	FDR DRIVE		A-PED	20	CITY	05/30/01	4.897	FAIR	6000	\$8,640,000.00	11	
2232190	M	E 111TH ST PED BRDG	FDR DRIVE		A-PED	14	CITY	01/27/02	3.8	FAIR	2600	\$3,744,000.00	11	
2232200	M	E 120TH ST PED BRDG	FDR DRIVE		A-PED	23	CITY	04/08/01	4.3	FAIR	2500	\$3,600,000.00	11	
2233020	M	E 10TH ST PED BRDG	FDR DRIVE		A-PED	22	CITY	04/18/01	3.681	FAIR	1632	\$2,350,080.00	3	
2233038	M	FDR DRIVE SB	FDR NB / E 62ND ST		AT	46	STATE	05/17/01	2.509	POOR	70113	\$100,962,720.00	8	
2233040	M	E 60TH ST	FDR DRIVE		A	17	STATE	04/26/01	3.318	FAIR	24480	\$35,251,200.00	6	
2233059	M	HARLEM RIVER DRIVE	RAMP TO HRD N.B.		A	11	STATE	08/04/00	3.208	FAIR	51000	\$73,440,000.00	11	
2233080	K	E 14 ST PED BR	BSHP		A-PED	14	CITY	07/18/01	4.7	FAIR	4700	\$6,768,000.00	15	
2240019	KM	BROOKLYN BRIDGE	2781 (B.Q.E.)		WE	75	STATE	11/30/00	2.93	POOR	503788	\$725,454,720.00	3	
224001A	M	PARK ROW TO BKLN	WILLIAM ST N.B.		OE	3	STATE	04/06/01	4.111	FAIR	8685	\$12,506,400.00	1	
224001B	M	TO BKLN FRM FDR	FRANKFRT & CITY		OE	31	STATE	04/26/00	4.111	FAIR	51400	\$74,016,000.00	1	
224001C	M	PEARL ST TO BKLN	LAND ADJ TO BRDG		OE	12	STATE	04/30/01	3.711	FAIR	6489	\$9,344,160.00	3	
224001D	M	TO FDR DR N.B.	PEARL STREET		OE	30	STATE	05/08/01	5.358	GOOD	49600	\$71,424,000.00	1	
224001E	M	TO PEARL ST	LAND ADJ TO BRDG		OE	3	STATE	04/03/01	5.394	GOOD	5300	\$7,632,000.00	6	
224001F	M	PEARL ST TO FDR DR	LAND ADJ TO BRDG		OE	3	STATE	03/28/01	5.394	GOOD	5200	\$7,488,000.00	1	
224001G	M	TO PARK ROW	ROSE ST		OE	11	STATE	07/14/01	4.736	FAIR	16551	\$23,833,440.00	1	
2240027	KM	MANHATTAN BRIDGE(LL)	EAST RIVER	T	WE	23	STATE	11/17/00	3.472	FAIR	616390	\$887,601,600.00	3	
2240028	KM	MANHATTAN BRIDGE(UL)	NYCTA TRACKS-BMT	T	WE	43	STATE	10/16/00	3.5	FAIR	587424	\$845,890,560.00	3	
2240039	KM	WILLIAMSBURG BRIDGE	EAST RIVER	T	WE	72	STATE	12/06/00	2.68	POOR	741000	\$1,067,040,000.00	3	
2240047	MQ	QUEENSBORO BRIDGE(LL)	EAST RIVER	L	WE	53	STATE	12/20/00	4.861	FAIR	626900	\$902,736,000.00	6	
2240048	MQ	QUEENSBORO BRIDGE(UL)	EAST RIVER-LL		WE	37	STATE	12/20/00	4.471	FAIR	322300	\$464,112,000.00	6	
224004A	M	TO QNS FRM E 59TH ST	FIRST AVE		OE	13	STATE	11/13/00	5.788	GOOD	14800	\$21,312,000.00	6	
224004B	M	TO E 60TH ST FROM QNS	FIRST AVE		OE	13	STATE	11/13/00	5.791	GOOD	14800	\$21,312,000.00	6	
224004C	M	TO E 62ND ST FROM QNS	E 60TH ST		OE	10	STATE	11/09/00	4.984	FAIR	16720	\$24,076,800.00	6	
224004D	M	TO QNS FROM E 58TH ST	E 59TH ST		OE	12	STATE	10/20/00	4.622	FAIR	11781	\$16,964,640.00	6	
224004E	Q	TO NY FR THOMSON AVE	JACKSON AVE		OE	64	STATE	12/15/00	3.886	FAIR	104600	\$150,624,000.00	2	
224004F	Q	TO NY FROM 21ST ST	21ST ST (QUEENS)		OE	63	STATE	12/15/00	4.439	FAIR	63310	\$91,166,400.00	2	
224004G	Q	TO NY FROM 11TH ST	TERRAIN (CHAMBER)		OE	36	STATE	10/06/00	4.595	FAIR	8360	\$12,038,400.00	1	
224004H	Q	TO 21ST ST FROM NY	22ND ST		OE	34	STATE	11/02/00	4.211	FAIR	48100	\$69,264,000.00	2	
224004I	Q	TO THOMSON AVE FROM NY	JACKSON AVE		OE	38	STATE	11/28/00	5.377	GOOD	59100	\$85,104,000.00	2	
224004J	M	25X	NYC GARAGE		OE	14	STATE	10/31/00	4.893	FAIR	22058	\$31,763,520.00	6	
2240059	BM	WILLIS AVENUE	HARLEM RIVER		WM	26	STATE	07/13/01	3.152	FAIR	94700	\$136,368,000.00	11	
224005A	M	FROM FDR DRIVE	HARLEM RIVER DR		OR	19	STATE	06/14/00	4.059	FAIR	29900	\$43,056,000.00	11	
224005B	B	TO BRUCKNER BLVD	RELIEF		OR	5	STATE	09/27/01	4.208	FAIR	12100	\$17,144,000.00	1	
2240069	BM	THIRD AVE BRIDGE	HARLEM RIVER		WM	32	STATE	08/01/01	3.013	FAIR	79950	\$115,128,000.00	11	
224006A	B	TO BRUCKNER BLVD	RELIEF		OR	11	STATE	05/18/01	2.864	POOR	11100	\$15,984,000.00	1	
2240079	BM	MADISON AVE BRIDGE	HARLEM RIVER		WM	31	STATE	07/21/00	5.583	GOOD	80000	\$115,200,000.00	11	
224007A	M	TO MADISON AVENUE	RELIEF		OR	9	STATE	07/21/00	6.14	VGOOD	22600	\$32,544,000.00	11	
2240089	BM	145TH ST BRIDGE	HARLEM RIVER		WM	8	STATE	05/30/00	3.347	FAIR	56700	\$81,648,000.00	10	
2240120	BM	W 207TH/W FORDHAM RD	HARLEM RIVER		WM	5	STATE	04/28/00	5.75	GOOD	29682	\$42,742,080.00	12	
2240137	BM	BROADWAY BRIDGE	HARLEM RIVER	T	WM	3	STATE	10/17/01	3.93	FAIR	38100	\$54,864,000.00	12	
2240138	BM	NYCTA IRT	HARLEM RVR/BROADWAY	T	WM	3	STATE	10/18/01	4.588	FAIR	38100	\$54,864,000.00	12	
2240180	B	WESTCHESTER AVE	BRONX RIVER		W	1	STATE	07/19/01	5.015	GOOD	5476	\$7,885,440.00	2	

INVENTORY SORTED BY B.I.N.

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	INVENTORY SORTED BY B.I.N.									
				RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2240200	B	SHORE ROAD	HUTCHINSON RIVER		WM	7	STATE	10/31/00	3.985	FAIR	4800	\$120,000,000.00	28
2240210	B	CITY ISLAND ROAD	EASTCHESTER BAY		W	7	STATE	10/04/01	3.472	FAIR	28900	\$41,616,000.00	28
2240231	K	HAMILTON AVE BRIDGE	GOWANUS CANAL		WM	3	STATE	08/16/00	4.083	FAIR	7300	\$10,512,000.00	7
2240232	K	HAMILTON AVE BRIDGE	GOWANUS CANAL		WM	3	STATE	07/09/01	4.18	FAIR	7300	\$10,512,000.00	6
2240240	K	NINTH ST BRIDGE	GOWANUS CANAL		WM	5	STATE	06/19/01	7	VGGOOD	4800	\$30,000,000.00	6
2240250	K	THIRD ST	GOWANUS CANAL		WM	5	STATE	06/22/01	4.958	FAIR	4900	\$15,000,000.00	6
2240260	K	CARROLL ST	GOWANUS CANAL		WM	2	STATE	06/22/01	4.69	FAIR	3000	\$5,000,000.00	6
2240270	K	UNION ST	GOWANUS CANAL		WM	5	STATE	08/07/00	4.152	FAIR	4900	\$15,000,000.00	6
2240290	K	METROPOLITAN AVE	ENGLISH KILLS		WM	5	STATE	07/02/01	4.186	FAIR	15245	\$21,952,800.00	1
2240301	K	CROPSEY AVE	CONEY ISLAND CREEK		W	3	STATE	06/08/01	5.194	GOOD	9400	\$13,536,000.00	13
2240302	K	CROPSEY AVE	CONEY ISLAND CREEK		W	3	STATE	06/15/01	5.084	GOOD	9400	\$13,536,000.00	13
2240310	K	THIRD AVE	GOWANUS CANAL		W	1	STATE	06/26/01	4.545	FAIR	3200	\$4,608,000.00	6
2240320	K	OCEAN AVE PED BRDG	SHEEPSHEAD BAY		W-PED	30	CITY	12/05/00	4.263	FAIR	4000	\$5,760,000.00	15
2240350	R	RICHMOND AVE	RICHMOND CREEK		W	3	STATE	07/24/01	6.152	VGGOOD	32589	\$46,928,160.00	2
2240370	KQ	GREENPOINT AVE BRIDGE	NEWTOWN CREEK	L	WM	12	STATE	12/20/01	5.666	GOOD	76106	\$109,592,640.00	2
2240390	KQ	GRAND ST BRIDGE	NEWTOWN CREEK		WM	2	STATE	11/21/00	4.458	FAIR	5100	\$25,000,000.00	5
2240410	Q	BORDEN AVE	DUTCH KILLS		WM	2	STATE	07/30/01	3.791	FAIR	8400	\$12,096,000.00	2
2240440	Q	NORTHERN BLVD	ALLEY CREEK		W	2	STATE	03/27/00	4.986	FAIR	8300	\$11,952,000.00	11
2240450	Q	HUNTERS PT AVE BRIDGE	DUTCH KILLS		WM	4	STATE	03/17/00	5.333	GOOD	11544	\$16,623,360.00	2
2240507	Q	ROOSEVELT AVE	6781 - VAN WYCK EXPWY		W	27	STATE	06/12/00	3.507	FAIR	84424	\$121,570,560.00	81
2240540	K	STILLWELL AVE	CONEY ISLAND CRK		W	2	STATE	06/18/01	6.097	VGGOOD	17000	\$24,480,000.00	13
2240620	M	WARDS ISLAND PED BRDG	HARLEM RIVER		WM-PED	10	CITY	10/08/00	4.049	FAIR	12600	\$18,144,000.00	11
2240639	KQ	PULASKI BRIDGE	NEWTOWN CREEK		WM	48	STATE	03/14/00	4.943	FAIR	205770	\$296,308,800.00	2
2240640	MQ	ROOSEVELT ISLAND	E. RIVER E. CHANNEL		WM	8	STATE	03/20/00	4.347	FAIR	36500	\$52,560,000.00	8
2240650	Q	163RD ST PED BRDG	HAWTREE BASIN		W-PED	13	CITY	11/03/00	4.667	FAIR	5000	\$7,200,000.00	10
2240660	Q	RIKERS ISLAND BRIDGE	RIKERS ISL CHANNEL		W	56	STATE	09/06/01	4.647	FAIR	183100	\$263,664,000.00	1
2241000	B	WESTCHESTER AVE	CONRAIL PT MORRIS	C	O	1	STATE	09/05/00	5.17	GOOD	1740	\$2,505,600.00	1
2241010	B	E 156TH STREET	CONRAIL PT MORRIS	C	O	1	STATE	09/06/00	4.555	FAIR	2400	\$3,456,000.00	1
2241020	B	E 161ST STREET	CONRAIL PT MORRIS	C	O	1	STATE	06/06/01	3.454	FAIR	12800	\$18,432,000.00	1
2241030	B	E 163RD STREET	CONRAIL PT MORRIS	C	O	1	STATE	09/07/00	5.129	GOOD	3200	\$4,608,000.00	3
2241040	B	THIRD AVE	CONRAIL PT MORRIS	C	O	1	STATE	09/08/00	4.625	FAIR	2700	\$3,888,000.00	1
2241050	B	E 149TH ST/JACKSON AVE	CONRAIL PT MORRIS	C	O	1	STATE	09/12/00	5.25	GOOD	65000	\$93,600,000.00	1
2241060	B	ST. MARYS & CONCORD	CONRAIL PT MORRIS	C	O	1	STATE	09/12/00	5.333	GOOD	4500	\$6,480,000.00	1
2241070	B	WALES AVE	CONRAIL PT MORRIS	C	O	1	STATE	09/13/00	6.566	VGGOOD	2300	\$3,312,000.00	1
2241080	B	SOUTHERN BLVD	CONRAIL PT MORRIS	C	O	1	STATE	09/14/00	4.185	FAIR	3900	\$5,616,000.00	1
2241099	B	BRUCKNER BLVD	CONRAIL PT MORRIS	C	O	1	STATE	09/15/00	6.796	VGGOOD	6700	\$9,648,000.00	1
2241110	B	MELROSE AVE	CONRAIL PT MORRIS	C	O	11	STATE	08/06/01	6.208	VGGOOD	37854	\$54,509,760.00	3
2241129	B	E 149TH ST	AMTRAK	A	O	2	STATE	05/22/00	4.774	FAIR	12575	\$18,108,000.00	1
2241139	B	LEGGETT AVE	AMTRAK	A	O	3	STATE	06/21/00	4.69	FAIR	28300	\$40,752,000.00	2
2241159	B	LONGWOOD AVE	AMTRAK	A	O	1	STATE	05/24/00	6.041	VGGOOD	10625	\$15,300,000.00	2
2241169	B	LAFAYETTE AVE	AMTRAK	A	O	1	STATE	05/25/00	5.825	GOOD	12000	\$17,280,000.00	2
2241170	B	TIFFANY ST	AMTRAK	A	O	1	STATE	08/01/01	5.941	GOOD	7267	\$10,464,480.00	2
2241180	B	BARRETTO ST	AMTRAK	A	O	1	STATE	05/26/00	6.281	VGGOOD	5313	\$7,650,720.00	2
2241190	B	HUNTS POINT AVE	AMTRAK	A	O	1	STATE	06/02/00	5.25	GOOD	13700	\$19,728,000.00	2
2241200	B	FAILE ST	AMTRAK	A	O	1	STATE	06/02/00	6.156	VGGOOD	6208	\$8,939,520.00	2
2241210	B	BRYANT AVE	AMTRAK	A	O	1	STATE	06/28/01	3.152	FAIR	5300	\$7,632,000.00	2
2241230	B	WESTCHESTER AVE	AMTRAK	A	O	5	STATE	06/02/00	6.25	VGGOOD	15600	\$22,464,000.00	2
2241259	B	204TH ST PED BRDG	METRO NORTH RR HAR	M	O-PED	1	CITY	08/01/00	3.95	FAIR	4700	\$6,768,000.00	27
2241269	B	E 177TH ST	AMTRAK	A	O	3	STATE	06/15/00	5.43	GOOD	16606	\$23,912,640.00	9
2241270	B	EAST TREMONT AVE	AMTRAK	A	O	2	STATE	06/16/00	5.791	GOOD	22300	\$32,112,000.00	9
2241329	B	WHITE PLAINS ROAD	AMTRAK	A	O	1	STATE	06/24/00	5.046	GOOD	6900	\$9,936,000.00	9
2241330	B	UNIONPORT ROAD	AMTRAK	A	O	1	STATE	06/24/00	4.906	FAIR	4400	\$6,336,000.00	9
2241369	B	WILLIAMSBRIDGE RD	AMTRAK	A	O	2	STATE	06/20/00	4.776	FAIR	10400	\$14,976,000.00	11
2241390	B	SHORE RD CIRCLE	AMTRAK	A	O	2	STATE	06/29/01	3.597	FAIR	4800	\$6,912,000.00	10
2241409	B	GRAND CONCOURSE	METRO NORTH RR HUD	TCM	O	1	STATE	05/24/00	3.625	FAIR	16100	\$23,184,000.00	4
2241410	B	WALTON AVE	METRO NORTH RR HUD	M	O	1	STATE	03/15/00	4.234	FAIR	3600	\$5,184,000.00	4
2241420	B	GERARD AVE	METRO NORTH RR HUD	M	O	1	STATE	03/03/00	6.765	VGGOOD	5063	\$7,290,720.00	4
2241430	B	RIVER AVE	METRO NORTH RR HUD	M	O	1	STATE	11/02/01	6.421	VGGOOD	5040	\$7,257,600.00	4
2241460	B	W TREMONT AVE	METRO NORTH RR HUD	M	O	8	STATE	03/28/00	5.029	GOOD	12900	\$18,576,000.00	5
2241470	B	W FORDHAM RD	METRO NORTH RR HUD	M	O	5	STATE	10/27/01	6.333	VGGOOD	16052	\$23,114,880.00	7
2241489	B	W 225TH ST	CONRAIL PUTNAM	C	O	2	STATE	06/01/00	5.462	GOOD	10900	\$15,696,000.00	7
2241490	B	W 230TH ST	CONRAIL PUTNAM	C	O	1	STATE	04/16/01	5.843	GOOD	5600	\$8,064,000.00	8
2241509	B	W 231ST ST	CONRAIL PUTNAM	C	O	1	STATE	10/06/00	5.764	GOOD	4723	\$6,801,120.00	8
2241510	B	W 233RD ST	CONRAIL PUTNAM	C	O	1	STATE	04/11/01	5.47	GOOD	3760	\$5,414,400.00	8
2241520	B	W 234TH ST	CONRAIL PUTNAM	C	O	1	STATE	05/23/01	5.568	GOOD	3770	\$5,428,800.00	8
2241550	B	E 144TH ST	METRO NORTH RR HAR	M	O	2	STATE	11/02/01	6.708	VGGOOD	8290	\$11,937,600.00	1
2241560	B	E 149TH ST	METRO NORTH RR HAR	M	O	8	STATE	03/10/00	4.736	FAIR	27900	\$40,176,000.00	1
2241590	B	CONCOURSE VILL AVE	METRO NORTH RR HAR	M	O	1	STATE	03/02/00	3.906	FAIR	17800	\$25,632,000.00	1
2241600	B	E 158TH ST	METRO NORTH RR HAR	M	O	1	STATE	11/02/01	5.233	GOOD	3400	\$4,896,000.00	1
2241610	B	E 161ST ST	METRO NORTH RR HAR	M	O	1	STATE	11/02/01	5.383	GOOD	6600	\$9,504,000.00	1
2241620	B	E 162ND ST	METRO NORTH RR HAR	M	O	1	STATE	03/01/00	4.983	FAIR	4700	\$6,768,000.00	3
2241630	B	E 165TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/29/00	4.5	FAIR	16400	\$23,616,000.00	3
2241650	B	E 167TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/28/00	5.862	GOOD	3363	\$4,842,720.00	3
2241660	B	E 168TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/25/00	4.921	FAIR	7700	\$11,088,000.00	3
2241670	B	E 169TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/24/00	4.734	FAIR	3300	\$4,752,000.00	3
2241680	B	E 170TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/24/00	6.45	VGGOOD	3150	\$4,536,000.00	3
2241700	B	ST PAULS PL PED BRDG	METRO NORTH RR HAR	M	O-PED	2	CITY	08/03/00	6.296	VGGOOD	600	\$864,000.00	3
2241710	B	CLAREMONT PKWY	METRO NORTH RR HAR	M	O	1	STATE	02/23/00	4.421	FAIR	6300	\$9,072,000.00	3
2241720	B	E 173RD ST	METRO NORTH RR HAR	M	O	1	STATE	02/22/00	4.65	FAIR	3000	\$4,320,000.00	3
2241740	B	E 175TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/21/00	4.031	FAIR	3600	\$5,184,000.00	3
2241760	B	E TREMONT AVE	METRO NORTH RR HAR	M	O	1	STATE	05/15/01	3.593	FAIR	7300	\$10,512,000.00	6
2241770	B	E 178TH ST PED BRDG	METRO NORTH RR HAR	M	O-PED	5	CITY	11/27/01	6.73	VGGOOD	700	\$1,008,000.00	6
2241780	B	E 179TH ST PED BRDG	METRO NORTH RR HAR	M	O-PED	6	CITY	08/02/00	6.774	VGGOOD	700	\$1,008,000.00	6
2241790	B	E 180TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/17/00	4.109	FAIR	5000	\$7,200,000.00	6
2241800	B	E 183TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/16/00	4.328	FAIR	3600	\$5,184,000.00	6
2241810	B	E 188TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/14/00	4.312	FAIR	5300	\$7,632,000.00	6
2241820	B	E 187TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/15/00	4.843	FAIR	3800	\$5,472,000.00	6
2241839	B	E 189TH ST	METRO NORTH RR HAR	M	O	1	STATE	11/02/01	6.533	VGGOOD	43157	\$62,146,080.00	6

INVENTORY SORTED BY B.I.N.

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2241840	B	BEDFORD PARK BLVD	METRO NORTH RR HAR	M	O	1	STATE	03/07/00	4.616	FAIR	6400	\$9,216,000.00	27
2241860	B	GUN HILL RD	METRO NORTH RR HAR	M	O	2	STATE	03/09/00	4.279	FAIR	9000	\$12,960,000.00	12
2241870	B	E 233RD ST	METRO NORTH RR HAR	M	O	1	STATE	03/16/00	5.156	GOOD	7664	\$11,036,160.00	12
2241890	B	E 241ST ST	BRP, METRO NORTH HAR	M	O	28	STATE	11/15/01	4.736	FAIR	49500	\$71,280,000.00	12
2241900	B	EASTCHESTER ROAD	NYCTA-DYRE AVE LN	T	O	3	STATE	02/18/00	5.138	GOOD	13500	\$19,440,000.00	12
2241910	B	GUN HILL ROAD	NYCTA-DYRE AVE LN	T	O	2	STATE	08/29/00	6.906	VGOOD	6300	\$9,072,000.00	11
2241930	B	BEDFORD PARK BLVD	NYCTA IND YARDS	T	O	17	STATE	08/31/00	6.5	VGOOD	46300	\$66,672,000.00	7
2241940	B	W 205TH ST	NYCTA IND YARDS	T	O	7	STATE	11/06/00	6.666	VGOOD	37800	\$54,432,000.00	7
2241959	B	HUTCHINSON RVR PKWY	AMTRAK	A	O	1	STATE	06/26/00	6.237	VGOOD	15444	\$22,239,360.00	10
2242010	B	BRONX PELHAM PKWY	BRONX RIVER		W	1	STATE	07/05/00	4.931	FAIR	9200	\$13,248,000.00	27
2242029	B	SOUTHERN BLVD	BRONX PELHAM PKWY		O	2	STATE	02/04/00	4.447	FAIR	12900	\$18,576,000.00	27
2242030	B	CROTONA AVE	BRONX PELHAM PKWY		O	2	STATE	02/07/00	5.184	GOOD	7600	\$10,944,000.00	6
2242071	B	BRONX BLVD S.B.	BRONX RIVER		WO	1	STATE	04/13/00	4.7	FAIR	1800	\$2,592,000.00	12
2242072	B	BRONX BLVD N.B.	BRONX RIVER		WO	1	STATE	05/17/00	4.766	FAIR	1800	\$2,592,000.00	12
2242081	B	BRONX BLVD S.B.	BRONX RIVER		WO	1	STATE	05/16/00	4.466	FAIR	2800	\$4,032,000.00	12
2242082	B	BRONX BLVD N.B.	BRONX RIVER		WO	1	STATE	05/16/00	4.466	FAIR	2800	\$4,032,000.00	12
2242099	B	PARK ROAD (204TH ST)	BRONX RIVER		W	1	STATE	07/07/00	4.172	FAIR	4700	\$6,768,000.00	27
2242100	B	BOTANICAL GARDEN ROAD	TWIN LAKES		O-PED	1	STATE	04/12/00	4.966	FAIR	2200	\$3,168,000.00	27
2242110	B	BOSTON ROAD	BRONX RIVER		WO	1	STATE	04/07/00	4.25	FAIR	6200	\$8,928,000.00	27
2242149	B	E TREMONT AVE	BRONX RIVER		WO	2	STATE	04/14/00	4.777	FAIR	12900	\$18,576,000.00	6
2242200	B	YANKEE STDM PED BRDG	E 153 ST, METRO NORTH	M	O-PED	5	CITY	07/31/00	5	GOOD	4200	\$6,048,000.00	4
2242210	B	S OF ALLERTON AVE	BRONX RIVER		WO	3	STATE	03/21/00	4.763	FAIR	6200	\$8,928,000.00	27
2242220	B	SOUTHERN BLVD	BRONX RIVER		W	2	STATE	03/20/00	4.21	FAIR	4800	\$6,912,000.00	27
2242259	B	GRAND CONCOURSE	E 161ST ST		O	1	STATE	10/10/00	3.5	FAIR	24100	\$34,704,000.00	4
2242260	B	EAGLE AVE	E 161ST ST		O	1	STATE	03/21/00	5.468	GOOD	2800	\$4,032,000.00	1
2242280	B	GRAND CONCOURSE	E 167TH ST		O	2	STATE	07/25/00	4.719	FAIR	42900	\$61,776,000.00	4
2242299	B	GRAND CONCOURSE	E 138TH ST		O	1	STATE	06/04/01	5.6	GOOD	9500	\$13,680,000.00	1
2242300	B	GRAND CONCOURSE	E 170TH ST		O	2	STATE	05/12/00	4.754	FAIR	39300	\$56,592,000.00	4
2242319	B	GRAND CONCOURSE	E 174TH ST		O	1	STATE	03/24/00	4.133	FAIR	14900	\$21,456,000.00	4
2242329	B	GRAND CONCOURSE	E 175TH ST		O	1	STATE	09/12/00	4.466	FAIR	11900	\$17,136,000.00	4
2242330	B	GRAND CONCOURSE	E TREMONT AVE		O	2	STATE	10/19/01	6.483	VGOOD	11700	\$16,848,000.00	5
2242340	B	GRAND CONCOURSE	EAST KINGSBRIDGE		O	2	STATE	09/14/00	4.714	FAIR	16500	\$23,760,000.00	7
2242350	B	EAST FORDHAM RD	GRAND CONCOURSE		O	1	STATE	02/21/00	4.566	FAIR	10300	\$14,832,000.00	5
2242360	B	GRAND CONCOURSE	BURNSIDE AVE		O	2	STATE	09/29/00	4.588	FAIR	8400	\$12,096,000.00	5
2242370	B	GRAND CONCOURSE	BEDFORD PARK BLVD		O	1	STATE	05/09/00	4.823	FAIR	8418	\$12,121,920.00	7
2242380	B	GRAND CONCOURSE	E 204TH ST		O	1	STATE	06/05/01	5.828	GOOD	9272	\$13,351,680.00	7
2242400	B	E 180TH ST	BRONX RIVER		WO	1	STATE	07/03/00	4.809	FAIR	4500	\$6,480,000.00	6
2242430	B	GUN HILL ROAD	BRONX BLVD		O	4	STATE	07/12/00	5.052	GOOD	9400	\$13,536,000.00	12
2242440	B	GUN HILL ROAD	BRONX RIVER		WO	1	STATE	03/09/00	5.3	GOOD	8700	\$12,528,000.00	12
2242459	B	E 233RD ST	BRONX RIVER		WO	1	STATE	05/18/00	4.433	FAIR	7000	\$10,080,000.00	12
2242460	B	E 233RD ST	ENTR RD BNX RVR PKWY		O	1	STATE	01/26/00	5.6	GOOD	5300	\$7,632,000.00	12
2243010	K	LINCOLN ROAD	BMT SUBWAY, BRIGHTON	T	O	4	STATE	09/06/01	4.161	FAIR	6100	\$8,784,000.00	55
2243020	K	PARKSIDE AVE	BMT SUBWAY, BRIGHTON	T	O	6	STATE	10/18/01	4.263	FAIR	48700	\$70,128,000.00	14
2243040	K	CROOKE AVE	BMT SUBWAY, BRIGHTON	T	O	4	STATE	10/15/01	4.157	FAIR	6000	\$8,640,000.00	14
2243050	K	CATON AVE	BMT SUBWAY, BRIGHTON	T	O	4	STATE	10/24/01	4.5	FAIR	20800	\$29,952,000.00	14
2243080	K	CHURCH AVE	BMT SUBWAY, BRIGHTON	T	O	4	STATE	10/26/01	4.545	FAIR	18200	\$26,208,000.00	14
2243100	K	BEVERLY ROAD	BMT SUBWAY, BRIGHTON	T	O	3	STATE	10/22/01	3.982	FAIR	2700	\$3,888,000.00	14
2243110	K	CORTEYOU ROAD	BMT SUBWAY, BRIGHTON	T	O	3	STATE	10/29/01	3.926	FAIR	2900	\$4,176,000.00	14
2243120	K	DORCHESTER ROAD	BMT SUBWAY, BRIGHTON	T	O	1	STATE	03/08/00	6.156	VGOOD	4825	\$6,948,000.00	14
2243130	K	DITMAS AVE	BMT SUBWAY, BRIGHTON	T	O	1	STATE	10/30/01	5.659	GOOD	4100	\$5,904,000.00	14
2243140	K	NEWKIRK AVE	BMT SUBWAY, BRIGHTON	T	O	3	STATE	11/01/01	4.661	FAIR	4100	\$5,904,000.00	14
2243150	K	FOSTER AVE	BMT SUBWAY, BRIGHTON	T	O	1	STATE	03/09/00	4.383	FAIR	3000	\$4,320,000.00	14
2243170	K	STERLING PLACE	FRANKLIN SHUTTLE	T	O	1	STATE	11/06/01	6.593	VGOOD	2300	\$3,312,000.00	8
2243180	K	ST JOHNS PLACE	FRANKLIN SHUTTLE	T	O	1	STATE	11/03/01	6.796	VGOOD	2200	\$3,168,000.00	9
2243190	K	LINCOLN PLACE	FRANKLIN SHUTTLE	T	O	3	STATE	03/17/00	7	VGOOD	3400	\$4,896,000.00	9
2243200	K	UNION ST	FRANKLIN SHUTTLE	T	O	2	STATE	03/22/00	5.047	GOOD	4100	\$5,904,000.00	9
2243210	K	PRESIDENT ST	FRANKLIN SHUTTLE	T	O	2	STATE	03/23/00	5.161	GOOD	2500	\$3,600,000.00	9
2243220	K	CARROLL ST PED BRDG	FRANKLIN SHUTTLE	T	O-PED	3	CITY	07/07/00	5.484	GOOD	600	\$864,000.00	9
2243230	K	CROWN ST	FRANKLIN SHUTTLE	T	O	3	STATE	11/02/01	5.263	GOOD	4800	\$6,912,000.00	9
2243240	K	MONTGOMERY ST	FRANKLIN SHUTTLE	T	O	1	STATE	11/04/01	6.627	VGOOD	2200	\$3,168,000.00	9
2243250	K	WASHINGTON AVE	FRANKLIN SHUTTLE	T	O	1	STATE	03/15/00	6.328	VGOOD	6500	\$9,360,000.00	9
2243260	K	FLATBUSH AVE	FRANKLIN SHUTTLE	T	O	2	STATE	03/20/00	5.254	GOOD	11300	\$16,272,000.00	9
2243279	K	EASTERN PKWY	FRANKLIN SHUTTLE	T	O	1	STATE	03/21/00	4.833	FAIR	7700	\$11,088,000.00	9
2243280	K	6TH AVE	LIRR ATLANTIC AVE	L	O	9	STATE	10/06/00	4.902	FAIR	12276	\$17,677,440.00	8
2243290	K	CARLTON AVE	LIRR ATLANTIC AVE	L	O	7	STATE	03/02/00	4.986	FAIR	10823	\$15,585,120.00	8
2243310	K	2ND AVE	LIRR BAY RIDGE	N	O	6	STATE	08/29/01	3.865	FAIR	17000	\$24,480,000.00	10
2243320	K	3RD AVE	LIRR BAY RIDGE	N	O	4	STATE	08/30/01	5.708	GOOD	17230	\$24,811,200.00	10
2243330	K	4TH AVE	LIRR BAY RIDGE	NT	O	6	STATE	11/05/01	5.916	GOOD	19400	\$27,936,000.00	10
2243340	K	15TH AVE	LIRR BAY RIDGE	N	O	1	STATE	11/03/00	4.607	FAIR	3614	\$5,204,160.00	11
2243350	K	60TH ST	LIRR BAY RIDGE	N	O	1	STATE	09/07/01	6.866	VGOOD	3900	\$5,616,000.00	11
2243360	K	16TH AVE	LIRR BAY RIDGE	N	O	1	STATE	11/03/00	6.816	VGOOD	5300	\$7,632,000.00	11
2243370	K	17TH AVE	LIRR BAY RIDGE	N	O	1	STATE	02/29/00	5.313	GOOD	3406	\$4,904,640.00	12
2243380	K	18TH AVE	LIRR BAY RIDGE	N	O	1	STATE	02/29/00	5.421	GOOD	6006	\$8,648,640.00	12
2243390	K	52ND ST	LIRR BAY RIDGE	N	O	2	STATE	09/10/01	4.21	FAIR	2800	\$4,032,000.00	12
2243400	K	50TH ST	LIRR BAY RIDGE	N	O	2	STATE	09/13/01	4.771	FAIR	7100	\$10,224,000.00	12
2243410	K	MCDONALD AVE	LIRR BAY RIDGE	N	O	1	STATE	04/13/00	5.421	GOOD	2760	\$3,974,400.00	12
2243420	K	E 3RD ST	LIRR BAY RIDGE	N	O	1	STATE	09/24/01	5.02	GOOD	1500	\$2,160,000.00	12
2243439	K	OCEAN PKWY	LIRR BAY RIDGE	N	O	1	STATE	10/30/00	4.833	FAIR	7000	\$10,080,000.00	12
2243440	K	CONEY ISLAND AVE	LIRR BAY RIDGE	N	O	1	STATE	03/01/00	5.744	GOOD	3231	\$4,652,640.00	12
2243450	K	E 14TH ST	LIRR BAY RIDGE	N	O	1	STATE	03/01/00	5.595	GOOD	1775	\$2,556,000.00	14
2243460	K	E 15TH ST - PED	LIRR BAY RIDGE	N	O-PED	3	CITY	01/17/01	7	VGOOD	900	\$1,296,000.00	14
2243480	K	OCEAN AVE	LIRR BAY RIDGE	N	O	2	STATE	10/30/00	4.859	FAIR	5000	\$7,200,000.00	14
2243490	K	BEDFORD AVE	LIRR BAY RIDGE	N	O	6	STATE	03/07/00	4.777	FAIR	12000	\$17,280,000.00	14
2243500	K	NOSTRAND AVE	LIRR BAY RIDGE	N	O	2	STATE	03/03/00	5.322	GOOD	4320	\$6,220,800.00	14
2243510	K	FLATBUSH AVE	LIRR BAY RIDGE	N	O	2	STATE	09/26/01	4.666	FAIR	5700	\$8,208,000.00	18
2243520	K	BROOKLYN AVE	LIRR BAY RIDGE	N	O	3	STATE	09/27/01	5.92	GOOD	4500	\$6,480,000.00	18
2243530	K	AVENUE H	LIRR BAY RIDGE	N	O	2	STATE	09/28/01	6.823	VGOOD	35100	\$50,544,000.00	18
2243569	K	ATLANTIC AVE	LIRR ATLANTIC AVE	L	O	75	STATE	11/20/00	3.666	FAIR	135100	\$194,544,000.00	16

INVENTORY SORTED BY B.I.N.

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2243570	K	86TH ST	LIRR & SEA BEACH	LT	O	6	STATE	03/24/00	6.25	VG00D	18200	\$26,208,000.00	13
2243580	K	5TH AVE	LIRR & SEA BEACH	LT	O	4	STATE	05/03/00	4.472	FAIR	12500	\$18,000,000.00	10
2243590	K	6TH AVE	LIRR & SEA BEACH	LT	O	5	STATE	05/02/00	3.583	FAIR	14200	\$20,448,000.00	10
2243600	K	7TH AVE	LIRR & SEA BEACH	LT	O	7	STATE	05/01/00	5.402	GOOD	18913	\$27,234,720.00	10
2243610	K	8TH AVE	LIRR & SEA BEACH	LT	O	4	STATE	11/07/01	4.37	FAIR	11400	\$16,416,000.00	10
2243620	K	FORT HAMILTON PKWY	LIRR & SEA BEACH	LT	O	3	STATE	05/23/00	5.627	GOOD	14800	\$21,312,000.00	10
2243630	K	11TH AVE	LIRR & SEA BEACH	LT	O	5	STATE	10/20/00	6.808	VG00D	9700	\$13,968,000.00	10
2243640	K	13TH AVE	LIRR & SEA BEACH	LT	O	5	STATE	11/08/01	4.666	FAIR	16000	\$23,040,000.00	10
2243650	K	14TH AVE	LIRR BAY RIDGE	N	O	4	STATE	11/10/00	4.285	FAIR	10000	\$14,400,000.00	11
2243660	K	NEW UTRECHT AVE	LIRR BAY RIDGE	N	O	1	STATE	04/12/00	4.346	FAIR	2400	\$3,456,000.00	11
2243670	K	15TH AVE	BMT SEA BEACH	T	O	6	STATE	11/12/01	4.136	FAIR	17300	\$24,912,000.00	11
2243680	K	16TH AVE	BMT SEA BEACH	T	O	4	STATE	04/14/00	5.372	GOOD	6816	\$9,815,040.00	11
2243690	K	17TH AVE	BMT SEA BEACH	T	O	4	STATE	11/14/01	3.71	FAIR	8500	\$12,240,000.00	11
2243700	K	18TH AVE	BMT SEA BEACH	T	O	4	STATE	11/16/01	3.909	FAIR	8700	\$12,528,000.00	11
2243710	K	19TH AVE	BMT SEA BEACH	T	O	4	STATE	04/07/00	4.026	FAIR	4800	\$6,912,000.00	11
2243720	K	20TH AVE	BMT SEA BEACH	T	O	6	STATE	04/06/00	4.538	FAIR	12500	\$18,000,000.00	11
2243730	K	65TH ST	BMT SEA BEACH	T	O	4	STATE	03/31/00	5.947	GOOD	12000	\$17,280,000.00	11
2243740	K	BAY PKWY	BMT SEA BEACH	T	O	4	STATE	12/04/01	5.078	GOOD	16800	\$24,192,000.00	11
2243750	K	AVENUE O	BMT SEA BEACH	T	O	4	STATE	11/20/01	6.568	VG00D	4658	\$6,707,520.00	11
2243760	K	AVENUE P	BMT SEA BEACH	T	O	4	STATE	11/21/01	6.883	VG00D	6000	\$8,640,000.00	11
2243770	K	KINGS HIGHWAY	BMT SEA BEACH	T	O	4	STATE	03/29/00	3.368	FAIR	12000	\$17,280,000.00	11
2243780	K	HIGHLAWN AVE	BMT SEA BEACH	T	O	6	STATE	11/30/01	7	VG00D	11300	\$16,272,000.00	11
2243790	K	AVENUE S	BMT SEA BEACH	T	O	4	STATE	12/03/01	6.6	VG00D	4800	\$6,912,000.00	15
2243800	K	AVENUE T	BMT SEA BEACH	T	O	4	STATE	11/27/01	6.5	VG00D	8500	\$12,240,000.00	11
2243810	K	AVENUE U	BMT SEA BEACH	T	O	4	STATE	03/27/00	6.725	VG00D	8500	\$12,240,000.00	15
2243820	K	21ST AVE	BMT SEA BEACH	T	O	4	STATE	11/29/01	4.131	FAIR	21400	\$30,816,000.00	11
2243839	K	4TH AVE	NYCTA BMT TRACKS	T	O	1	STATE	05/05/00	3.129	FAIR	4100	\$5,904,000.00	7
2243840	K	9TH AVE	NYCTA BMT YARD	T	O	5	STATE	12/10/01	6.777	VG00D	12440	\$17,913,600.00	12
2243850	K	LIBERTY AVE	LIRR BAY RIDGE	N	O	4	STATE	10/03/01	4.191	FAIR	6400	\$9,216,000.00	16
2243860	K	GLENMORE AVE	LIRR BAY RIDGE	N	O	2	STATE	10/05/01	3.947	FAIR	5700	\$8,208,000.00	16
2243870	K	PITKIN AVE	LIRR BAY RIDGE	N	O	3	STATE	11/01/00	4.088	FAIR	5600	\$8,064,000.00	16
2243890	K	SUTTER AVE	LIRR BAY RIDGE	N	O	3	STATE	10/09/01	4.117	FAIR	5400	\$7,776,000.00	16
2243900	K	BLAKE AVE	LIRR BAY RIDGE LINE	N	O	3	STATE	04/14/00	5.309	GOOD	4900	\$7,056,000.00	16
2243910	K	LIVONIA AVE PED BRDG	LIRR BAY RIDGE LINE	N	O-PED	3	CITY	01/18/01	5.458	GOOD	2500	\$3,600,000.00	16
2243920	K	7TH AVE	NYCTA BMT YARD	T	O	2	STATE	05/11/00	3.916	FAIR	5200	\$7,488,000.00	7
2243940	K	9TH AVE	NYCTA IND SBWY	T	O	5	STATE	12/06/01	4.754	FAIR	11900	\$17,136,000.00	12
2244010	K	EMDALE ARCH E DRV	NR GRAND ARMY PLZ		O	1	CITY	05/02/01	4.633	FAIR	900	\$1,296,000.00	55
2244020	K	W DR OV WK-MA.ENT	MEADOWPORT ARCH		O	1	STATE	04/24/01	5.571	GOOD	2500	\$3,600,000.00	55
2244030	K	EAST DRIVE	BRIDLE PATH		O	1	STATE	04/25/01	5.183	GOOD	2000	\$2,880,000.00	55
2244040	K	EAST DRIVE	EAST WOOD ARCH		O	1	CITY	06/08/01	4.2	FAIR	900	\$1,296,000.00	55
2244050	K	CENTRAL DRIVE	PED PATH & STREAM		W	3	STATE	04/27/01	5.315	GOOD	7400	\$10,656,000.00	55
2244060	K	CLEFT RIDGE SPAN	PROSPECT PARK			1	CITY	06/21/01	4.5	FAIR	900	\$1,296,000.00	55
2244120	K	HILL DRIVE	PROSPECT PK LAKE		WO	3	STATE	05/01/01	3.636	FAIR	7800	\$11,232,000.00	55
2244150	K	RIDGE BLVD	SHORE RD DRIVE		O	1	STATE	05/10/01	7	VG00D	7000	\$10,080,000.00	10
2244160	K	3RD AVE	SHORE RD DRIVE		O	1	STATE	05/11/01	7	VG00D	7100	\$10,224,000.00	10
2244170	K	ATLNTC AV SVC RD E.B.	EAST NEW YORK AVE		O	2	STATE	05/03/01	4.543	FAIR	5500	\$7,920,000.00	5
2244180	K	ATLNTC AV SVC RD W.B.	EAST NEW YORK AVE		O	2	STATE	05/07/01	4.491	FAIR	6200	\$8,928,000.00	16
2244421	K	WLLMSBRG BRDG NTH APP	DRIGGS AVE		O	1	STATE	02/16/00	4.293	FAIR	3170	\$4,564,800.00	1
2244440	K	SOUTH OF TILLARY ST	NAVY ST		O-PED	1	CITY	03/08/01	4.333	FAIR	6200	\$8,928,000.00	2
2244460	K	CONDUIT BLVD NB	ATLANTIC AVE EB		O	1	STATE	02/10/00	4.666	FAIR	3800	\$5,472,000.00	5
2244470	K	SEELEY ST	PROSPECT AVE		O	1	STATE	05/09/01	4.1	FAIR	7700	\$11,088,000.00	7
2244480	K	5TH AVE	GREENWOOD CEMETERY		O	1	STATE	05/14/01	5	GOOD	3600	\$5,184,000.00	7
2245010	M	11TH AVE VIADUCT	LIRR WEST SIDE YARD	AL	O	39	STATE	11/21/00	3.75	FAIR	157500	\$226,800,000.00	4
224501B	M	W 33RD ST	AMTRAK 30 ST BRANCH	A	O	8	STATE	04/10/00	4.347	FAIR	16500	\$23,760,000.00	4
224501C	M	W 33RD ST	LAND ADJ TO AMTRAK	A	O	2	STATE	05/11/01	4.555	FAIR	4620	\$6,652,800.00	4
224501D	M	W 34TH ST	AMTRAK 30 ST BRANCH	A	O	4	STATE	05/15/01	4.319	FAIR	11800	\$16,992,000.00	4
224501E	M	W 35TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	04/21/00	4.388	FAIR	6500	\$9,360,000.00	4
224501F	M	W 36TH ST	AMTRAK 30 ST BRANCH	A	O	7	STATE	08/28/00	4.119	FAIR	16400	\$23,616,000.00	4
2245040	M	FORT TRYON PARK	SOUTH OF CLOISTERS		O	1	CITY	04/05/01	5.467	GOOD	750	\$1,080,000.00	12
2245050	M	FORT TRYON PARK	UNDERPASS			1	CITY	04/06/99	4.6	FAIR	750	\$1,080,000.00	12
2245060	M	W 37TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	08/24/00	3.961	FAIR	7600	\$10,944,000.00	4
2245070	M	W 38TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	05/24/00	3.73	FAIR	6200	\$8,928,000.00	4
2245080	M	W 39TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	06/02/00	4.365	FAIR	6300	\$9,072,000.00	4
2245090	M	W 43RD ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/14/00	4.764	FAIR	4100	\$5,904,000.00	4
2245100	M	W 44TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/15/00	4.661	FAIR	4300	\$6,192,000.00	4
2245110	M	W 45TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/16/00	4.632	FAIR	4100	\$5,904,000.00	4
2245120	M	W 46TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/25/00	4.676	FAIR	4100	\$5,904,000.00	4
2245130	M	W 47TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/21/00	4.72	FAIR	4100	\$5,904,000.00	4
2245140	M	W 48TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/22/00	4.735	FAIR	4100	\$5,904,000.00	4
2245150	M	W 49TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	03/24/00	4.573	FAIR	4100	\$5,904,000.00	4
2245160	M	W 51ST ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/04/00	4.764	FAIR	4300	\$6,192,000.00	4
2245170	M	W 52ND ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/26/00	5.073	GOOD	4300	\$6,192,000.00	4
2245180	M	W 53RD ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/04/00	5.338	GOOD	5100	\$7,344,000.00	4
2245190	M	W 58TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/07/00	4.705	FAIR	4100	\$5,904,000.00	4
2245209	M	11TH AVE	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/27/00	4.529	FAIR	15400	\$22,176,000.00	4
2245210	M	W 42ND ST	AMTRAK 30 ST BRANCH	A	O	4	STATE	11/20/00	4.428	FAIR	10300	\$14,832,000.00	4
2245220	M	W 57TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	04/14/00	4.867	FAIR	9100	\$13,104,000.00	4
2245230	M	W 148TH ST PED BRDG	AMTRAK 30 ST BRANCH	A	O-PED	3	CITY	11/16/00	4	FAIR	1100	\$1,584,000.00	9
2245250	M	W 158TH ST	AMTRAK 30 ST BRANCH	A	O	7	STATE	08/14/01	6.43	VG00D	29170	\$42,004,800.00	12
2245260	M	W 173RD ST PED BRDG	AMTRAK 30 ST BRANCH	A	O-PED	2	CITY	11/14/00	4.743	FAIR	1500	\$2,160,000.00	12
2245290	M	W 155TH ST PED BRDG	AMTRAK 30 ST BRANCH	A	O-PED	3	CITY	11/15/00	4.015	FAIR	800	\$1,152,000.00	9
2245300	M	INWOOD HILL PK FTBR	AMTRAK 30 ST BRANCH	A	O-PED	6	CITY	11/13/00	4.472	FAIR	700	\$1,008,000.00	12
2245319	M	E 97TH ST	METRO NORTH MAIN LN	M	O	1	STATE	10/09/00	5	GOOD	3200	\$4,608,000.00	8
2245330	M	W 41ST ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	04/21/00	4.444	FAIR	6200	\$8,928,000.00	4
2245340	M	W 50TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/27/00	4.647	FAIR	4100	\$5,904,000.00	4
2245350	M	W 54TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/05/00	5.412	GOOD	4700	\$6,768,000.00	4
2245360	M	W 55TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/06/00	5.352	GOOD	4300	\$6,192,000.00	4
2245370	M	W 56TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/07/00	5.367	GOOD	4400	\$6,336,000.00	4

INVENTORY SORTED BY B.I.N.

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2245380	M	E 66TH ST	PED WALK N. OF ZOO		O	1	STATE	04/10/00	5	GOOD	1500	\$2,160,000.00	8
2245400	M	PED BRDG W OF 8TH AV	W 155TH ST		O-PED	1	CITY	11/20/00	1	POOR	400	\$576,000.00	10
2245420	M	W 65TH ST E.B.	BRIDLE PATH W END		O	1	STATE	04/10/00	5.318	GOOD	1600	\$2,304,000.00	64
2245440	M	W 40TH ST	AMTRAK 30 ST BRANCH	A	O	4	STATE	05/24/00	4.073	FAIR	9400	\$13,536,000.00	4
2245460	M	PARK AVE S.B.	E 45TH ST		O	1	STATE	04/10/01	4.729	FAIR	2400	\$3,456,000.00	5
2245470	M	PARK AVE N.B	E 45TH ST		O	1	STATE	04/10/01	4.864	FAIR	2400	\$3,456,000.00	5
2245480	M	TO GWB OPP W 171ST ST	RIVERSIDE DRIVE		O	1	STATE	07/24/00	5.571	GOOD	10800	\$15,552,000.00	12
2246000	M	WEST DRIVE	PED BET 61ST & 62ST		O	1	STATE	04/13/00	5	GOOD	2500	\$3,600,000.00	64
2246030	M	PEDESTRIAN BRIDGE	POND		O-PED	1	CITY	03/22/00	3.857	FAIR	1400	\$2,016,000.00	64
2246040	M	EAST DR AT CNTRL PARK	PEDESTRIAN WALK		O	1	CITY	06/08/01	5	GOOD	1200	\$1,728,000.00	5
2246050	M	CENTRAL DRIVE	PED OPP 63RD ST		O	1	STATE	04/14/00	5	GOOD	2000	\$2,880,000.00	64
2246069	M	EAST DRIVE	PEDESTRIAN WALK		O	1	STATE	04/21/00	4.566	FAIR	2700	\$3,888,000.00	64
2246070	M	CPK UNDER CENTR DR	OPP 65TH ST-IN E&W		O	1	CITY	06/08/99	5.733	GOOD	1200	\$1,728,000.00	64
2246080	M	WEST DRIVE	BRIDLE PATH @ 64TH ST		O	1	STATE	04/10/00	5.166	GOOD	2000	\$2,880,000.00	64
2246090	M	PED BRDG OPP 65 ST	TRANSVERSE RD #1		O-PED	1	CITY	11/12/00	4.655	FAIR	2300	\$3,312,000.00	64
2246100	M	CNTRAL DRIVE	TRANSVERSE RD #1		O	1	STATE	04/20/00	4.333	FAIR	6000	\$8,640,000.00	64
2246110	M	EAST DRIVE	TRANSVERSE RD #1		O	1	STATE	04/21/00	4.6	FAIR	6000	\$8,640,000.00	64
2246120	M	WEST DRIVE	TRANSVERSE RD #1		O	1	STATE	04/20/00	5	GOOD	7900	\$11,376,000.00	64
2246130	M	CENTRAL PARK	UNDER EAST DRIVE		O	1	CITY	02/15/01	4.207	FAIR	1200	\$1,728,000.00	64
2246140	M	72ND ST ENT TO W DR	BRIDLE PATH		O	1	STATE	02/21/00	5.066	GOOD	3600	\$5,184,000.00	64
2246150	M	72ND ST CROSS DR	NEAR CONCERT GRNDS		O	3	STATE	03/02/00	4.941	FAIR	7300	\$10,512,000.00	64
2246170	M	EAST DRIVE	PED WALK @ 73RD ST		O	1	STATE	02/28/00	5.018	GOOD	1900	\$2,736,000.00	64
2246230	M	EAST DRIVE	TRANSVERSE RD #2		O	1	STATE	04/19/00	4.6	FAIR	6500	\$9,360,000.00	64
2246240	M	WEST DRIVE	TRANSVERSE RD #2		O	1	STATE	04/19/00	4.166	FAIR	7200	\$10,368,000.00	64
2246250	M	EAST DRIVE	TRANSVERSE RD #3		O	1	STATE	02/01/00	4.466	FAIR	5100	\$7,344,000.00	64
2246260	M	WEST DRIVE	TRANSVERSE RD #3		O	1	STATE	01/28/00	4.8	FAIR	5100	\$7,344,000.00	64
2246270	M	EAST DRIVE	TRANSVERSE RD #4		O	1	STATE	01/31/00	3.966	FAIR	7000	\$10,080,000.00	64
2246280	M	WEST DRIVE	TRANSVERSE RD #4		O	1	STATE	01/26/00	4.166	FAIR	4700	\$6,768,000.00	64
2246330	M	WEST DRIVE	FEEDER TO LAKE		WO	1	STATE	02/29/00	5	GOOD	6700	\$9,648,000.00	64
2246350	M	CNTRL PK OVER E DRIVE	S OF CLEOPATRAS NDL		O	1	CITY	02/14/01	4.8	FAIR	750	\$1,080,000.00	64
2246360	M	WEST DRIVE	PED WALK OPP 82 ST		O	1	STATE	03/02/00	6.045	VGOOD	3100	\$4,464,000.00	64
2246400	M	E FOOTBRIDGE	TRANSVERSE RD #2		O-PED	1	CITY	10/13/01	4.5	FAIR	3700	\$5,328,000.00	64
2246410	M	TRANSVERSE RD. #1	PED WALK NEAR 5 AV		O	1	STATE	04/10/00	4.409	FAIR	2000	\$2,880,000.00	8
2246430	M	WEST DRIVE	PED OPP 109TH ST		O	1	STATE	04/07/00	4.266	FAIR	1200	\$1,728,000.00	64
2246440	M	PED IN CTR OF PK	TRANSVERSE RD NO.2		O-PED	1	CITY	10/13/01	4.172	FAIR	5900	\$8,496,000.00	64
2246450	M	79 ST ENTR TO E DR	PED PATH OPP 77TH ST		O	1	STATE	02/23/00	5.19	GOOD	5000	\$7,200,000.00	64
2246460	M	77 ST ENTR TO W DR	PED PATH OPP 77TH ST		O	2	STATE	03/01/00	4.789	FAIR	5800	\$8,352,000.00	64
2246470	M	EAST DRIVE	THE LOCH		W	1	STATE	04/05/00	4.7	FAIR	1100	\$1,584,000.00	64
2246489	M	W 181 ST	RAMP TO WASH BR		O	1	STATE	03/06/00	4.766	FAIR	8200	\$11,808,000.00	12
2246490	M	A.C. POWELL BLVD N.B.	A.C. POWELL BLVD		O	1	STATE	04/21/00	4.061	FAIR	5600	\$8,064,000.00	10
2246500	M	FORT TRYON PLACE	ENTR FROM RIVERSIDE DR		O	1	STATE	04/17/00	4.366	FAIR	6600	\$9,504,000.00	12
2246510	M	CORBIN PL OVERPASS	CORBIN PLACE		O	1	STATE	03/16/00	4.933	FAIR	2200	\$3,168,000.00	12
2246540	M	E 34TH ST	PARK AVE TUNNEL		OT	1	STATE	09/09/00	4.266	FAIR	36200	\$52,128,000.00	5
2246550	M	PARK AVE VIADUCT	E 42ND ST		O	10	STATE	10/04/01	4.597	FAIR	19600	\$28,224,000.00	6
2246560	M	TUDOR CITY PLACE	E 42ND ST		O	1	STATE	03/24/00	5.027	GOOD	6600	\$9,504,000.00	6
2246570	M	UNITED NATIONS PL	FIRST AVE TUNNEL		OT	2	STATE	10/02/00	5.078	GOOD	92200	\$132,768,000.00	6
2246600	M	W 176TH ST PED BRDG	APPROACH TO G.W.B.		O-PED	1	CITY	12/28/00	4.778	FAIR	1200	\$1,728,000.00	12
2246620	M	PEDESTRIAN BRIDGE	E 128TH ST		O-PED	18	CITY	01/09/01	4.019	FAIR	2300	\$3,312,000.00	11
2246660	M	RIVERSIDE DRIVE	W 125TH ST & OTHERS		O	27	STATE	07/03/01	4.5	FAIR	148300	\$213,552,000.00	9
2246670	M	W 134 ST VIADUCT	RIVERSIDE DRIVE		O	3	STATE	06/15/01	5	GOOD	7927	\$11,414,880.00	9
2246690	M	ISHAM PK VEHICULR	HARLEM RIVER INLET		O	1	STATE	04/26/00	4.366	FAIR	700	\$1,008,000.00	12
2246710	M	W 153 ST	A.C. POWELL BLVD		O	1	STATE	04/20/00	4.388	FAIR	3082	\$4,438,080.00	10
2246720	M	RIVERSIDE DRIVE	W 158TH ST		O	77	STATE	08/30/01	3.541	FAIR	181400	\$261,216,000.00	9
2246970	M	RIVERSIDE DRIVE	W 96TH ST		O	3	STATE	08/02/00	5.352	GOOD	10600	\$15,264,000.00	7
2246980	M	RIVERSIDE DRIVE	W 138TH ST		O	1	STATE	07/11/00	4.633	FAIR	6700	\$9,648,000.00	9
2246990	M	129 - 130 ST PED BRDG	RAMP OFF 3RD AVE		O-PED	5	CITY	09/06/00	4.095	FAIR	500	\$720,000.00	11
2247020	Q	94TH ST PED BRDG	LIRR N SIDE DIV	L	O-PED	5	CITY	12/12/00	4.211	FAIR	500	\$720,000.00	4
2247040	Q	UNION ST	LIRR N SIDE DIV	L	O	1	STATE	07/17/01	6.39	VGOOD	3313	\$4,770,720.00	7
2247050	Q	BOWNE AVE	LIRR N SIDE DIV	L	O	1	STATE	06/23/00	5.862	GOOD	4974	\$7,162,560.00	7
2247060	Q	PARSONS BLVD	LIRR N SIDE DIV	L	O	1	STATE	06/26/00	5.333	GOOD	4200	\$6,048,000.00	7
2247070	Q	147TH ST	LIRR N SIDE DIV	L	O	1	STATE	07/18/01	5.745	GOOD	2800	\$4,032,000.00	7
2247080	Q	149TH ST	LIRR N SIDE DIV	L	O	1	STATE	07/20/01	4.857	FAIR	4100	\$5,904,000.00	7
2247090	Q	149TH PLACE	LIRR N SIDE DIV	L	O	2	STATE	07/19/01	5.385	GOOD	4300	\$6,192,000.00	7
2247100	Q	150TH ST	LIRR N SIDE DIV	L	O	2	STATE	07/23/01	6.588	VGOOD	7800	\$11,275,200.00	7
2247110	Q	MURRAY ST	LIRR N SIDE DIV	L	O	1	STATE	07/24/01	5.555	GOOD	4000	\$5,760,000.00	7
2247120	Q	WOODSIDE AVE	LIRR MAIN LINE	L	O	3	STATE	10/27/01	4.428	FAIR	14900	\$21,456,000.00	2
2247130	Q	CORPORAL KENNEDY ST	LIRR N SIDE DIV	L	O	2	STATE	10/09/01	6.529	VGOOD	4340	\$6,249,600.00	11
2247140	Q	BELL BLVD	LIRR N SIDE DIV	L	O	1	STATE	07/30/01	5.881	GOOD	4320	\$6,220,800.00	11
2247150	Q	65TH ST	LIRR N SIDE DIV	L	O	3	STATE	10/26/01	6.611	VGOOD	6000	\$8,640,000.00	2
2247160	Q	65TH PLACE	LIRR N SHR DIV	L	O	3	STATE	10/26/01	6.5	VGOOD	8381	\$12,068,640.00	2
2247170	Q	DOUGLASTON PKWY	LIRR N SIDE DIV	L	O	3	STATE	06/28/00	5.423	GOOD	6300	\$9,072,000.00	11
2247180	Q	GRAND AVE	LIRR MAIN LINE	L	O	3	STATE	07/12/00	5	GOOD	7415	\$10,677,600.00	4
2247190	Q	55TH AVE PED BRDG	LIRR MAIN LINE	L	O-PED	3	CITY	12/07/00	4.429	FAIR	13000	\$18,720,000.00	4
2247220	Q	80TH ROAD	LIRR MAIN LINE	L	O	3	STATE	09/14/01	4.873	FAIR	4100	\$5,904,000.00	9
2247230	Q	82ND AVE	LIRR MAIN LINE	L	O	3	STATE	09/14/01	5.442	GOOD	4100	\$5,904,000.00	9
2247240	Q	LEFFERTS BLVD	LIRR MAIN LINE	L	O	3	STATE	09/05/01	5.972	GOOD	5460	\$7,862,400.00	9
2247260	Q	JACKSON AVE	LIRR,AMT,CON NE	L	O	1	STATE	08/02/00	6.316	VGOOD	4517	\$6,504,480.00	2
2247270	Q	21ST STREET	CONRAIL	C	O	6	STATE	07/16/01	5.736	GOOD	17590	\$25,329,600.00	2
2247290	Q	49TH AVE	LIRR,AMT,CON NE	L	O	5	STATE	08/04/00	4.027	FAIR	20200	\$29,088,000.00	2
2247300	Q	THOMPSON AVE	AMTRAK YARD	L	O	14	STATE	08/18/00	5.527	GOOD	61280	\$88,243,200.00	2
2247310	Q	QUEENS BLVD	AMTRAK & LIRR YARD	L	O	19	STATE	10/12/01	3.722	FAIR	92400	\$133,056,000.00	2
2247320	Q	HONEYWELL ST	AMTRAK & LIRR YARD	AL	O	22	STATE	12/07/01	2.328	POOR	98300	\$141,552,000.00	2
2247330	Q	39TH ST (NORTH)	SUNNYSIDE YARDS	AL	O	15	STATE	10/11/01	6.666	VGOOD	48200	\$69,408,000.00	2
2247370	Q	37TH AVE	CONRAIL HELLGATE	C	O	1	STATE	09/25/01	4.818	FAIR	5300	\$7,632,000.00	2
2247380	Q	ROOSEVELT AVE	CONRAIL HELLGATE	C	O	2	STATE	08/07/00	5.097	GOOD	5200	\$7,488,000.00	2
2247390	Q	41ST AVE	CONRAIL HELLGATE	C	O	2	STATE	09/24/01	4.942	FAIR	4000	\$5,760,000.00	2
2247400	Q	WOODSIDE AVE	CONRAIL	C	O	1	STATE	06/25/01	5.066	GOOD	8200	\$11,808,000.00	2
2247410	Q	43RD AVE	CONRAIL	C	O	1	STATE	06/25/01	5.033	GOOD	4800	\$6,912,000.00	2
2247420	Q	44TH AVE	CONRAIL	C	O	1	STATE	06/26/01	5.033	GOOD	5100	\$7,344,000.00	2

INVENTORY SORTED BY B.I.N.

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	INVENTORY SORTED BY B.I.N.									CD
				RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	
2247430	Q	45TH AVE	CONRAIL	C	O	1	STATE	06/27/01	3.918	FAIR	2400	\$3,456,000.00	2
2247440	Q	GRAND AVE	CONRAIL	C	O	1	STATE	07/03/01	4.396	FAIR	3400	\$4,896,000.00	5
2247450	Q	57TH AVE	CONRAIL	C	O	1	STATE	07/02/01	6.195	VGOOD	2400	\$3,456,000.00	5
2247460	Q	CALDWELL AVE	CONRAIL	C	O	1	STATE	08/09/00	6.638	VGOOD	2243	\$3,229,920.00	5
2247470	Q	ELIOT AVE	CONRAIL	C	O	1	STATE	07/05/01	5.25	GOOD	3600	\$5,184,000.00	5
2247480	Q	JUNIPER BLVD SO	CONRAIL	C	O	1	STATE	07/06/01	5.833	GOOD	8500	\$12,240,000.00	5
2247490	Q	69TH ST JUNPR BLVD	CONRAIL	C	O	1	STATE	08/08/00	5.709	GOOD	6175	\$8,892,000.00	5
2247500	Q	METROPOLITAN AVE	CONRAIL	C	O	1	STATE	07/31/01	4.633	FAIR	18650	\$26,856,000.00	5
2247530	Q	ANDREWS AVE	LIRR MONTAUK DIV	L	O	4	STATE	08/06/01	4.241	FAIR	3200	\$4,608,000.00	5
2247540	Q	60TH ST	LIRR MONTAUK DIV	L	O	2	STATE	08/06/01	5.083	GOOD	5340	\$7,689,600.00	5
2247550	Q	ELIOT AVE	LIRR MONTAUK DIV	L	O	2	STATE	08/06/01	5.893	GOOD	9200	\$13,248,000.00	5
2247570	Q	80TH ST	71ST TO 77TH AVE	L	O	5	STATE	06/20/00	5	GOOD	11725	\$16,884,000.00	5
2247590	Q	FOREST PARK DRIVE	LIRR MONTAUK DIV	L	O	5	STATE	08/27/01	5.543	GOOD	6000	\$8,640,000.00	9
2247600	Q	PARK LANE SOUTH	LIRR MONTAUK DIV	AL	O	3	STATE	06/22/00	7	VGOOD	5900	\$8,496,000.00	9
2247620	Q	MYRTLE AVE	ABANDONED LIRR	L	O	3	STATE	01/28/00	5.277	GOOD	6725	\$9,684,000.00	4
2247630	Q	PED BRG NEAR UNION TPK	ABANDONED LIRR		O-PED	8	CITY	08/29/00	5.154	GOOD	900	\$1,296,000.00	5
2247640	Q	39 ST (SOUTH)	AMTRAK & LIRR YARD	AL	O	9	STATE	11/09/01	6.18	VGOOD	34100	\$49,104,000.00	2
2247650	Q	60TH RD PED BRDG	LIRR MAIN LINE	L	O-PED	3	CITY	12/08/00	5.345	GOOD	2293	\$3,301,920.00	5
2247660	Q	FOREST PARK DRIVE	ABANDONED LIRR	L	O	6	STATE	07/27/01	5.253	GOOD	10000	\$14,400,000.00	9
2247680	Q	221ST ST	LIRR N SIDE DIV	L	O	3	STATE	07/26/01	5.882	GOOD	6050	\$8,712,000.00	11
2248019	Q	WOODHAVEN BLVD	ATLANTIC AVE		O	3	STATE	06/29/00	4.472	FAIR	19400	\$27,936,000.00	9
2248020	Q	WHITELAW PED BRDG	CONDUIT AVE		O-PED	7	CITY	09/06/00	4.887	FAIR	5500	\$7,920,000.00	10
2248039	Q	CROSS BAY BLVD	CONDUIT BLVD		O	2	STATE	06/26/01	3.638	FAIR	17000	\$24,480,000.00	10
2248040	Q	LINDEN BLVD	CONDUIT AVE		O	1	STATE	03/20/00	5.266	GOOD	3352	\$4,828,880.00	10
2248129	Q	UNION TPK	CREEDMOORE HOSP RD		O	1	STATE	05/25/01	5.166	GOOD	3500	\$5,040,000.00	13
2248159	Q	WOODHAVEN BLVD	QUEENS BLVD		O	2	STATE	03/24/00	4.307	FAIR	11500	\$16,560,000.00	6
2248160	Q	ELLIOT AVE	QUEENS BLVD		O	2	STATE	07/11/00	4.771	FAIR	13785	\$19,850,400.00	12
2248200	Q	RUST ST	FLUSHING AVE		O	1	STATE	06/06/01	5.546	GOOD	2900	\$4,176,000.00	5
2248220	Q	FLUSHING AV SERVICE	FLUSHING AVE		O	1	STATE	05/22/01	5.05	GOOD	3000	\$4,320,000.00	5
2248230	Q	BEACH CHANNEL DR WB	BEACH CHANNEL DR EB		O	1	STATE	06/15/01	4.533	FAIR	3600	\$5,184,000.00	84
2248240	Q	SERVICE RD TURNAROUND	OVER FLUSHING AVE		O	1	STATE	05/22/01	5.186	GOOD	2900	\$4,176,000.00	5
2248250	Q	102ND ST	HAWTREE BASIN		WO	7	STATE	07/17/01	6.941	VGOOD	3200	\$4,608,000.00	10
2248260	Q	FLUSHING MEADW PARK	MEADOW LAKE & 69TH RD		WO	5	STATE	03/02/00	4.8	FAIR	4200	\$6,048,000.00	81
2248299	Q	INTER PKWY-UNION TPK	AUSTIN ST		O	1	STATE	01/05/00	4.75	FAIR	5900	\$8,496,000.00	9
2248300	Q	71ST AVE	COOPER AVE		O	1	STATE	05/17/01	4.44	FAIR	2800	\$4,032,000.00	5
2248340	Q	FOREST PARK DR	MYRTLE AVE		O	3	STATE	05/08/01	5.19	GOOD	5100	\$7,344,000.00	9
2248369	Q	ROCKAWAY BLVD	THURSTON BASIN		WO	2	STATE	07/31/01	3.947	FAIR	6000	\$8,640,000.00	83
2249040	R	TOMPKINS AVE	B&O RR (ABANDONED)		O	1	STATE	02/29/00	6.515	VGOOD	5096	\$7,338,240.00	1
2249060	R	McCLEAVE AVE	B&O RR (ABANDONED)		O	1	STATE	02/28/00	3.981	FAIR	2500	\$3,600,000.00	2
2249070	R	JOHN ST	B&O RAILROAD	O	O-PED	3	CITY	02/13/01	6.806	VGOOD	5800	\$8,352,000.00	1
2249090	R	MORNINGSTAR ROAD	B&O RAILROAD	O	O	4	STATE	04/24/01	5.508	GOOD	7900	\$11,376,000.00	1
2249100	R	GRANITE AVE	B&O RAILROAD	O	O	4	STATE	02/21/00	6.372	VGOOD	7300	\$10,512,000.00	1
2249110	R	LAKE AVE	B&O RAILROAD	O	O	3	STATE	04/23/01	6	GOOD	5900	\$8,496,000.00	1
2249120	R	SIMONSON AVE	B&O RAILROAD	O	O	3	STATE	04/30/01	6.111	VGOOD	5819	\$8,379,360.00	1
2249130	R	VAN NAME AVE	B&O RAILROAD	O	O	3	STATE	04/25/01	5.389	GOOD	5474	\$7,882,560.00	1
2249140	R	VAN PELT AVE	B&O RAILROAD	O	O	3	STATE	04/27/01	5.779	GOOD	5000	\$7,200,000.00	1
2249160	R	DE HART AVE	B&O RAILROAD	O	O	4	STATE	05/02/01	6.518	VGOOD	6700	\$9,648,000.00	1
2249170	R	UNION AVE	B&O RAILROAD	O	O	4	STATE	05/07/01	5.425	GOOD	6500	\$9,360,000.00	1
2249180	R	HARBOR ROAD	B&O RAILROAD	O	O	4	STATE	05/01/01	6.254	VGOOD	6615	\$9,525,600.00	1
2249200	R	SOUTH AVE	B&O RAILROAD	O	O	5	STATE	06/09/00	2.469	POOR	10100	\$14,544,000.00	1
2249210	R	MAIN ST PED BRDG	SIRT SOUTH SHORE	S	O-PED	9	CITY	03/15/00	4.895	FAIR	400	\$576,000.00	3
2249230	R	TRACY AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	9	CITY	03/13/00	3.968	FAIR	200	\$288,000.00	3
2249240	R	ARTHUR KILL ROAD	SIRT SOUTH SHORE	S	O	1	STATE	06/02/00	4.944	FAIR	3700	\$5,328,000.00	3
2249250	R	BETHEL AV PED BRDG	SIRT SOUTH SHORE	S	O-PED	12	CITY	06/15/00	3.739	FAIR	500	\$720,000.00	3
2249269	R	PAGE AVE	SIRT SOUTH SHORE	S	O	4	STATE	07/26/01	6.361	VGOOD	30420	\$43,804,800.00	3
2249270	R	RICHMMD VALLY ROAD	SIRT SOUTH SHORE	S	O	4	STATE	08/21/01	5.327	GOOD	9300	\$13,392,000.00	3
2249280	R	COZZINS BLVD PED BRDG	SIRT SOUTH SHORE	S	O-PED	7	CITY	03/22/00	4.913	FAIR	200	\$288,000.00	3
2249290	R	SEGUINE AVE	SIRT SOUTH SHORE	S	O	1	STATE	07/31/01	6.468	VGOOD	2200	\$3,168,000.00	3
2249300	R	HUGUENOT AVE	SIRT SOUTH SHORE	S	O	2	STATE	08/02/01	4.818	FAIR	4900	\$7,056,000.00	3
2249320	R	ALBEE AVE	SIRT SOUTH SHORE	S	O	3	STATE	08/04/01	4.786	FAIR	6500	\$9,360,000.00	3
2249330	R	ANNADALE ROAD	SIRT SOUTH SHORE	S	O	2	STATE	08/08/01	4.454	FAIR	4500	\$6,480,000.00	3
2249350	R	NELSON AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	1	CITY	03/14/00	5.176	GOOD	300	\$432,000.00	3
2249360	R	GIFFORDS LANE	SIRT SOUTH SHORE	S	O	1	STATE	06/19/00	5.718	GOOD	3042	\$4,380,480.00	3
2249370	R	GREAVES AVE	SIRT SOUTH SHORE	S	O	3	STATE	07/11/01	7	VGOOD	6100	\$8,784,000.00	3
2249380	R	GUYON AVE	SIRT SOUTH SHORE	S	O	3	STATE	08/14/01	4.836	FAIR	6900	\$9,936,000.00	3
2249390	R	CEDARVIEW AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	5	CITY	03/14/00	4.684	FAIR	600	\$864,000.00	3
2249400	R	BEACH AVE	SIRT SOUTH SHORE	S	O	2	STATE	08/15/01	5.818	GOOD	3700	\$5,328,000.00	2
2249410	R	ROSS AVE	SIRT SOUTH SHORE	S	O	2	STATE	07/27/01	5.5	GOOD	3800	\$5,472,000.00	2
2249420	R	ROSE AVE	SIRT SOUTH SHORE	S	O	2	STATE	07/30/01	5.712	GOOD	3800	\$5,472,000.00	2
2249430	R	NEW DORP LANE	SIRT SOUTH SHORE	S	O	2	STATE	08/16/01	5.06	GOOD	7600	\$10,944,000.00	2
2249440	R	BANCROFT AVE	SIRT SOUTH SHORE	S	O	3	STATE	08/22/01	5.622	GOOD	5900	\$8,496,000.00	2
2249450	R	FREMONT AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	3	CITY	03/29/00	4.821	FAIR	800	\$1,152,000.00	2
2249460	R	LINCOLN AVE	SIRT SOUTH SHORE	S	O	1	STATE	08/23/01	5.807	GOOD	4500	\$6,480,000.00	2
2249470	R	MIDLAND AVE	SIRT SOUTH SHORE	S	O	1	STATE	08/27/01	5.634	GOOD	3000	\$4,320,000.00	2
2249480	R	FINGERBOARD ROAD	SIRT SOUTH SHORE	S	O	2	STATE	08/28/01	6.777	VGOOD	5100	\$7,344,000.00	2
2249490	R	CLOVE ROAD	SIRT SOUTH SHORE	S	O	3	STATE	06/20/00	6.222	VGOOD	8200	\$11,808,000.00	2
2249510	R	TOMPKINS AVE	WILLOW AVE, SIRT		O	2	STATE	06/21/00	5.915	GOOD	5378	\$7,744,320.00	1
2249520	R	HANNAH ST	SIRT SOUTH SHORE	S	O	10	STATE	09/07/01	5.322	GOOD	10020	\$14,428,800.00	1
2249530	R	MINTHORNE ST PED BRDG	SIRT SOUTH SHORE	S	O-PED	23	CITY	10/10/00	7	VGOOD	1600	\$2,304,000.00	1
2249580	R	BELFIELD AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	5	CITY	03/13/00	4.333	FAIR	400	\$576,000.00	3
2249760	R	MARTLINGS AVE	RICHMOND LAKE DAM		WO	2	STATE	05/11/01	4.933	FAIR	7000	\$10,080,000.00	1
2249800	R	FOREST AVE	CLOVE LAKES PK STREAM		WO	1	STATE	10/01/01	4.766	FAIR	1600	\$2,304,000.00	1
2249810	R	HYLAN BLVD	LEMON CREEK		WO	1	STATE	09/12/00	6.625	VGOOD	11400	\$16,416,000.00	3
2249820	R	ARTHUR KILL ROAD	ARTHUR KILL STREAM		WO	1	STATE	04/19/01	4.122	FAIR	2000	\$2,880,000.00	3
2249840	R	TOMPKINS AVE	GREENFIELD AVE		O	1	STATE	03/01/00	5.744	GOOD	2562	\$3,689,280.00	1

**INVENTORY SORTED BY B.I.N.**

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL	BRIDGE	SPANS	RATING	INSPECTION	RATING	VERBAL	DECK	REPLACEMENT	CD
				ROAD	TYPE		SOURCE						
2249860	R	SLATER BLVD	NEW CREEK		WO	1	STATE	04/20/01	4.264	FAIR	3500	\$5,040,000.00	2
2249870	R	TRAVIS AVE	MAIN CREEK		WO	1	STATE	02/21/00	4.218	FAIR	1700	\$2,448,000.00	2
2249880	R	CHELSEA ROAD	SAWMILL CREEK		WO	1	STATE	05/24/01	7	VGOOD	2197	\$3,163,680.00	2
2257569	M	MILLER HIGHWAY	TERRAIN		A	63	STATE	08/28/01	5.07	GOOD	287539	\$414,056,160.00	7
2266129	Q	WINCHESTER BLVD S.B.	BCIP		A	1	STATE	03/21/00	4.659	FAIR	4400	\$6,336,000.00	11
2266139	Q	WINCHESTER BLVD N.B.	BCIP		A	1	STATE	03/22/00	4.795	FAIR	6400	\$9,216,000.00	11
2266149	Q	HEMPSTEAD AVE	CROSS ISLAND PKWY		A	2	STATE	05/12/00	4.076	FAIR	9500	\$13,680,000.00	13
2266160	Q	678I SB TO BCIP EB	ACCESS RD FROM 678I		A	1	STATE	04/05/00	4.593	FAIR	2300	\$3,312,000.00	7
2266229	M	HHP	PED UNDERPASS @ 148 ST		A	1	STATE	04/11/00	4.714	FAIR	1800	\$2,592,000.00	9
2266230	M	HHP	PED UNDERPASS INWD PK		A	1	STATE	02/17/00	4.909	FAIR	800	\$1,152,000.00	12
2266240	M	HHP	PED UNDERPASS INWD PK		A	1	STATE	03/14/00	5.857	GOOD	1100	\$1,584,000.00	12
2266540	B	BRUCKNER BLVD OVRPAS	133RD - 135TH ST		A	2	STATE	06/19/01	4.548	FAIR	32900	\$47,376,000.00	1
226672A	M	W 31ST ST	AMTRAK LAYUP TRACKS	A	O	9	STATE	08/28/00	3.523	FAIR	8800	\$12,672,000.00	4
2266770	Q	CROSS ISLAND PKWY	LAURELTON PKWY		A	1	STATE	05/05/00	5.111	GOOD	9508	\$13,691,520.00	13
2267130	M	RIVERSIDE DRIVE	W 145TH ST		O	1	STATE	04/02/01	4.866	FAIR	5800	\$8,352,000.00	9
2267160	Q	ROOSEVELT AVE	FLUSHING MDW PK ROAD		O	4	STATE	06/12/01	4.746	FAIR	7280	\$10,483,200.00	84
2267199	Q	FRANCIS LEWIS BLVD	PARK ROAD		O	1	STATE	06/14/01	5.333	GOOD	7085	\$10,202,400.00	8
2267240	M	HRD NB RAMP	HARLEM RIVER DR		A	51	STATE	10/18/01	3	POOR	112860	\$162,518,400.00	12
2267250	M	HHP	AMTRAK 30TH ST LINE	A	A	55	STATE	07/11/00	3.451	FAIR	40000	\$57,600,000.00	7
2267380	M	WEST STREET	RECTOR ST		AT	1	STATE	08/20/01	5.033	GOOD	4320	\$6,220,800.00	1
2267717	M	79 ST PED PLAZA	79 ST BT BASIN GAR		A	10	STATE	04/25/01	4.592	FAIR	27400	\$39,456,000.00	7
2267718	M	79 ST TRAFFIC CIRC	79 ST PED PLAZA		A	34	STATE	09/26/01	3.803	FAIR	24130	\$34,747,200.00	7
226771A	M	79 ST RAMP TO HHP	79 ST BT BASIN GAR		AR	4	STATE	05/22/01	4.241	FAIR	3131	\$4,508,640.00	7
226771B	M	79 ST RAMP TO GAR	79 ST BT BASIN GAR		AR	21	STATE	09/26/01	4.403	FAIR	7114	\$10,244,160.00	7
226771C	M	GAR RAMP TO 79 ST	79 ST BT BASIN GAR		AR	21	STATE	10/08/01	4.596	FAIR	9095	\$13,096,800.00	7
226771D	M	SB HHP RAMP TO 79 ST	79 ST BT BASIN GAR		AR	4	STATE	05/22/01	4.37	FAIR	2601	\$3,745,440.00	7
2267860	K	BROOKLYN BR APPROACH	SANDS STREET		O	1	STATE	11/21/00	4.66	FAIR	6490	\$9,345,600.00	2
2268350	K	BROOKLYN PROMENADE	278I N.B. (B.Q.E.)		A-PED	35	CITY	08/04/00	4.286	FAIR	46184	\$66,504,960.00	6
2268480	M	CHAMBERS ST PED BRDG	WEST SIDE HWY		O-PED	8	CITY	06/05/00	6.623	VGOOD	3344	\$4,815,360.00	1
2268497	K	278I W.B. (B.Q.E.)	FURMAN ST		A	45	STATE	06/11/01	4.375	FAIR	78022	\$112,351,680.00	2
2268498	K	278I E.B. (B.Q.E.)	278I W.B. (B.Q.E.)		A	69	STATE	06/20/01	3.827	FAIR	120734	\$173,856,960.00	2
2268507	K	278I W.B. (B.Q.E.)	YORK ST		A	6	STATE	06/25/01	4.205	FAIR	9380	\$13,507,200.00	2
2268508	K	278I E.B. (B.Q.E.)	278I W.B. (B.Q.E.)		A	11	STATE	05/21/01	3.62	FAIR	17956	\$25,856,640.00	2
2268517	K	278I W.B. (B.Q.E.)	FURMAN ST		A	7	STATE	05/16/01	4.205	FAIR	10988	\$15,822,720.00	2
2268518	K	278I E.B. (B.Q.E.)	278I W.B. (B.Q.E.)		A	5	STATE	05/17/01	4.285	FAIR	8375	\$12,060,000.00	2
2268650	M	FDR NB 42ND TO 49ST	EAST RIVER		A	119	STATE	08/27/01	4.415	FAIR	30767	\$44,304,480.00	6
2268760	M	PS-5 PEDESTRIAN BR.	TENTH AVENUE		O-PED	5	CITY	06/19/01	6.592	VGOOD	1500	\$2,160,000.00	12
2268770	Q	SPRINGFIELD BLVD	EQUES. PATH (ABAND.)		O	1	STATE	06/29/01	4.777	FAIR	1470	\$2,116,800.00	13
2268920	R	AMBOY ROAD	LEMON CREEK		WO	1	STATE	02/07/00	7	VGOOD	1444	\$2,079,360.00	3
2268930	M	MORRIS ST PED BRDG	BKLN-BATTERY TUNN PLZ		A-PED	3	CITY	07/11/00	4.535	FAIR	1200	\$1,728,000.00	1
2269030	B	MATTHEWSON ROAD	MAC CRACKEN AVE		O	15	STATE	10/18/00	3.758	FAIR	14880	\$21,427,200.00	7
2269190	M	W.70TH STREET	AMTRAK		O	3	STATE	08/13/01	6.944	VGOOD	17433	\$25,103,520.00	7
2269210	M	W.68TH STREET	AMTRAK		O	3	STATE	08/13/01	6.796	VGOOD	5349	\$7,702,560.00	7
2269260	K	W. 8TH STREET	SURF AVE.		O-PED	55	CITY	06/12/00	4.111	FAIR	14742	\$21,228,480.00	13
2300130	Q	HOOK CREEK	HOOK CREEK BRIDGE		W	3	STATE	07/18/01	6.474	VGOOD	18302	\$26,354,880.00	13
7703720	Q	216TH ST PED BRDG	LIRR PORT WASH BRANCH	L	O-PED	5	CITY	12/07/00	4.102	FAIR	400	\$576,000.00	11
7705510	Q	167TH ST PED BRDG	LIRR PORT WASH BRANCH	L	O-PED	3	CITY	12/05/00	4.438	FAIR	600	\$864,000.00	7
M00001	M	PEDESTRIAN TUNNEL	BROADWAY TO		O-PED	1	CITY	07/12/00	4.2	FAIR	2000	\$2,880,000.00	12
M00003	M	HHP ON/OFF RMP-79 WB	PEDESTRIAN PATH		A	1	CITY	11/16/00	4.767	FAIR	900	\$1,296,000.00	7
M00004	M	HHP ON/OFF RMP-79 EB	PEDESTRIAN PATH		A	1	CITY	07/20/00	4.933	FAIR	900	\$1,296,000.00	7
Q00002	Q	BCIP	PATH OPPOSITE 88TH RD		A	1	CITY	03/20/01	5.633	GOOD	1200	\$1,728,000.00	13
<b>752 BRIDGES</b>						<b>4564</b>	<b>SPANS</b>					<b>\$20,589,892,320.00</b>	

INVENTORY SORTED BY BOROUGH AND COMMUNITY BOARD DISTRICT

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD	
224005B	B	TO BRUCKNER BLVD	RELIEF		OR	5	STATE	09/27/01	4.208	FAIR	12100	\$17,424,000.00	1	
224006A	B	TO BRUCKNER BLVD	RELIEF		OR	11	STATE	05/18/01	2.864	POOR	11100	\$15,984,000.00	1	
2241000	B	WESTCHESTER AVE	CONRAIL PT MORRIS	C	O	1	STATE	09/05/00	5.17	GOOD	1740	\$2,505,600.00	1	
2241010	B	E 156TH STREET	CONRAIL PT MORRIS	C	O	1	STATE	09/06/00	4.555	FAIR	2400	\$3,456,000.00	1	
2241020	B	E 161ST STREET	CONRAIL PT MORRIS	C	O	1	STATE	06/06/01	3.454	FAIR	12800	\$18,432,000.00	1	
2241040	B	THIRD AVE	CONRAIL PT MORRIS	C	O	1	STATE	09/08/00	4.625	FAIR	2700	\$3,888,000.00	1	
2241050	B	E 149TH ST/JACKSON AVE	CONRAIL PT MORRIS	C	O	1	STATE	09/12/00	5.25	GOOD	65000	\$93,600,000.00	1	
2241060	B	ST. MARYS & CONCORD	CONRAIL PT MORRIS	C	O	1	STATE	09/12/00	5.333	GOOD	4500	\$6,480,000.00	1	
2241070	B	WALES AVE	CONRAIL PT MORRIS	C	O	1	STATE	09/13/00	6.566	VGOOD	2300	\$3,312,000.00	1	
2241080	B	SOUTHERN BLVD	CONRAIL PT MORRIS	C	O	1	STATE	09/14/00	4.185	FAIR	3900	\$5,616,000.00	1	
2241099	B	BRUCKNER BLVD	CONRAIL PT MORRIS	C	O	1	STATE	09/15/00	6.796	VGOOD	6700	\$9,648,000.00	1	
2241129	B	E 149TH ST	AMTRAK	A	O	2	STATE	05/22/00	4.774	FAIR	12575	\$18,108,000.00	1	
2241550	B	E 144TH ST	METRO NORTH RR HAR	M	O	2	STATE	11/02/01	6.708	VGOOD	8290	\$11,937,600.00	1	
2241560	B	E 149TH ST	METRO NORTH RR HAR	M	O	8	STATE	03/10/00	4.736	FAIR	27900	\$40,176,000.00	1	
2241590	B	CONCOURSE VILL AVE	METRO NORTH RR HAR	M	O	1	STATE	03/02/00	3.906	FAIR	17800	\$25,632,000.00	1	
2241600	B	E 158TH ST	METRO NORTH RR HAR	M	O	1	STATE	11/02/01	5.233	GOOD	3400	\$4,896,000.00	1	
2241610	B	E 161ST ST	METRO NORTH RR HAR	M	O	1	STATE	11/02/01	5.383	GOOD	6600	\$9,504,000.00	1	
2242260	B	EAGLE AVE	E 161ST ST		O	1	STATE	03/21/00	5.468	GOOD	2800	\$4,032,000.00	1	
2242299	B	GRAND CONCOURSE	E 138TH ST		O	1	STATE	06/04/01	5.6	GOOD	9500	\$13,680,000.00	1	
2266540	B	BRUCKNER BLVD OVRPAS	133RD - 135TH ST		A	2	STATE	06/19/01	4.548	FAIR	32900	\$47,376,000.00	1	
2066671	B	BRUCKNER EXPWY SB	BRONX RIVER		WM	3	STATE	07/20/01	5.527	GOOD	12400	\$17,856,000.00	2	
2066672	B	BRUCKNER EXPWY NB	BRONX RIVER		WM	8	STATE	07/30/01	4.761	FAIR	22300	\$32,112,000.00	2	
2075351	B	BRUCKNER EXPWY SB	AMTRAK	A	A	1	STATE	07/14/00	3.718	FAIR	11600	\$16,704,000.00	2	
2075352	B	BRUCKNER EXPWY NB	AMTRAK	A	A	1	STATE	07/12/00	3.484	FAIR	10900	\$15,696,000.00	2	
2076929	B	BRUCKNER EXPWY	AMTRAK	A	A	1	STATE	07/02/01	4.9	FAIR	3800	\$5,472,000.00	2	
2240180	B	WESTCHESTER AVE	BRONX RIVER		W	1	STATE	07/19/01	5.015	GOOD	5476	\$7,885,440.00	2	
2241139	B	LEGGETT AVE	AMTRAK	A	O	3	STATE	06/21/00	4.69	FAIR	28300	\$40,752,000.00	2	
2241159	B	LONGWOOD AVE	AMTRAK	A	O	1	STATE	05/24/00	6.041	VGOOD	10625	\$15,300,000.00	2	
2241169	B	LAFAYETTE AVE	AMTRAK	A	O	1	STATE	05/25/00	5.825	GOOD	12000	\$17,280,000.00	2	
2241170	B	TIFFANY ST	AMTRAK	A	O	1	STATE	08/01/01	5.941	GOOD	7267	\$10,464,480.00	2	
2241180	B	BARRETTO ST	AMTRAK	A	O	1	STATE	05/26/00	6.281	VGOOD	5313	\$7,560,720.00	2	
2241190	B	HUNTS POINT AVE	AMTRAK	A	O	1	STATE	06/02/00	5.25	GOOD	13700	\$19,728,000.00	2	
2241200	B	FAILE ST	AMTRAK	A	O	1	STATE	06/02/00	6.156	VGOOD	6208	\$8,939,520.00	2	
2241210	B	BRYANT AVE	AMTRAK	A	O	1	STATE	06/28/01	3.152	FAIR	5300	\$7,632,000.00	2	
2241230	B	WESTCHESTER AVE	AMTRAK	A	O	5	STATE	06/02/00	6.25	VGOOD	15600	\$22,464,000.00	2	
2241030	B	E 163RD STREET	CONRAIL PT MORRIS	C	O	1	STATE	09/07/00	5.129	GOOD	3200	\$4,608,000.00	3	
2241110	B	MELROSE AVE	CONRAIL PT MORRIS	C	O	11	STATE	08/06/01	6.208	VGOOD	37854	\$54,509,760.00	3	
2241620	B	E 162ND ST	METRO NORTH RR HAR	M	O	1	STATE	03/01/00	4.983	FAIR	4700	\$6,768,000.00	3	
2241630	B	E 165TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/29/00	4.5	FAIR	16400	\$23,616,000.00	3	
2241650	B	E 167TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/28/00	5.862	GOOD	3363	\$4,842,720.00	3	
2241660	B	E 168TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/25/00	4.921	FAIR	7700	\$11,088,000.00	3	
2241670	B	E 169TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/24/00	4.734	FAIR	3300	\$4,752,000.00	3	
2241680	B	E 170TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/24/00	6.45	VGOOD	3150	\$4,536,000.00	3	
2241700	B	ST PAULS PL PED BRDG	METRO NORTH RR HAR	M	O-PED	2	CITY	08/03/00	6.296	VGOOD	600	\$864,000.00	3	
2241710	B	CLAREMONT PKWY	METRO NORTH RR HAR	M	O	1	STATE	02/23/00	4.421	FAIR	6300	\$9,072,000.00	3	
2241720	B	E 173RD ST	METRO NORTH RR HAR	M	O	1	STATE	02/22/00	4.65	FAIR	3000	\$4,320,000.00	3	
2241740	B	E 175TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/21/00	4.031	FAIR	3600	\$5,184,000.00	3	
2076640	B	DEPOT PLACE	CONRAIL HUDSON DIV	C	O	11	STATE	10/31/01	5.611	GOOD	30192	\$43,476,480.00	4	
2241409	B	GRAND CONCOURSE	METRO NORTH RR HUD	TCM	O	1	STATE	05/24/00	3.625	FAIR	16100	\$23,184,000.00	4	
2241410	B	WALTON AVE	METRO NORTH RR HUD	M	O	1	STATE	03/15/00	4.234	FAIR	3600	\$5,184,000.00	4	
2241420	B	GERARD AVE	METRO NORTH RR HUD	M	O	1	STATE	03/03/00	6.765	VGOOD	5063	\$7,290,720.00	4	
2241430	B	RIVER AVE	METRO NORTH RR HUD	M	O	1	STATE	11/02/01	6.421	VGOOD	5040	\$7,257,600.00	4	
2242200	B	YANKEE STDM PED BRDG	E 153 ST, METRO NORTH	M	O-PED	5	CITY	07/31/00	5	GOOD	4200	\$6,048,000.00	4	
2242259	B	GRAND CONCOURSE	E 161ST ST		O	1	STATE	10/10/00	3.5	FAIR	24100	\$34,704,000.00	4	
2242280	B	GRAND CONCOURSE	E 167TH ST		O	2	STATE	07/25/00	4.719	FAIR	42900	\$61,776,000.00	4	
2242300	B	GRAND CONCOURSE	E 170TH ST		O	2	STATE	05/12/00	4.754	FAIR	39300	\$56,592,000.00	4	
2242319	B	GRAND CONCOURSE	E 174TH ST		T	O	1	STATE	03/24/00	4.133	FAIR	14900	\$21,456,000.00	4
2242329	B	GRAND CONCOURSE	E 175TH ST		T	O	1	STATE	09/12/00	4.466	FAIR	11900	\$17,136,000.00	4
2241460	B	W TREMONT AVE	METRO NORTH RR HUD	M	O	8	STATE	03/28/00	5.029	GOOD	12900	\$18,576,000.00	5	
2242330	B	GRAND CONCOURSE	E TREMONT AVE		O	2	STATE	10/19/01	6.483	VGOOD	11700	\$16,848,000.00	5	
2242350	B	EAST FORDHAM RD	GRAND CONCOURSE		O	1	STATE	02/21/00	4.566	FAIR	10300	\$14,832,000.00	5	
2242360	B	GRAND CONCOURSE	BURNSIDE AVE		O	2	STATE	09/29/00	4.588	FAIR	8400	\$12,096,000.00	5	
2241760	B	E TREMONT AVE	METRO NORTH RR HAR	M	O	1	STATE	05/15/01	3.593	FAIR	7300	\$10,512,000.00	6	
2241770	B	E 178TH ST PED BRDG	METRO NORTH RR HAR	M	O-PED	5	CITY	11/27/01	6.73	VGOOD	700	\$1,008,000.00	6	
2241780	B	E 179TH ST PED BRDG	METRO NORTH RR HAR	M	O-PED	6	CITY	08/02/00	6.774	VGOOD	700	\$1,008,000.00	6	
2241790	B	E 180TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/17/00	4.109	FAIR	5000	\$7,200,000.00	6	
2241800	B	E 183TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/16/00	4.328	FAIR	3600	\$5,184,000.00	6	
2241810	B	E 188TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/14/00	4.312	FAIR	5300	\$7,632,000.00	6	
2241820	B	E 187TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/15/00	4.843	FAIR	3800	\$5,472,000.00	6	
2241839	B	E 189TH ST	METRO NORTH RR HAR	M	O	1	STATE	11/02/01	6.533	VGOOD	43157	\$62,146,080.00	6	
2242030	B	CROTONA AVE	BRONX PELHAM PKWY		O	2	STATE	02/07/00	5.184	GOOD	7600	\$10,944,000.00	6	
2242149	B	E TREMONT AVE	BRONX RIVER		WO	2	STATE	04/14/00	4.777	FAIR	12900	\$18,576,000.00	6	
2242400	B	E 180TH ST	BRONX RIVER		WO	1	STATE	07/03/00	4.809	FAIR	4500	\$6,480,000.00	6	
2230287	B	JEROME AVE	MOSHOLU PARKWAY		T	A	3	STATE	06/25/01	5.052	GOOD	11800	\$16,992,000.00	7
2241470	B	W FORDHAM RD	METRO NORTH RR HUD	M	O	5	STATE	10/27/01	6.333	VGOOD	16052	\$23,114,880.00	7	
2241489	B	W 225TH ST	CONRAIL PUTNAM	C	O	2	STATE	06/01/00	5.462	GOOD	10900	\$15,696,000.00	7	
2241930	B	BEDFORD PARK BLVD	NYCTA IND YARDS		T	O	17	STATE	08/31/00	6.5	VGOOD	46300	\$66,672,000.00	7
2241940	B	W 205TH ST	NYCTA IND YARDS		T	O	7	STATE	11/06/00	6.666	VGOOD	37800	\$54,432,000.00	7
2242340	B	GRAND CONCOURSE	EAST KINGSBRIDGE		O	2	STATE	09/14/00	4.714	FAIR	16500	\$23,760,000.00	7	
2242370	B	GRAND CONCOURSE	BEDFORD PARK BLVD		O	1	STATE	05/09/00	4.823	FAIR	8418	\$12,121,920.00	7	
2242380	B	GRAND CONCOURSE	E 204TH ST		O	1	STATE	06/05/01	5.828	GOOD	9272	\$13,351,680.00	7	
2269030	B	MATTHEWSON ROAD	MAC CRACKEN AVE		O	15	STATE	10/18/00	3.758	FAIR	14880	\$21,427,200.00	7	
2229440	B	HHP	KAPPOCK ST		A	1	STATE	09/21/01	4.655	FAIR	3900	\$5,616,000.00	8	
2229450	B	232ND ST	HHP		A	2	STATE	10/12/01	4.342	FAIR	4900	\$7,056,000.00	8	
2229460	B	236TH ST PED BRDG	HHP		A-PED	3	CITY	11/13/01	4.672	FAIR	2500	\$3,600,000.00	8	
2229470	B	239TH ST	HHP		A	2	STATE	08/02/01	4.71	FAIR	6100	\$8,784,000.00	8	
2229480	B	MANHATTAN COLL PKWY	HHP		A	3	STATE	06/26/01	4.184	FAIR	6200	\$8,928,000.00	8	
2229490	B	246TH ST	HHP		A	2	STATE	06/26/01	4.552	FAIR	5600	\$8,064,000.00	8	
2229500	B	252ND ST	HHP		A	2	STATE	01/14/00	4.342	FAIR	4500	\$6,480,000.00	8	

INVENTORY SORTED BY BOROUGH AND COMMUNITY BOARD DISTRICT

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2229510	B	RIVERDALE AVE	HHP		A	2	STATE	10/09/01	4.052	FAIR	5200	\$7,488,000.00	8
2229520	B	FIELDSTON ROAD	HHP		A	1	STATE	10/10/01	4.793	FAIR	6600	\$9,504,000.00	8
2229530	B	HHP	BROADWAY		A	1	STATE	10/11/01	4.595	FAIR	7500	\$10,800,000.00	8
2241490	B	W 230TH ST	CONRAIL PUTNAM	C	O	1	STATE	04/16/01	5.843	GOOD	5600	\$8,064,000.00	8
2241509	B	W 231ST ST	CONRAIL PUTNAM	C	O	1	STATE	10/06/00	5.764	GOOD	4723	\$6,801,120.00	8
2241510	B	W 233RD ST	CONRAIL PUTNAM	C	O	1	STATE	04/11/01	5.47	GOOD	3760	\$5,414,400.00	8
2241520	B	W 234TH ST	CONRAIL PUTNAM	C	O	1	STATE	05/23/01	5.568	GOOD	3770	\$5,428,800.00	8
1066510	B	BRUCKNER EXP.(2066510)	WESTCHESTER CREEK		WM	17	STATE	07/27/01	3.835	FAIR	39400	\$56,736,000.00	9
2066720	B	E 174TH ST	SHERIDAN EXPWY/AMTRAK	A	A	13	STATE	06/15/00	4.486	FAIR	47430	\$68,299,200.00	9
206672A	B	174TH ST-NTH PED BRDG	8951 - SHERIDAN EXPWY		A-PED	4	CITY	12/12/00	4.958	FAIR	1800	\$2,592,000.00	9
206672B	B	174TH ST-STH PED BRDG	8951 - SHERIDAN EXPWY		A-PED	4	CITY	12/12/00	4.0903	FAIR	1900	\$2,736,000.00	9
2241269	B	E 177TH ST	AMTRAK	A	O	3	STATE	06/15/00	5.43	GOOD	16606	\$23,912,640.00	9
2241270	B	EAST TREMONT AVE	AMTRAK	A	O	2	STATE	06/16/00	5.791	GOOD	22300	\$32,112,000.00	9
2241329	B	WHITE PLAINS ROAD	AMTRAK	A	O	1	STATE	06/24/00	5.046	GOOD	6900	\$9,936,000.00	9
2241330	B	UNIONPORT ROAD	AMTRAK	A	O	1	STATE	06/24/00	4.906	FAIR	4400	\$6,336,000.00	9
2075820	B	E TREMONT AVE	HUTCHINSON RVR PKWY		A	2	STATE	08/14/01	4.152	FAIR	10200	\$14,688,000.00	10
2075837	B	WESTCHESTER AVE	HUTCHINSON RVR PKWY		A	2	STATE	05/21/01	4.388	FAIR	15858	\$22,835,520.00	10
2075849	B	BRONX PELHAM PKWY	HUTCHINSON RVR PKWY		A	2	STATE	06/30/00	4.184	FAIR	17600	\$25,344,000.00	10
2075859	B	HUTCHINSON RVR PKWY	HUTCHINSON RIVER		WM	7	STATE	10/13/00	5.375	GOOD	60500	\$87,120,000.00	10
2076109	B	BE NB SERVICE RD	HUTCHINSON RVR PKWY		A	2	STATE	10/09/01	4.736	FAIR	7800	\$11,232,000.00	10
2076129	B	BE SB SERVICE RD	HUTCHINSON RVR PKWY		A	2	STATE	02/09/00	5	GOOD	7100	\$10,224,000.00	10
2241390	B	SHORE RD CIRCLE	AMTRAK	A	O	2	STATE	06/29/01	3.597	FAIR	4800	\$6,912,000.00	10
2241959	B	HUTCHINSON RVR PKWY	AMTRAK	A	O	1	STATE	06/26/00	6.237	VGGOOD	15444	\$22,239,360.00	10
2229560	B	BRONX PELHAM PKWY	AMTRAK,METRO NORTH	MA	A	3	STATE	07/06/00	4.861	FAIR	24591	\$35,411,040.00	11
2241369	B	WILLIAMSBRIDGE RD	AMTRAK	A	O	2	STATE	06/20/00	4.776	FAIR	10400	\$14,976,000.00	11
2241910	B	GUN HILL ROAD	NYCTA-DYRE AVE LN	T	O	2	STATE	08/29/00	6.906	VGGOOD	6300	\$9,072,000.00	11
1067150	B	NEREID AVE (2241880)	BRONX RIVER PKWY	M	O	10	STATE	11/20/01	4.21	FAIR	57750	\$83,160,000.00	12
2229579	B	BOSTON POST ROAD	HUTCHINSON RIVER		W	14	STATE	07/13/01	4.611	FAIR	95700	\$137,808,000.00	12
2241860	B	GUN HILL RD	METRO NORTH RR HAR	M	O	2	STATE	03/09/00	4.279	FAIR	9000	\$12,960,000.00	12
2241870	B	E 233RD ST	METRO NORTH RR HAR	M	O	1	STATE	03/16/00	5.156	GOOD	7664	\$11,036,160.00	12
2241890	B	E 241ST ST	BRP, METRO NORTH HAR	M	O	28	STATE	11/15/01	4.736	FAIR	49500	\$71,280,000.00	12
2241900	B	EASTCHESTER ROAD	NYCTA-DYRE AVE LN	T	O	3	STATE	02/18/00	5.138	GOOD	13500	\$19,440,000.00	12
2242071	B	BRONX BLVD S.B.	BRONX RIVER		WO	1	STATE	04/13/00	4.7	FAIR	1800	\$2,592,000.00	12
2242072	B	BRONX BLVD N.B.	BRONX RIVER		WO	1	STATE	05/17/00	4.766	FAIR	1800	\$2,592,000.00	12
2242081	B	BRONX BLVD S.B.	BRONX RIVER		WO	1	STATE	05/16/00	4.466	FAIR	2800	\$4,032,000.00	12
2242082	B	BRONX BLVD N.B.	BRONX RIVER		WO	1	STATE	05/16/00	4.466	FAIR	2800	\$4,032,000.00	12
2242430	B	GUN HILL ROAD	BRONX BLVD		O	4	STATE	07/12/00	5.052	GOOD	9400	\$13,536,000.00	12
2242440	B	GUN HILL ROAD	BRONX RIVER		WO	1	STATE	03/09/00	5.3	GOOD	8700	\$12,528,000.00	12
2242459	B	E 233RD ST	BRONX RIVER		WO	1	STATE	05/18/00	4.433	FAIR	7000	\$10,080,000.00	12
2242460	B	E 233RD ST	ENTR RD BNX RVR PKWY		O	1	STATE	01/26/00	5.6	GOOD	5300	\$7,632,000.00	12
2229540	B	VAN CRTLDT PARK	HHP		A-PED	2	CITY	10/09/01	4.565	FAIR	3900	\$5,616,000.00	26
2229550	B	VAN CRTLDT EQUES	HHP		A-PED	2	CITY	10/09/01	4.825	FAIR	2100	\$3,024,000.00	26
2230290	B	MOSHOLU PARKWAY	EQUESTRIAN PATH		A	1	STATE	01/20/00	4.724	FAIR	4300	\$6,192,000.00	26
2230300	B	MOSHOLU PARKWAY	CONRAIL (ABANDONED)	C	A	1	STATE	09/18/00	4.229	FAIR	5200	\$7,488,000.00	26
2230310	B	MOSHOLU PARKWAY	SB RAMP TO HHP		A	2	STATE	10/30/01	5.243	GOOD	7400	\$10,656,000.00	26
2065629	B	BRONX RVR PKWY	BOSTON RD BX ZOO		A	1	STATE	09/20/01	5.275	GOOD	6300	\$9,072,000.00	27
2230250	B	MOSHOLU PARKWAY	BRONX RIVER		A	5	STATE	01/04/00	4.263	FAIR	16300	\$23,472,000.00	27
2230260	B	MOSHOLU PARKWAY	METRO NORTH	M	A	1	STATE	03/17/00	6.484	VGGOOD	8880	\$12,787,200.00	27
2230270	B	MOSHOLU PARKWAY	WEBSTER AVE		A	1	STATE	04/12/01	6.015	VGGOOD	8480	\$12,211,200.00	27
2241259	B	204TH ST PED BRDG	METRO NORTH RR HAR	M	O-PED	1	CITY	08/01/00	3.95	FAIR	4700	\$6,768,000.00	27
2241840	B	BEDFORD PARK BLVD	METRO NORTH RR HAR	M	O	1	STATE	03/07/00	4.616	FAIR	6400	\$9,216,000.00	27
2242010	B	BRONX PELHAM PKWY	BRONX RIVER		W	1	STATE	07/05/00	4.931	FAIR	9200	\$13,248,000.00	27
2242029	B	SOUTHERN BLVD	BRONX PELHAM PKWY		O	2	STATE	02/04/00	4.447	FAIR	12900	\$18,576,000.00	27
2242099	B	PARK ROAD (204TH ST)	BRONX RIVER		W	1	STATE	07/07/00	4.172	FAIR	4700	\$6,768,000.00	27
2242100	B	BOTANICAL GARDEN ROAD	TWIN LAKES		O-PED	1	STATE	04/12/00	4.966	FAIR	2200	\$3,168,000.00	27
2242110	B	BOSTON ROAD	BRONX RIVER		WO	1	STATE	04/07/00	4.25	FAIR	6200	\$8,928,000.00	27
2242210	B	S OF ALLERTON AVE	BRONX RIVER		WO	3	STATE	03/21/00	4.763	FAIR	6200	\$8,928,000.00	27
2242220	B	SOUTHERN BLVD	BRONX RIVER		W	2	STATE	03/20/00	4.21	FAIR	4800	\$6,912,000.00	27
2240200	B	SHORE ROAD	HUTCHINSON RIVER		WM	7	STATE	10/31/00	3.985	FAIR	4800	\$120,000,000.00	28
2240210	B	CITY ISLAND ROAD	EASTCHESTER BAY		W	7	STATE	10/04/01	3.472	FAIR	28900	\$41,616,000.00	28
1240090	BM	MACOMBS DAM BRIDGE	HARLEM RIVER		WM	52	STATE	10/12/01	2.722	POOR	139100	\$200,304,000.00	10
2240089	BM	145TH ST BRIDGE	HARLEM RIVER		WM	8	STATE	05/30/00	3.347	FAIR	56700	\$81,648,000.00	10
2240059	BM	WILLIS AVENUE	HARLEM RIVER		WM	26	STATE	07/13/01	3.152	FAIR	94700	\$136,368,000.00	11
2240069	BM	THIRD AVE BRIDGE	HARLEM RIVER		WM	32	STATE	08/01/01	3.013	FAIR	79500	\$115,128,000.00	11
2240079	BM	MADISON AVE BRIDGE	HARLEM RIVER		WM	31	STATE	07/21/00	5.583	GOOD	80000	\$115,200,000.00	11
2066919	BM	WASHINGTON BRIDGE	HARLEM RIVER		W	9	STATE	10/27/00	4.88	FAIR	128339	\$184,808,160.00	12
2240120	BM	W 207TH/W FORDHAM RD	HARLEM RIVER		WM	5	STATE	04/28/00	5.75	GOOD	29682	\$42,742,080.00	12
2240137	BM	BROADWAY BRIDGE	HARLEM RIVER	T	WM	3	STATE	10/17/01	3.93	FAIR	38100	\$54,864,000.00	12
2240138	BM	NYCTA IRT	HARLEM RVR/BROADWAY	T	WM	3	STATE	10/18/01	4.588	FAIR	38100	\$54,864,000.00	12
2240290	K	METROPOLITAN AVE	ENGLISH KILLS		WM	5	STATE	07/02/01	4.186	FAIR	15245	\$21,952,800.00	1
2244421	K	WLLMSBRG BRDG NTH APP	DRIGGS AVE		O	1	STATE	02/16/00	4.293	FAIR	3170	\$4,564,800.00	1
2230410	K	278I (B.Q.E.)	WASHINGTON ST		A	1	STATE	10/12/00	4.656	FAIR	2500	\$3,600,000.00	2
2230420	K	278I (B.Q.E.)	WASHINGTON ST		A	1	STATE	10/12/00	4.906	FAIR	2500	\$3,600,000.00	2
2230430	K	278I (B.Q.E.)	PROSPECT ST		A	1	STATE	01/06/00	5.266	GOOD	1100	\$1,584,000.00	2
2230440	K	278I (B.Q.E.)	ADAMS ST N.B.		A	1	STATE	01/05/00	5.2	GOOD	2700	\$3,888,000.00	2
2230450	K	278I (B.Q.E.)	ADAMS ST S.B.		A	1	STATE	01/05/00	4.933	FAIR	2500	\$3,600,000.00	2
2230460	K	278I (B.Q.E.)	PEARL ST		A	1	STATE	01/04/00	5.333	GOOD	4500	\$6,480,000.00	2
2230470	K	278I (B.Q.E.)	JAY ST		A	1	STATE	01/04/00	5.233	GOOD	5100	\$7,344,000.00	2
2230480	K	278I (B.Q.E.)	PROSPECT ST		A	1	STATE	01/06/00	5.351	GOOD	8400	\$12,096,000.00	2
2230490	K	278I (B.Q.E.)	SANDS ST		A	1	STATE	01/06/00	5.277	GOOD	12600	\$18,144,000.00	2
2230500	K	278I (B.Q.E.)	RAMP TO BQE EB		A	1	STATE	01/06/00	5.566	GOOD	1300	\$1,872,000.00	2
2230510	K	278I (B.Q.E.)	NASSAU ST		A	6	STATE	01/13/00	4.444	FAIR	51200	\$73,728,000.00	2
2230857	K	278I (B.Q.E.)	JORALEMON ST		A	1	STATE	09/07/00	5.03	GOOD	2100	\$3,024,000.00	2
2230858	K	278I (B.Q.E.)	JORALEMON ST / BQE WB		A	2	STATE	09/08/00	3.758	FAIR	5900	\$8,496,000.00	2
2230870	K	COLUMBIA HEIGHTS	278I (B.Q.E.)		A	1	STATE	11/27/00	4.583	FAIR	16500	\$23,760,000.00	2
2230887	K	278I W.B. (B.Q.E.)	CADMAN PLAZA		A	2	STATE	10/18/00	4.338	FAIR	4500	\$6,480,000.00	2
2230888	K	278I E.B. (B.Q.E.)	CADMAN PLAZA / 278I WB		A	2	STATE	11/13/00	4.842	FAIR	4500	\$6,480,000.00	2

INVENTORY SORTED BY BOROUGH AND COMMUNITY BOARD DISTRICT

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2244440	K	SOUTH OF TILLARY ST	NAVY ST		O-PED	1	CITY	03/08/01	4.333	FAIR	6200	\$8,928,000.00	2
2267860	K	BROOKLYN BR APPROACH	SANDS STREET		O	1	STATE	11/21/00	4.66	FAIR	6490	\$9,345,600.00	2
2268497	K	2781 W.B. (B.Q.E.)	FURMAN ST		A	45	STATE	06/11/01	4.375	FAIR	78022	\$112,351,680.00	2
2268498	K	2781 E.B. (B.Q.E.)	2781 W.B. (B.Q.E.)		A	69	STATE	06/20/01	3.827	FAIR	120734	\$173,856,960.00	2
2268507	K	2781 W.B. (B.Q.E.)	YORK ST		A	6	STATE	06/25/01	4.205	FAIR	9380	\$13,507,200.00	2
2268508	K	2781 E.B. (B.Q.E.)	2781 W.B. (B.Q.E.)		A	11	STATE	05/21/01	3.62	FAIR	17956	\$25,856,640.00	2
2268517	K	2781 W.B. (B.Q.E.)	FURMAN ST		A	7	STATE	05/16/01	4.205	FAIR	10988	\$15,822,720.00	2
2268518	K	2781 E.B. (B.Q.E.)	2781 W.B. (B.Q.E.)		A	5	STATE	05/17/01	4.285	FAIR	8375	\$12,060,000.00	2
2230000	K	HIGHLAND BLVD E.B.	JACKIE ROBINSON PKWY		A	1	STATE	02/09/00	4.933	FAIR	4900	\$7,056,000.00	5
2230010	K	HIGHLAND BLVD W.B.	JACKIE ROBINSON PKWY		A	1	STATE	02/09/00	5.266	GOOD	3500	\$5,040,000.00	5
2230020	K	HIGHLAND BLVD W.B.	JACKIE ROBINSON PKWY		A	2	STATE	02/09/00	4.947	FAIR	4700	\$6,768,000.00	5
2230220	K	HIGHLAND BLVD NB	VERMONT AVE		A	1	STATE	05/08/01	6.328	VGGOOD	3995	\$5,752,800.00	5
2244170	K	ATLNTC AV SVC RD E.B.	EAST NEW YORK AVE		O	2	STATE	05/03/01	4.543	FAIR	5500	\$7,920,000.00	5
2244460	K	CONDUIT BLVD NB	ATLANTIC AVE EB		O	1	STATE	02/10/00	4.666	FAIR	3800	\$5,472,000.00	5
2230350	K	SUMMIT ST PED BRDG	2781 (B.Q.E.)		A-PED	2	STATE	10/03/00	4.714	FAIR	1400	\$2,016,000.00	6
2230360	K	UNION ST	2781 (B.Q.E.)		A	2	STATE	03/10/00	4.486	FAIR	5000	\$7,200,000.00	6
2230370	K	SACKETT ST	2781 (B.Q.E.)		A	2	STATE	03/10/00	4.625	FAIR	5000	\$7,200,000.00	6
2230380	K	KANE ST	2781 (B.Q.E.)		A	2	STATE	03/06/00	4.458	FAIR	5000	\$7,200,000.00	6
2230390	K	CONGRESS ST	2781 (B.Q.E.)		A	2	STATE	11/13/00	4.426	FAIR	5000	\$7,200,000.00	6
2230400	K	2781 (B.Q.E.)	ATLANTIC AVE		A	1	STATE	10/04/00	5.88	GOOD	14230	\$20,491,200.00	6
2240232	K	HAMILTON AVE BRIDGE	GOWANUS CANAL		WM	3	STATE	07/09/01	4.18	FAIR	7300	\$10,512,000.00	6
2240240	K	NINTH ST BRIDGE	GOWANUS CANAL		WM	5	STATE	06/19/01	7	VGGOOD	4800	\$30,000,000.00	6
2240250	K	THIRD ST	GOWANUS CANAL		WM	5	STATE	06/22/01	4.958	FAIR	4900	\$15,000,000.00	6
2240260	K	CARROLL ST	GOWANUS CANAL		WM	2	STATE	06/22/01	4.69	FAIR	3000	\$5,000,000.00	6
2240270	K	UNION ST	GOWANUS CANAL		WM	5	STATE	08/07/00	4.152	FAIR	4900	\$15,000,000.00	6
2240310	K	THIRD AVE	GOWANUS CANAL		W	1	STATE	06/26/01	4.545	FAIR	3200	\$4,608,000.00	6
2268350	K	BROOKLYN PROMENADE	2781 N.B. (B.Q.E.)		A-PED	35	CITY	08/04/00	4.286	FAIR	46184	\$66,504,960.00	6
2066100	K	5TH AVE	27 X PROSPECT EXPWY		A	1	STATE	01/27/00	5.25	GOOD	8800	\$12,672,000.00	7
2240231	K	HAMILTON AVE BRIDGE	GOWANUS CANAL		WM	3	STATE	08/16/00	4.083	FAIR	7300	\$10,512,000.00	7
2243839	K	4TH AVE	NYCTA BMT TRACKS	T	O	1	STATE	05/05/00	3.129	FAIR	4100	\$5,904,000.00	7
2243920	K	7TH AVE	NYCTA BMT YARD	T	O	2	STATE	05/11/00	3.916	FAIR	5200	\$7,488,000.00	7
2244470	K	SEELEY ST	PROSPECT AVE		O	1	STATE	05/09/01	4.1	FAIR	7700	\$11,088,000.00	7
2244480	K	5TH AVE	GREENWOOD CEMETERY		O	1	STATE	05/14/01	5	GOOD	3600	\$5,184,000.00	7
2243170	K	STERLING PLACE	FRANKLIN SHUTTLE	T	O	1	STATE	11/06/01	6.593	VGGOOD	2300	\$3,312,000.00	8
2243280	K	6TH AVE	LIRR ATLANTIC AVE	L	O	9	STATE	10/06/00	4.902	FAIR	12276	\$17,677,440.00	8
2243290	K	CARLTON AVE	LIRR ATLANTIC AVE	L	O	7	STATE	03/02/00	4.986	FAIR	10823	\$15,585,120.00	8
2243180	K	ST JOHNS PLACE	FRANKLIN SHUTTLE	T	O	1	STATE	11/03/01	6.796	VGGOOD	2200	\$3,168,000.00	9
2243190	K	LINCOLN PLACE	FRANKLIN SHUTTLE	T	O	3	STATE	03/17/00	7	VGGOOD	3400	\$4,896,000.00	9
2243200	K	UNION ST	FRANKLIN SHUTTLE	T	O	2	STATE	03/22/00	5.047	GOOD	4100	\$5,904,000.00	9
2243210	K	PRESIDENT ST	FRANKLIN SHUTTLE	T	O	2	STATE	03/23/00	5.161	GOOD	2500	\$3,600,000.00	9
2243220	K	CARROLL ST PED BRDG	FRANKLIN SHUTTLE	T	O-PED	3	CITY	07/07/00	5.484	GOOD	600	\$864,000.00	9
2243230	K	CROWN ST	FRANKLIN SHUTTLE	T	O	3	STATE	11/02/01	5.263	GOOD	4800	\$6,912,000.00	9
2243240	K	MONTGOMERY ST	FRANKLIN SHUTTLE	T	O	1	STATE	11/04/01	6.627	VGGOOD	2200	\$3,168,000.00	9
2243250	K	WASHINGTON AVE	FRANKLIN SHUTTLE	T	O	1	STATE	03/15/00	6.328	VGGOOD	6500	\$9,360,000.00	9
2243260	K	FLATBUSH AVE	FRANKLIN SHUTTLE	T	O	2	STATE	03/20/00	5.254	GOOD	11300	\$16,272,000.00	9
2243279	K	EASTERN PKWY	FRANKLIN SHUTTLE	T	O	1	STATE	03/21/00	4.833	FAIR	7700	\$11,088,000.00	9
2231249	K	BSHP	BAY RIDGE AVE		A	1	STATE	11/27/00	3.566	FAIR	4900	\$7,056,000.00	10
2231250	K	81ST ST PED BR	BSHP		A-PED	5	CITY	11/07/00	5.222	GOOD	3100	\$4,464,000.00	10
2231260	K	92ND ST PED BR	BSHP		A-PED	6	CITY	05/09/00	4.161	FAIR	3000	\$4,320,000.00	10
2231270	K	4TH AVE	BSHP		A	2	STATE	01/24/00	4.71	FAIR	6100	\$8,784,000.00	10
2243310	K	2ND AVE	LIRR BAY RIDGE	N	O	6	STATE	08/29/01	3.865	FAIR	17000	\$24,480,000.00	10
2243320	K	3RD AVE	LIRR BAY RIDGE	N	O	4	STATE	08/30/01	5.708	GOOD	17230	\$24,811,200.00	10
2243330	K	4TH AVE	LIRR BAY RIDGE	NT	O	6	STATE	11/05/01	5.916	GOOD	19400	\$27,936,000.00	10
2243580	K	5TH AVE	LIRR & SEA BEACH	LT	O	4	STATE	05/03/00	4.472	FAIR	12500	\$18,000,000.00	10
2243590	K	6TH AVE	LIRR & SEA BEACH	LT	O	5	STATE	05/02/00	3.583	FAIR	14200	\$20,448,000.00	10
2243600	K	7TH AVE	LIRR & SEA BEACH	LT	O	7	STATE	05/01/00	5.402	GOOD	18913	\$27,234,720.00	10
2243610	K	8TH AVE	LIRR & SEA BEACH	LT	O	4	STATE	11/07/01	4.37	FAIR	11400	\$16,416,000.00	10
2243620	K	FORT HAMILTON PKWY	LIRR & SEA BEACH	LT	O	3	STATE	05/23/00	5.627	GOOD	14800	\$21,312,000.00	10
2243630	K	11TH AVE	LIRR & SEA BEACH	LT	O	5	STATE	10/20/00	6.808	VGGOOD	9700	\$13,968,000.00	10
2243640	K	13TH AVE	LIRR & SEA BEACH	LT	O	5	STATE	11/08/01	4.666	FAIR	16000	\$23,040,000.00	10
2244150	K	RIDGE BLVD	SHORE RD DRIVE		O	1	STATE	05/10/01	7	VGGOOD	7000	\$10,080,000.00	10
2244160	K	3RD AVE	SHORE RD DRIVE		O	1	STATE	05/11/01	7	VGGOOD	7100	\$10,224,000.00	10
2231290	K	BAY 8TH ST	BSHP		A	1	STATE	05/09/01	6.206	VGGOOD	4920	\$7,084,800.00	11
2231300	K	17TH AVE PED BRDG	BSHP		A-PED	1	CITY	12/15/00	3.846	FAIR	2100	\$3,024,000.00	11
2231319	K	BSHP	BAY PKWY		A	1	STATE	10/25/00	4.345	FAIR	7200	\$10,368,000.00	11
2243340	K	15TH AVE	LIRR BAY RIDGE	N	O	1	STATE	11/03/00	4.607	FAIR	3614	\$5,204,160.00	11
2243350	K	60TH ST	LIRR BAY RIDGE	N	O	1	STATE	09/07/01	6.866	VGGOOD	3900	\$5,616,000.00	11
2243360	K	16TH AVE	LIRR BAY RIDGE	N	O	1	STATE	11/03/00	6.816	VGGOOD	5300	\$7,632,000.00	11
2243650	K	14TH AVE	LIRR BAY RIDGE	N	O	4	STATE	11/10/00	4.285	FAIR	10000	\$14,400,000.00	11
2243660	K	NEW UTRECHT AVE	LIRR BAY RIDGE	N	O	1	STATE	04/12/00	4.346	FAIR	2400	\$3,456,000.00	11
2243670	K	15TH AVE	BMT SEA BEACH	T	O	6	STATE	11/12/01	4.136	FAIR	17300	\$24,912,000.00	11
2243680	K	16TH AVE	BMT SEA BEACH	T	O	4	STATE	04/14/00	5.372	GOOD	6816	\$9,815,040.00	11
2243690	K	17TH AVE	BMT SEA BEACH	T	O	4	STATE	11/14/01	3.71	FAIR	8500	\$12,240,000.00	11
2243700	K	18TH AVE	BMT SEA BEACH	T	O	4	STATE	11/16/01	3.909	FAIR	8700	\$12,528,000.00	11
2243710	K	19TH AVE	BMT SEA BEACH	T	O	4	STATE	04/07/00	4.026	FAIR	4800	\$6,912,000.00	11
2243720	K	20TH AVE	BMT SEA BEACH	T	O	6	STATE	04/06/00	4.538	FAIR	12500	\$18,000,000.00	11
2243730	K	65TH ST	BMT SEA BEACH	T	O	4	STATE	03/31/00	5.947	GOOD	12000	\$17,280,000.00	11
2243740	K	BAY PKWY	BMT SEA BEACH	T	O	4	STATE	12/04/01	5.078	GOOD	16800	\$24,192,000.00	11
2243750	K	AVENUE O	BMT SEA BEACH	T	O	4	STATE	11/20/01	6.568	VGGOOD	4658	\$6,707,520.00	11
2243760	K	AVENUE P	BMT SEA BEACH	T	O	4	STATE	11/21/01	6.883	VGGOOD	6000	\$8,640,000.00	11
2243770	K	KINGS HIGHWAY	BMT SEA BEACH	T	O	4	STATE	03/29/00	3.368	FAIR	12000	\$17,280,000.00	11
2243780	K	HIGHLAWN AVE	BMT SEA BEACH	T	O	6	STATE	11/30/01	7	VGGOOD	11300	\$16,272,000.00	11
2243800	K	AVENUE T	BMT SEA BEACH	T	O	4	STATE	11/27/01	6.5	VGGOOD	8500	\$12,240,000.00	11
2243820	K	21ST AVE	BMT SEA BEACH	T	O	4	STATE	11/29/01	4.131	FAIR	21400	\$30,816,000.00	11
2243370	K	17TH AVE	LIRR BAY RIDGE	N	O	1	STATE	02/29/00	5.313	GOOD	3406	\$4,904,6	

INVENTORY SORTED BY BOROUGH AND COMMUNITY BOARD DISTRICT

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2243410	K	MCDONALD AVE	LIRR BAY RIDGE	N	O	1	STATE	04/13/00	5.421	GOOD	2760	\$3,974,400.00	12
2243420	K	E 3RD ST	LIRR BAY RIDGE	N	O	1	STATE	09/24/01	5.02	GOOD	1500	\$2,160,000.00	12
2243439	K	OCEAN PKWY	LIRR BAY RIDGE	N	O	1	STATE	10/30/00	4.833	FAIR	7000	\$10,080,000.00	12
2243440	K	CONEY ISLAND AVE	LIRR BAY RIDGE	N	O	1	STATE	03/01/00	5.744	GOOD	3231	\$4,652,640.00	12
2243840	K	9TH AVE	NYCTA BMT YARD	T	O	5	STATE	12/10/01	6.777	VGGOOD	12440	\$17,913,600.00	12
2243940	K	9TH AVE	NYCTA IND SBWY	T	O	5	STATE	12/06/01	4.754	FAIR	11900	\$17,136,000.00	12
2231329	K	BSHP	26TH AVE		A	1	STATE	10/25/00	4.466	FAIR	6700	\$9,648,000.00	13
2231330	K	27TH AVE PED BRDG	BSHP		A-PED	1	CITY	06/07/00	4.366	FAIR	2100	\$3,024,000.00	13
2231340	K	CROPSY AVE	BSHP		A	2	STATE	10/24/00	4.944	FAIR	13100	\$18,864,000.00	13
2231360	K	BSHP	OCEAN PKWY		A	2	STATE	05/30/01	3.361	FAIR	11800	\$16,992,000.00	13
2231370	K	B 8TH ST ACCESS RMP	BSHP		A	4	STATE	05/31/00	4.097	FAIR	12800	\$18,432,000.00	13
2231380	K	CONEY ISLAND AVE	BSHP		A	4	STATE	02/17/00	3.555	FAIR	20600	\$29,664,000.00	13
2240301	K	CROPSY AVE	CONEY ISLAND CREEK		W	3	STATE	06/08/01	5.194	GOOD	9400	\$13,536,000.00	13
2240302	K	CROPSY AVE	CONEY ISLAND CREEK		W	3	STATE	06/15/01	5.084	GOOD	9400	\$13,536,000.00	13
2240540	K	STILLWELL AVE	CONEY ISLAND CRK		W	2	STATE	06/18/01	6.097	VGGOOD	17000	\$24,480,000.00	13
2243570	K	86TH ST	LIRR & SEA BEACH	LT	O	6	STATE	03/24/00	6.25	VGGOOD	18200	\$26,208,000.00	13
2269260	K	W. 8TH STREET	SURF AVE.		O-PED	55	CITY	06/12/00	4.111	FAIR	14742	\$21,228,480.00	13
2243020	K	PARKSIDE AVE	BMT SUBWAY, BRIGHTON	T	O	6	STATE	10/18/01	4.263	FAIR	48700	\$70,128,000.00	14
2243040	K	CROOKE AVE	BMT SUBWAY, BRIGHTON	T	O	4	STATE	10/15/01	4.157	FAIR	6000	\$8,640,000.00	14
2243050	K	CATON AVE	BMT SUBWAY, BRIGHTON	T	O	4	STATE	10/24/01	4.5	FAIR	20800	\$29,952,000.00	14
2243080	K	CHURCH AVE	BMT SUBWAY, BRIGHTON	T	O	4	STATE	10/26/01	4.545	FAIR	18200	\$26,208,000.00	14
2243100	K	BEVERLY ROAD	BMT SUBWAY, BRIGHTON	T	O	3	STATE	10/22/01	3.982	FAIR	2700	\$3,888,000.00	14
2243110	K	CORTEYOU ROAD	BMT SUBWAY, BRIGHTON	T	O	3	STATE	10/29/01	3.926	FAIR	2900	\$4,176,000.00	14
2243120	K	DORCHESTER ROAD	BMT SUBWAY, BRIGHTON	T	O	1	STATE	03/08/00	6.156	VGGOOD	4825	\$6,948,000.00	14
2243130	K	DITMAS AVE	BMT SUBWAY, BRIGHTON	T	O	1	STATE	10/30/01	5.659	GOOD	4100	\$5,904,000.00	14
2243140	K	NEWKIRK AVE	BMT SUBWAY, BRIGHTON	T	O	3	STATE	11/01/01	4.661	FAIR	4100	\$5,904,000.00	14
2243150	K	FOSTER AVE	BMT SUBWAY, BRIGHTON	T	O	1	STATE	03/09/00	4.383	FAIR	3000	\$4,320,000.00	14
2243450	K	E 14TH ST	LIRR BAY RIDGE	N	O	1	STATE	03/01/00	5.595	GOOD	1775	\$2,556,000.00	14
2243460	K	E 15TH ST - PED	LIRR BAY RIDGE	N	O-PED	3	CITY	01/17/01	7	VGGOOD	900	\$1,296,000.00	14
2243480	K	OCEAN AVE	LIRR BAY RIDGE	N	O	2	STATE	10/30/00	4.859	FAIR	5000	\$7,200,000.00	14
2243490	K	BEDFORD AVE	LIRR BAY RIDGE	N	O	6	STATE	03/07/00	4.777	FAIR	12000	\$17,280,000.00	14
2243500	K	NOSTRAND AVE	LIRR BAY RIDGE	N	O	2	STATE	03/03/00	5.322	GOOD	4320	\$6,220,800.00	14
2231390	K	E 12TH ST	BSHP		A	4	STATE	02/15/00	5.013	GOOD	17200	\$24,768,000.00	15
2231409	K	BSHP	SHEEPSHEAD BAY ROAD		A	1	STATE	01/19/00	4.967	FAIR	6500	\$9,360,000.00	15
2231419	K	BSHP	OCEAN AVE		A	3	STATE	01/19/00	4.43	FAIR	14000	\$20,160,000.00	15
2231429	K	BSHP	BEDFORD AVE		A	3	STATE	08/04/00	4.388	FAIR	12000	\$17,280,000.00	15
2231439	K	BSHP	NOSTRAND AVE		A	3	STATE	08/04/00	4.041	FAIR	13000	\$18,720,000.00	15
2231449	K	KNAPP ST	BSHP		A	1	STATE	01/21/00	4.796	FAIR	9500	\$13,680,000.00	15
2233080	K	E 14 ST PED BR	BSHP		A-PED	14	CITY	07/18/01	4.7	FAIR	4700	\$6,768,000.00	15
2240320	K	OCEAN AVE PED BRDG	SHEEPSHEAD BAY		W-PED	30	CITY	12/05/00	4.263	FAIR	4000	\$5,760,000.00	15
2243790	K	AVENUE S	BMT SEA BEACH	T	O	4	STATE	12/03/01	6.6	VGGOOD	4800	\$6,912,000.00	15
2243810	K	AVENUE U	BMT SEA BEACH	T	O	4	STATE	03/27/00	6.725	VGGOOD	8500	\$12,240,000.00	15
2243569	K	ATLANTIC AVE	LIRR ATLANTIC AVE	L	O	75	STATE	11/20/00	3.666	FAIR	135100	\$194,544,000.00	16
2243850	K	LIBERTY AVE	LIRR BAY RIDGE	N	O	4	STATE	10/03/01	4.191	FAIR	6400	\$9,216,000.00	16
2243860	K	GLENMORE AVE	LIRR BAY RIDGE	N	O	2	STATE	10/05/01	3.947	FAIR	5700	\$8,208,000.00	16
2243870	K	PITKIN AVE	LIRR BAY RIDGE	N	O	3	STATE	11/01/00	4.088	FAIR	5600	\$8,064,000.00	16
2243890	K	SUTTER AVE	LIRR BAY RIDGE	N	O	3	STATE	10/09/01	4.117	FAIR	5400	\$7,776,000.00	16
2243900	K	BLAKE AVE	LIRR BAY RIDGE LINE	N	O	3	STATE	04/14/00	5.309	GOOD	4900	\$7,056,000.00	16
2243910	K	LIVONIA AVE PED BRDG	LIRR BAY RIDGE LINE	N	O-PED	3	CITY	01/18/01	5.458	GOOD	2500	\$3,600,000.00	16
2244180	K	ATLNTC AV SVC RD W.B.	EAST NEW YORK AVE	O	O	2	STATE	05/07/01	4.491	FAIR	6200	\$8,928,000.00	16
2231479	K	BSHP	MILL BASIN		WM	14	STATE	07/23/01	3.313	FAIR	73500	\$105,840,000.00	18
2231489	K	BSHP	PAERDEGAT BASIN		WA	15	STATE	07/20/01	3.24	FAIR	58300	\$83,952,000.00	18
2243510	K	FLATBUSH AVE	LIRR BAY RIDGE	N	O	2	STATE	09/26/01	4.666	FAIR	5700	\$8,208,000.00	18
2243520	K	BROOKLYN AVE	LIRR BAY RIDGE	N	O	3	STATE	09/27/01	5.92	GOOD	4500	\$6,480,000.00	18
2243530	K	AVENUE H	LIRR BAY RIDGE	N	O	2	STATE	09/28/01	6.823	VGGOOD	35100	\$50,544,000.00	18
2243010	K	LINCOLN ROAD	BMT SUBWAY, BRIGHTON	T	O	4	STATE	09/06/01	4.161	FAIR	6100	\$8,784,000.00	55
2244010	K	EMDALE ARCH E DRV	NR GRAND ARMY PLZ	O	O	1	CITY	05/02/01	4.633	FAIR	900	\$1,296,000.00	55
2244020	K	W DR OV WK-MA.ENT	MEADOWPORT ARCH	O	O	1	STATE	04/24/01	5.571	GOOD	2500	\$3,600,000.00	55
2244030	K	EAST DRIVE	BRIDLE PATH	O	O	1	STATE	04/25/01	5.183	GOOD	2000	\$2,880,000.00	55
2244040	K	EAST DRIVE	EAST WOOD ARCH	O	O	1	CITY	06/08/01	4.2	FAIR	900	\$1,296,000.00	55
2244050	K	CENTRAL DRIVE	PED PATH & STREAM	W	3	STATE	04/27/01	5.315	GOOD	7400	\$10,656,000.00	55	
2244060	K	CLEFT RIDGE SPAN	PROSPECT PARK	O	O	1	CITY	06/21/01	4.5	FAIR	900	\$1,296,000.00	55
2244120	K	HILL DRIVE	PROSPECT PK LAKE	WO	3	STATE	05/01/01	3.636	FAIR	7800	\$11,232,000.00	55	
2231450	K	BSHP	GERRITSEN INLET		WA	11	STATE	08/03/01	3.582	FAIR	46400	\$66,816,000.00	56
2231460	K	FLATBUSH AVE	BSHP		A	2	STATE	07/28/00	3.694	FAIR	13600	\$19,584,000.00	56
2231499	K	BSHP	ROCKAWAY PKWY		A	4	STATE	05/31/01	3.833	FAIR	11500	\$16,560,000.00	56
2231509	K	BSHP	FRESH CREEK		WA	5	STATE	07/17/01	3.166	FAIR	23000	\$33,120,000.00	56
2231519	K	PENNSYLVANIA AVE	BSHP		A	2	STATE	05/18/01	6.277	VGGOOD	6191	\$8,915,040.00	56
2240019	KM	BROOKLYN BRIDGE	2781 (B.Q.E.)		WE	75	STATE	11/30/00	2.93	POOR	503788	\$75,454,720.00	3
2240027	KM	MANHATTAN BRIDGE(LL)	EAST RIVER	T	WE	23	STATE	11/17/00	3.472	FAIR	616390	\$887,601,600.00	3
2240028	KM	MANHATTAN BRIDGE(UL)	NYCTA TRACKS-BMT	T	WE	43	STATE	10/16/00	3.5	FAIR	587424	\$845,890,560.00	3
2240039	KM	WILLIAMSBURG BRIDGE	EAST RIVER	T	WE	72	STATE	12/06/00	2.68	POOR	741000	\$1,067,040,000.00	3
2240370	KQ	GREENPOINT AVE BRIDGE	NEWTOWN CREEK	L	WM	12	STATE	12/20/01	5.666	GOOD	76106	\$109,592,640.00	2
2240639	KQ	PULASKI BRIDGE	NEWTOWN CREEK	WM	48	STATE	03/14/00	4.943	FAIR	205770	\$296,308,800.00	2	
2240390	KQ	GRAND ST BRIDGE	NEWTOWN CREEK	WM	2	STATE	11/21/00	4.458	FAIR	5100	\$25,000,000.00	5	
2232000	M	BATTERY PLACE	FDR DRIVE	AT	2	CITY	06/13/01	4.614	FAIR	75000	\$108,000,000.00	1	
223201A	M	FDR DR N.B. OFF RMP	FDR DR & SOUTH ST	AR	17	STATE	03/14/00	3.686	FAIR	102225	\$147,204,000.00	1	
223201B	M	STH ST RMP TO FDR S.B.	SOUTH ST	AR	10	STATE	02/24/00	3.716	FAIR	44625	\$64,260,000.00	1	
223201C	M	STH ST RMP TO FDR	SOUTH ST	AR	8	STATE	03/03/00	4.641	FAIR	39150	\$56,376,000.00	1	
223201D	M	RAMP TO N.B. FDR DRIVE	FDR & SOUTH ST.	AR	22	STATE	06/29/00	5.622	GOOD	15825	\$22,788,000.00	1	
224001A	M	PARK ROW TO BKLN	WILLIAM ST N.B.	OE	3	STATE	04/06/01	4.111	FAIR	8685	\$12,506,400.00	1	
224001B	M	TO BKLN FRM FDR	FRANKFRT & CITY	OE	31	STATE	04/26/00	4.111	FAIR	51400	\$74,016,000.00	1	
224001D	M	TO FDR DR N.B.	PEARL STREET	OE	30	STATE	05/08/01	5.358	GOOD	49600	\$71,424,000.00	1	
224001F	M	PEARL ST TO FDR DR	LAND ADJ TO BRDG	OE	3	STATE	03/28/01	5.394	GOOD	5200	\$7,488,000.00	1	
224001G	M	TO PARK ROW	ROSE ST	OE	11	STATE	07/14/01	4.736	FAIR	16551	\$23,833,440.00	1	
2267380	M	WEST STREET	RECTOR ST	AT	1	STATE	08/20/01	5.033	GOOD	4320	\$6,220,800.00	1	
2268480	M	CHAMBERS ST PED BRDG	WEST SIDE HWY		O-PED	8	CITY	06/05/00	6.623	VGGOOD	3344	\$4,815,360.00	1
2268930	M	MORRIS ST PED BRDG	BKLN-BATTERY TUNN PLZ		A-PED	3	CITY	07/11/00	4.535	FAIR	1200	\$1,728,000.00	1
2232029	M	CORLEARS PARK ROAD	FDR DRIVE		A	4	STATE	03/23/00	4.272	FAIR	4100	\$5,904,000.00	3

INVENTORY SORTED BY BOROUGH AND COMMUNITY BOARD DISTRICT

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2232030	M	DELANCEY ST PED BRDG	FDR DRIVE		A-PED	9	CITY	07/29/01	4.406	FAIR	2900	\$4,176,000.00	3
2232040	M	HOUSTON ST	FDR DRIVE		A	2	STATE	07/06/01	3.09	FAIR	11010	\$15,854,400.00	3
223204A	M	FDR NB TO HOUSTON ST	RELIEF		AR	4	STATE	03/22/00	3.9	FAIR	7642	\$11,004,480.00	3
223204B	M	HOUSTON ST RAMP TO FDR	RELIEF		AR	4	STATE	04/03/00	4.333	FAIR	7642	\$11,004,480.00	3
2232050	M	E 6TH ST PED BRDG	FDR DRIVE		A-PED	22	CITY	12/07/01	4.356	FAIR	2200	\$3,168,000.00	3
2233020	M	E 10TH ST PED BRDG	FDR DRIVE		A-PED	22	CITY	04/18/01	3.681	FAIR	1632	\$2,350,080.00	3
224001C	M	PEARL ST TO BKLN	LAND ADJ TO BRDG		OE	12	STATE	04/30/01	3.711	FAIR	6489	\$9,344,160.00	3
2245010	M	11TH AVE VIADUCT	LIRR WEST SIDE YARD	AL	O	39	STATE	11/21/00	3.75	FAIR	157500	\$226,800,000.00	4
224501B	M	W 33RD ST	AMTRAK 30 ST BRANCH	A	O	8	STATE	04/10/00	4.347	FAIR	16500	\$23,760,000.00	4
224501C	M	W 33RD ST	LAND ADJ TO AMTRAK	A	O	2	STATE	05/11/01	4.555	FAIR	4620	\$6,652,800.00	4
224501D	M	W 34TH ST	AMTRAK 30 ST BRANCH	A	O	4	STATE	05/15/01	4.319	FAIR	11800	\$16,992,000.00	4
224501E	M	W 35TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	04/21/00	4.388	FAIR	6500	\$9,360,000.00	4
224501F	M	W 36TH ST	AMTRAK 30 ST BRANCH	A	O	7	STATE	08/28/00	4.119	FAIR	16400	\$23,616,000.00	4
2245060	M	W 37TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	08/24/00	3.961	FAIR	7600	\$10,944,000.00	4
2245070	M	W 38TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	05/24/00	3.73	FAIR	6200	\$8,928,000.00	4
2245080	M	W 39TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	06/02/00	4.365	FAIR	6300	\$9,072,000.00	4
2245090	M	W 43RD ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/14/00	4.764	FAIR	4100	\$5,904,000.00	4
2245100	M	W 44TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/15/00	4.661	FAIR	4300	\$6,192,000.00	4
2245110	M	W 45TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/16/00	4.632	FAIR	4100	\$5,904,000.00	4
2245120	M	W 46TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/25/00	4.676	FAIR	4100	\$5,904,000.00	4
2245130	M	W 47TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/21/00	4.72	FAIR	4100	\$5,904,000.00	4
2245140	M	W 48TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/22/00	4.735	FAIR	4100	\$5,904,000.00	4
2245150	M	W 49TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	03/24/00	4.573	FAIR	4100	\$5,904,000.00	4
2245160	M	W 51ST ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/04/00	4.764	FAIR	4300	\$6,192,000.00	4
2245170	M	W 52ND ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/26/00	5.073	GOOD	4300	\$6,192,000.00	4
2245180	M	W 53RD ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/04/00	5.338	GOOD	5100	\$7,344,000.00	4
2245190	M	W 58TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/07/00	4.705	FAIR	4100	\$5,904,000.00	4
2245209	M	11TH AVE	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/27/00	4.529	FAIR	15400	\$22,176,000.00	4
2245210	M	W 42ND ST	AMTRAK 30 ST BRANCH	A	O	4	STATE	11/20/00	4.428	FAIR	10300	\$14,832,000.00	4
2245220	M	W 57TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	04/14/00	4.867	FAIR	9100	\$13,104,000.00	4
2245330	M	W 41ST ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	04/21/00	4.444	FAIR	6200	\$8,928,000.00	4
2245340	M	W 50TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/27/00	4.647	FAIR	4100	\$5,904,000.00	4
2245350	M	W 54TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/05/00	5.412	GOOD	4700	\$6,768,000.00	4
2245360	M	W 55TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/06/00	5.352	GOOD	4300	\$6,192,000.00	4
2245370	M	W 56TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/07/00	5.367	GOOD	4400	\$6,336,000.00	4
2245440	M	W 40TH ST	AMTRAK 30 ST BRANCH	A	O	4	STATE	05/24/00	4.073	FAIR	9400	\$13,536,000.00	4
226672A	M	W 31ST ST	AMTRAK LAYUP TRACKS	A	O	9	STATE	08/28/00	3.523	FAIR	8800	\$12,672,000.00	4
2245460	M	PARK AVE S.B.	E 45TH ST	O	1	STATE	04/10/01	4.729	FAIR	2400	\$3,456,000.00	5	
2245470	M	PARK AVE N.B	E 45TH ST	O	1	STATE	04/10/01	4.864	FAIR	2400	\$3,456,000.00	5	
2246040	M	EAST DR AT CNTRL PARK	PEDESTRIAN WALK	O	1	CITY	06/08/01	5	GOOD	1200	\$1,128,000.00	5	
2246540	M	E 34TH ST	PARK AVE TUNNEL		OT	1	STATE	09/09/00	4.266	FAIR	36200	\$52,178,000.00	5
2232070	M	25TH ST PED BRDG	FDR DRIVE		A-PED	4	CITY	06/03/01	5.266	GOOD	1700	\$2,448,000.00	6
2232100	M	E 51ST ST PED BRDG	FDR DRIVE		A-PED	10	CITY	10/22/00	4.156	FAIR	2800	\$4,032,000.00	6
2233040	M	E 60TH ST	FDR DRIVE		A	17	STATE	04/26/01	3.318	FAIR	24480	\$35,251,200.00	6
224001E	M	TO PEARL ST	LAND ADJ TO BRDG		OE	3	STATE	04/03/01	5.394	GOOD	5300	\$7,632,000.00	6
224004A	M	TO QNS FRM E 59TH ST	FIRST AVE		OE	13	STATE	11/13/00	5.788	GOOD	14800	\$21,312,000.00	6
224004B	M	TO E 60TH ST FROM QNS	FIRST AVE		OE	13	STATE	11/13/00	5.791	GOOD	14800	\$21,312,000.00	6
224004C	M	TO E 62ND ST FROM QNS	E 60TH ST		OE	10	STATE	11/09/00	4.984	FAIR	16720	\$24,076,800.00	6
224004D	M	TO QNS FROM E 58TH ST	E 59TH ST		OE	12	STATE	10/20/00	4.622	FAIR	11781	\$16,964,640.00	6
224004J	M	25X	NYC GARAGE		OE	14	STATE	10/31/00	4.893	FAIR	22058	\$31,763,520.00	6
2246550	M	PARK AVE VIADUCT	E 42ND ST		O	10	STATE	10/04/01	4.597	FAIR	19600	\$28,224,000.00	6
2246560	M	TUDOR CITY PLACE	E 42ND ST		O	1	STATE	03/24/00	5.027	GOOD	6600	\$9,504,000.00	6
2246570	M	UNITED NATIONS PL	FIRST AVE TUNNEL		OT	2	STATE	10/02/00	5.078	GOOD	92200	\$132,768,000.00	6
2268650	M	FDR NB 42ND TO 49ST	EAST RIVER		A	119	STATE	08/27/01	4.415	FAIR	30767	\$44,304,480.00	6
2229289	M	HHP VIADUCT	W 72 ST TO W 79 ST	A	A	145	STATE	10/25/00	3.388	FAIR	236100	\$339,984,000.00	7
2229290	M	W 79 ST	AMTRAK	A	A	1	STATE	10/17/00	4.559	FAIR	4500	\$6,480,000.00	7
2229309	M	HHP	RIVERSIDE PARK		A	1	STATE	02/11/00	5.1	GOOD	2400	\$3,456,000.00	7
2229311	M	HHP SB	RAMP TO 96 ST		A	1	STATE	02/16/00	4.181	FAIR	2000	\$2,880,000.00	7
2229312	M	HHP NB	RAMP TO 96 ST		A	1	STATE	02/16/00	4.272	FAIR	2000	\$2,880,000.00	7
2229321	M	HHP SB	RAMP TO 96 ST		A	1	STATE	07/13/00	5.2	GOOD	2000	\$2,880,000.00	7
2229322	M	HHP NB	RAMP TO 96 ST		A	1	STATE	07/13/00	5.433	GOOD	2000	\$2,880,000.00	7
2246970	M	RIVERSIDE DRIVE	W 96TH ST		O	3	STATE	08/02/00	5.352	GOOD	10600	\$15,264,000.00	7
2257569	M	MILLER HIGHWAY	TERRAIN		A	63	STATE	08/28/01	5.07	GOOD	287539	\$414,056,160.00	7
2267250	M	HHP	AMTRAK 30TH ST LINE	A	A	55	STATE	07/11/00	3.451	FAIR	47000	\$57,600,000.00	7
2267717	M	79 ST PED PLAZA	79 ST BT BASIN GAR		A	10	STATE	04/25/01	4.592	FAIR	27400	\$39,456,000.00	7
2267718	M	79 ST TRAFFIC CIRC	79 ST PED PLAZA		A	34	STATE	09/26/01	3.803	FAIR	24130	\$34,747,200.00	7
226771A	M	79 ST RAMP TO HHP	79 ST BT BASIN GAR		AR	4	STATE	05/22/01	4.241	FAIR	3131	\$4,508,640.00	7
226771B	M	79 ST RAMP TO GAR	79 ST BT BASIN GAR		AR	21	STATE	09/26/01	4.403	FAIR	7114	\$10,244,160.00	7
226771C	M	GAR RAMP TO 79 ST	79 ST BT BASIN GAR		AR	21	STATE	10/08/01	4.596	FAIR	9095	\$13,096,800.00	7
226771D	M	SB HHP RAMP TO 79 ST	79 ST BT BASIN GAR		AR	4	STATE	05/22/01	4.37	FAIR	2601	\$3,745,440.00	7
2269190	M	W.70TH STREET	AMTRAK		O	3	STATE	08/13/01	6.944	VGOOD	17433	\$25,103,520.00	7
2269210	M	W.68TH STREET	AMTRAK		O	3	STATE	08/13/01	6.796	VGOOD	5349	\$7,702,560.00	7
M00003	M	HHP ON/OFF RMP-79 WB	PEDESTRIAN PATH		A	1	CITY	11/16/00	4.767	FAIR	900	\$1,296,000.00	7
M00004	M	HHP ON/OFF RMP-79 EB	PEDESTRIAN PATH		A	1	CITY	07/20/00	4.933	FAIR	900	\$1,296,000.00	7
2232110	M	E 64TH ST PED BRDG	FDR DRIVE		A-PED	13	CITY	06/27/01	5.266	GOOD	2100	\$3,024,000.00	8
2232120	M	E 71ST ST PED BRDG	FDR DRIVE		A-PED	19	CITY	05/31/01	7	VGOOD	1800	\$2,592,000.00	8
2232140	M	E 78TH ST PED BRDG	FDR DRIVE		A-PED	9	CITY	01/17/02	3.475	FAIR	1700	\$2,448,000.00	8
2232158	M	FDR DRIVE S.B.	FDR DRIVE N.B.		AT	56	STATE	11/15/01	4.772	FAIR	54302	\$78,194,880.00	8
2232167	M	PROMENADE OVER FDR	FDR/E79TH ST-E91ST ST		A-PED	53	STATE	11/12/01	3.285	FAIR	93000	\$133,920,000.00	8
2232168	M	BREARLY SCHOOL	FDR DR PROMENADE		A	7	STATE	05/16/97	4.649	FAIR	3700	\$5,328,000.00	8
2233038	M	FDR DRIVE SB	FDR NB / E 62ND ST		AT	46	STATE	05/17/01	2.509	POOR	70113	\$100,962,720.00	8
2245319	M	E 97TH ST	METRO NORTH MAIN LN	M	O	1	STATE	10/09/00	5	GOOD	3200	\$4,608,000.00	8
2245380	M	E 66TH ST	PED WALK N. OF ZOO		O	1	STATE	04/10/00	5	GOOD	1500	\$2,160,000.00	8
2246410	M	TRANSVERSE RD. #1	PED WALK NEAR 5 AV		O	1	STATE	04/10/00	4.409	FAIR	2000	\$2,880,000.00	8
2229339	M	HHP	ST CLAIR PLACE		A	64	STATE	03/21/00	3.887	FAIR	370000	\$532,800,000.00	9
222933A	M	RAMP FROM S.B. HHP	W 135 ST		AR	9	STATE	07/21/00	4.802	FAIR	12900	\$18,576,000.00	9
222933B	M	RAMP TO N.B. HHP	W 135 ST		AR	14	STATE	01/20/00	4.422	FAIR	14400	\$20,736,000.00	9
2245230	M	W 148TH ST PED BRDG	AMTRAK 30 ST BRANCH	A	O-PED	3	CITY	11/16/00	4	FAIR	1100	\$1,584,000.00	9

INVENTORY SORTED BY BOROUGH AND COMMUNITY BOARD DISTRICT

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2245290	M	W 155TH ST PED BRDG	AMTRAK 30 ST BRANCH	A	O-PED	3	CITY	11/15/00	4.015	FAIR	800	\$1,152,000.00	9
2246660	M	RIVERSIDE DRIVE	W 125TH ST & OTHERS		O	27	STATE	07/03/01	4.5	FAIR	148300	\$213,552,000.00	9
2246670	M	W 134 ST VIADUCT	RIVERSIDE DRIVE		O	3	STATE	06/15/01	5	GOOD	7927	\$11,414,880.00	9
2246720	M	RIVERSIDE DRIVE	W 158TH ST		O	77	STATE	08/30/01	3.541	FAIR	181400	\$261,216,000.00	9
2246980	M	RIVERSIDE DRIVE	W 138TH ST		O	1	STATE	07/11/00	4.633	FAIR	6700	\$9,648,000.00	9
2266229	M	HHP	PED UNDERPASS @ 148 ST		A	1	STATE	04/11/00	4.714	FAIR	1800	\$2,592,000.00	9
2267130	M	RIVERSIDE DRIVE	W 145TH ST		O	1	STATE	04/02/01	4.866	FAIR	5800	\$8,352,000.00	9
2245400	M	PED BRDG W OF 8TH AV	W 155TH ST		O-PED	1	CITY	11/20/00	1	POOR	400	\$576,000.00	10
2246490	M	A.C. POWELL BLVD N.B.	A.C. POWELL BLVD		O	1	STATE	04/21/00	4.061	FAIR	5600	\$8,064,000.00	10
2246710	M	W 153 ST	A.C. POWELL BLVD		O	1	STATE	04/20/00	4.388	FAIR	3082	\$4,438,080.00	10
2232180	M	E 103RD ST PED BRDG	FDR DRIVE		A-PED	20	CITY	05/30/01	4.897	FAIR	6000	\$8,640,000.00	11
2232190	M	E 111TH ST PED BRDG	FDR DRIVE		A-PED	14	CITY	01/27/02	3.8	FAIR	2600	\$3,744,000.00	11
2232200	M	E 120TH ST PED BRDG	FDR DRIVE		A-PED	23	CITY	04/08/01	4.3	FAIR	2500	\$3,600,000.00	11
2233059	M	HARLEM RIVER DRIVE	RAMP TO HRD N.B.		A	11	STATE	08/04/00	3.208	FAIR	51000	\$73,440,000.00	11
224005A	M	FROM FDR DRIVE	HARLEM RIVER DR		OR	19	STATE	06/14/00	4.059	FAIR	29900	\$43,056,000.00	11
224007A	M	TO MADISON AVENUE	RELIEF		OR	9	STATE	07/21/00	6.14	VGOOD	22600	\$32,544,000.00	11
2240620	M	WARDS ISLAND PED BRDG	HARLEM RIVER		WM-PED	10	CITY	10/08/00	4.049	FAIR	12600	\$18,144,000.00	11
2246620	M	PEDESTRIAN BRIDGE	E 128TH ST		O-PED	18	CITY	01/09/01	4.019	FAIR	2300	\$3,312,000.00	11
2246990	M	129 - 130 ST PED BRDG	RAMP OFF 3RD AVE		O-PED	5	CITY	09/06/00	4.095	FAIR	500	\$720,000.00	11
2229349	M	HHP	W 158 ST	A	A	44	STATE	11/08/00	4	FAIR	140000	\$201,600,000.00	12
222934A	M	RAMP TO N.B. HHP	AMTRAK WEST SIDE	A	AR	26	STATE	11/07/00	3.722	FAIR	10800	\$15,552,000.00	12
2229400	M	W 181ST ST PED BRDG	HHP N.B.		A-PED	6	CITY	10/24/00	3.429	FAIR	1500	\$2,160,000.00	12
2245040	M	FORT TRYON PARK	SOUTH OF CLOISTERS		O	1	CITY	04/05/01	5.467	GOOD	750	\$1,080,000.00	12
2245050	M	FORT TRYON PARK	UNDERPASS		O	1	CITY	04/06/99	4.6	FAIR	750	\$1,080,000.00	12
2245250	M	W 158TH ST	AMTRAK 30 ST BRANCH	A	O	7	STATE	08/14/01	6.43	VGOOD	29170	\$42,004,800.00	12
2245260	M	W 173RD ST PED BRDG	AMTRAK 30 ST BRANCH	A	O-PED	2	CITY	11/14/00	4.743	FAIR	1500	\$2,160,000.00	12
2245300	M	INWOOD HILL PK FTBR	AMTRAK 30 ST BRANCH	A	O-PED	6	CITY	11/13/00	4.472	FAIR	700	\$1,008,000.00	12
2245480	M	TO GWB OPP W 171ST ST	RIVERSIDE DRIVE		O	1	STATE	07/24/00	5.571	GOOD	10800	\$15,552,000.00	12
2246489	M	W 181 ST	RAMP TO WASH BR		O	1	STATE	03/06/00	4.766	FAIR	8200	\$11,808,000.00	12
2246500	M	FORT TRYON PLACE	ENTR FROM RIVERSIDE DR		O	1	STATE	04/17/00	4.366	FAIR	6600	\$9,504,000.00	12
2246510	M	CORBIN PL OVERPASS	CORBIN PLACE		O	1	STATE	03/16/00	4.933	FAIR	2200	\$3,168,000.00	12
2246600	M	W 176TH ST PED BRDG	APPROACH TO G.W.B.		O-PED	1	CITY	12/28/00	4.778	FAIR	1200	\$1,728,000.00	12
2246690	M	ISHAM PK VEHICULR	HARLEM RIVER INLET		O	1	STATE	04/26/00	4.366	FAIR	700	\$1,008,000.00	12
2266230	M	HHP	PED UNDERPASS INWD PK		A	1	STATE	02/17/00	4.909	FAIR	800	\$1,152,000.00	12
2266240	M	HHP	PED UNDERPASS INWD PK		A	1	STATE	03/14/00	5.857	GOOD	1100	\$1,584,000.00	12
2267240	M	HRD NB RAMP	HARLEM RIVER DR		A	51	STATE	10/18/01	3	POOR	112860	\$162,518,400.00	12
2268760	M	PS-5 PEDESTRIAN BR.	TENTH AVENUE		O-PED	5	CITY	06/19/01	6.592	VGOOD	1500	\$2,160,000.00	12
M00001	M	PEDESTRIAN TUNNEL	BROADWAY TO		O-PED	1	CITY	07/12/00	4.2	FAIR	2000	\$2,880,000.00	12
2245420	M	W 65TH ST E.B.	BRIDLE PATH W END		O	1	STATE	04/10/00	5.318	GOOD	1600	\$2,304,000.00	64
2246000	M	WEST DRIVE	PED BET 61ST & 62ST		O	1	STATE	04/13/00	5	GOOD	2500	\$3,600,000.00	64
2246030	M	PEDESTRIAN BRIDGE	POND		O-PED	1	CITY	03/22/00	3.857	FAIR	1400	\$2,016,000.00	64
2246050	M	CENTRAL DRIVE	PED OPP 63RD ST		O	1	STATE	04/14/00	5	GOOD	2000	\$2,880,000.00	64
2246069	M	EAST DRIVE	PEDESTRIAN WALK		O	1	STATE	04/21/00	4.566	FAIR	2700	\$3,888,000.00	64
2246070	M	CPK UNDER CENTR DR	OPP 65TH ST-IN E&W		O	1	CITY	06/08/99	5.733	GOOD	1200	\$1,728,000.00	64
2246080	M	WEST DRIVE	BRIDLE PATH @ 64TH ST		O	1	STATE	04/10/00	5.166	GOOD	2000	\$2,880,000.00	64
2246090	M	PED BRDG OPP 65 ST	TRANSVERSE RD #1		O-PED	1	CITY	11/12/00	4.655	FAIR	2300	\$3,312,000.00	64
2246100	M	CONTRAL DRIVE	TRANSVERSE RD #1		O	1	STATE	04/20/00	4.333	FAIR	6000	\$8,640,000.00	64
2246110	M	EAST DRIVE	TRANSVERSE RD #1		O	1	STATE	04/21/00	4.6	FAIR	6000	\$8,640,000.00	64
2246120	M	WEST DRIVE	TRANSVERSE RD #1		O	1	STATE	04/20/00	5	GOOD	7900	\$11,376,000.00	64
2246130	M	CENTRAL PARK	UNDER EAST DRIVE		O	1	CITY	02/15/01	4.207	FAIR	1200	\$1,728,000.00	64
2246140	M	72ND ST ENT TO W DR	BRIDLE PATH		O	1	STATE	02/21/00	5.066	GOOD	3600	\$5,184,000.00	64
2246150	M	72ND ST CROSS DR	NEAR CONCERT GRNDS		O	3	STATE	03/02/00	4.941	FAIR	7300	\$10,512,000.00	64
2246170	M	EAST DRIVE	PED WALK @ 73RD ST		O	1	STATE	02/28/00	5.018	GOOD	1900	\$2,736,000.00	64
2246230	M	EAST DRIVE	TRANSVERSE RD #2		O	1	STATE	04/19/00	4.6	FAIR	6500	\$9,360,000.00	64
2246240	M	WEST DRIVE	TRANSVERSE RD #2		O	1	STATE	04/19/00	4.166	FAIR	7200	\$10,368,000.00	64
2246250	M	EAST DRIVE	TRANSVERSE RD #3		O	1	STATE	02/01/00	4.466	FAIR	5100	\$7,344,000.00	64
2246260	M	WEST DRIVE	TRANSVERSE RD #3		O	1	STATE	01/28/00	4.8	FAIR	5100	\$7,344,000.00	64
2246270	M	EAST DRIVE	TRANSVERSE RD #4		O	1	STATE	01/31/00	3.966	FAIR	7000	\$10,080,000.00	64
2246280	M	WEST DRIVE	TRANSVERSE RD #4		O	1	STATE	01/26/00	4.166	FAIR	4700	\$6,768,000.00	64
2246330	M	WEST DRIVE	FEEDER TO LAKE		WO	1	STATE	02/29/00	5	GOOD	6700	\$9,648,000.00	64
2246350	M	CNTRL PK OVER E DRIVE	S OF CLEOPATRAS NDL		O	1	CITY	02/14/01	4.8	FAIR	750	\$1,080,000.00	64
2246360	M	WEST DRIVE	PED WALK OPP 82 ST		O	1	STATE	03/02/00	6.045	VGOOD	3100	\$4,464,000.00	64
2246400	M	E FOOTBRIDGE	TRANSVERSE RD #2		O-PED	1	CITY	10/13/01	4.5	FAIR	3700	\$5,328,000.00	64
2246430	M	WEST DRIVE	PED OPP 109TH ST		O	1	STATE	04/07/00	4.266	FAIR	1200	\$1,728,000.00	64
2246440	M	PED IN CTR OF PK	TRANSVERSE RD NO.2		O-PED	1	CITY	10/13/01	4.172	FAIR	5900	\$8,496,000.00	64
2246450	M	79 ST ENTR TO E DR	PED PATH OPP 77TH ST		O	1	STATE	02/23/00	5.19	GOOD	5000	\$7,200,000.00	64
2246460	M	77 ST ENTR TO W DR	PED PATH OPP 77TH ST		O	2	STATE	03/01/00	4.789	FAIR	5800	\$8,352,000.00	64
2246470	M	EAST DRIVE	THE LOCH		W	1	STATE	04/05/00	4.7	FAIR	1100	\$1,584,000.00	64
2240047	MQ	QUEENSBORO BRIDGE(LL)	EAST RIVER	L	WE	53	STATE	12/20/00	4.861	FAIR	626900	\$902,736,000.00	6
2240048	MQ	QUEENSBORO BRIDGE(UL)	EAST RIVER-LL		WE	37	STATE	12/20/00	4.471	FAIR	322300	\$464,112,000.00	6
2240640	MQ	ROOSEVELT ISLAND	E. RIVER E. CHANNEL		WM	8	STATE	03/20/00	4.347	FAIR	36500	\$52,560,000.00	8
2230600	Q	STEINWAY ST	2781 W.B. (B.Q.E.)		A	1	STATE	01/13/00	4.333	FAIR	4200	\$6,048,000.00	1
2230610	Q	STEINWAY ST	2781 E.B. (B.Q.E.)		A	1	STATE	01/12/00	4.027	FAIR	4200	\$6,048,000.00	1
2230620	Q	37TH ST	2781 (B.Q.E.)		A	2	STATE	03/10/00	4.486	FAIR	5300	\$7,632,000.00	1
2230630	Q	35TH ST	2781 (B.Q.E.)		A	4	STATE	06/21/00	4.875	FAIR	9000	\$12,960,000.00	1
2230640	Q	32ND ST	2781 (B.Q.E.)		A	2	STATE	05/04/01	4.93	FAIR	8100	\$11,664,000.00	1
2230657	Q	31ST ST	2781 (B.Q.E.)		A	2	STATE	06/02/00	5.083	GOOD	9500	\$13,680,000.00	1
2230690	Q	BQE EAST LEG NB	32ND AVE		A	1	STATE	04/25/01	4.312	FAIR	6160	\$8,870,400.00	1
2230700	Q	BQE EAST LEG	TO BQE WEST LEG		A	14	STATE	03/20/00	3.486	FAIR	16800	\$24,192,000.00	1
2230710	Q	2781 S.B. (B.Q.E.)	32ND AVE		A	1	STATE	08/31/00	4.39	FAIR	4500	\$6,480,000.00	1
2230720	Q	BQE EAST LEG	BQE NB WEST LEG		A	1	STATE	03/22/00	4.328	FAIR	2700	\$3,888,000.00	1
2230730	Q	31ST AVE	2781 (B.Q.E.)		A	1	STATE	05/24/01	3.546	FAIR	3700	\$5,328,000.00	1
2230740	Q	BQE WEST LEG SB	31ST AVE		A	1	STATE	06/26/00	4.531	FAIR	3700	\$5,328,000.00	1
2230750	Q	BQE EAST LEG SB	31ST AVE		A	1	STATE	07/03/00	4.156	FAIR	2900	\$4,176,000.00	1
2230760	Q	BQE WEST LEG NB	31ST AVE		A	1	STATE	07/25/01	4.109	FAIR	2900	\$4,176,000.00	1
2230770	Q	BQE WEST LEG	30TH AVE		A	1	STATE	06/18/01	4.468	FAIR	6500	\$9,360,000.00	1
2230790	Q	BULOVA AVE	BQE WEST LEG		A	2	STATE	03/03/00	5.761	GOOD	3300	\$4,752,000.00	1

INVENTORY SORTED BY BOROUGH AND COMMUNITY BOARD DISTRICT

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2230800	Q	49TH ST	BQE WEST LEG		A	2	STATE	03/10/00	5.388	GOOD	4900	\$7,056,000.00	1
2230810	Q	ASTORIA BLVD E.B.	BQE WEST LEG		A	4	STATE	03/29/00	4.308	FAIR	8200	\$11,808,000.00	1
2230820	Q	47TH ST	GCP		A	2	STATE	03/22/00	4.541	FAIR	5700	\$8,208,000.00	1
2230830	Q	BQE WEST LEG	GCP		A	2	STATE	06/09/00	4.916	FAIR	7600	\$10,944,000.00	1
2230840	Q	44TH ST	GCP		A	2	STATE	03/14/00	4.791	FAIR	5000	\$7,200,000.00	1
2230890	Q	49TH ST	GCP		A	2	STATE	06/01/00	4.777	FAIR	5500	\$7,920,000.00	1
224004G	Q	TO NY FROM 11TH ST	TERRAIN (CHAMBER)		OE	36	STATE	10/06/00	4.595	FAIR	8360	\$12,038,400.00	1
2240660	Q	RIKERS ISLAND BRIDGE	RIKERS ISL CHANNEL		W	56	STATE	09/06/01	4.647	FAIR	183100	\$263,664,000.00	1
1247280	Q	51 AVE PED BR.2247280	LIRR MAIN LINE	L	O-PED	5	CITY	11/20/01	3.355	FAIR	700	\$1,008,000.00	2
2230520	Q	65TH PLACE	278I (B.Q.E.)		A	2	STATE	01/11/00	4.75	FAIR	11600	\$16,704,000.00	2
2230530	Q	QUEENS BLVD	278I (B.Q.E.)		A	2	STATE	06/27/00	4.138	FAIR	23500	\$33,840,000.00	2
2230540	Q	WOODSIDE AVE	278I (B.Q.E.)		A	1	STATE	01/03/00	5.14	GOOD	7500	\$10,800,000.00	2
2230550	Q	69TH ST	278I (B.Q.E.)		A	2	STATE	03/02/00	5.017	GOOD	12600	\$18,144,000.00	2
2230560	Q	70TH ST	278I (B.Q.E.)		A	2	STATE	03/03/00	5.055	GOOD	8500	\$12,240,000.00	2
2230570	Q	41ST AVE	278I (B.Q.E.)		A	3	STATE	03/03/00	4.93	FAIR	8800	\$12,672,000.00	2
2230587	Q	ROOSEVELT AVE	278I (B.Q.E.)		A	2	STATE	01/19/00	4.529	FAIR	6600	\$9,504,000.00	2
2230590	Q	BROADWAY	278I (B.Q.E.)		O	2	STATE	04/20/00	3.894	FAIR	16000	\$23,040,000.00	2
2230669	Q	278I (B.Q.E.)	35TH AVE		A	1	STATE	04/26/01	3.718	FAIR	6500	\$9,360,000.00	2
2230679	Q	278I (B.Q.E.)	34TH AVE		A	3	STATE	03/30/00	4.166	FAIR	9500	\$13,680,000.00	2
2230680	Q	278I (B.Q.E.)	NORTHERN BLVD		A	1	STATE	03/28/00	4.377	FAIR	5900	\$8,496,000.00	2
2230869	Q	QUEENS BLVD	ACCESS RD BQE S.B.		A	1	STATE	04/10/00	4.09	FAIR	7900	\$11,376,000.00	2
224004E	Q	TO NY FR THOMSON AVE	JACKSON AVE		OE	64	STATE	12/15/00	3.886	FAIR	104600	\$150,624,000.00	2
224004F	Q	TO NY FROM 21ST ST	21ST ST (QUEENS)		OE	63	STATE	12/15/00	4.439	FAIR	63310	\$91,166,400.00	2
224004H	Q	TO 21ST ST FROM NY	22ND ST		OE	34	STATE	11/02/00	4.211	FAIR	48100	\$69,264,000.00	2
224004I	Q	TO THOMSON AVE FROM NY	JACKSON AVE		OE	38	STATE	11/28/00	5.377	GOOD	59100	\$85,104,000.00	2
2240410	Q	BORDEN AVE	DUTCH KILLS		WM	2	STATE	07/30/01	3.791	FAIR	8400	\$12,096,000.00	2
2240450	Q	HUNTERS PT AVE BRIDGE	DUTCH KILLS		WM	4	STATE	03/17/00	5.333	GOOD	11544	\$16,623,360.00	2
2247120	Q	WOODSIDE AVE	LIRR MAIN LINE	L	O	3	STATE	10/27/01	4.428	FAIR	14900	\$21,456,000.00	2
2247150	Q	65TH ST	LIRR N SIDE DIV	L	O	3	STATE	10/26/01	6.611	VGOOD	6000	\$8,640,000.00	2
2247160	Q	65TH PLACE	LIRR N SHR DIV	L	O	3	STATE	10/26/01	6.5	VGOOD	8381	\$12,068,640.00	2
2247260	Q	JACKSON AVE	LIRR,AMT,CON NE	L	O	1	STATE	08/02/00	6.316	VGOOD	4517	\$6,504,480.00	2
2247270	Q	21ST STREET	CONRAIL	C	O	6	STATE	07/16/01	5.736	GOOD	17590	\$25,329,600.00	2
2247290	Q	49TH AVE	LIRR,AMT,CON NE	L	O	5	STATE	08/04/00	4.027	FAIR	20200	\$29,088,000.00	2
2247300	Q	THOMPSON AVE	AMTRAK YARD	L	O	14	STATE	08/18/00	5.527	GOOD	61280	\$88,243,200.00	2
2247310	Q	QUEENS BLVD	AMTRAK & LIRR YARD	L	O	19	STATE	10/12/01	3.722	FAIR	92400	\$133,056,000.00	2
2247320	Q	HONEYWELL ST	AMTRAK & LIRR YARD	AL	O	22	STATE	12/07/01	2.328	POOR	98300	\$141,552,000.00	2
2247330	Q	39TH ST (NORTH)	SUNNYSIDE YARDS	AL	O	15	STATE	10/11/01	6.666	VGOOD	48200	\$69,408,000.00	2
2247370	Q	37TH AVE	CONRAIL HELLGATE	C	O	1	STATE	09/25/01	4.818	FAIR	5300	\$7,632,000.00	2
2247380	Q	ROOSEVELT AVE	CONRAIL HELLGATE	C	O	2	STATE	08/07/00	5.097	GOOD	5200	\$7,488,000.00	2
2247390	Q	41ST AVE	CONRAIL HELLGATE	C	O	2	STATE	09/24/01	4.942	FAIR	4000	\$5,760,000.00	2
2247400	Q	WOODSIDE AVE	CONRAIL	C	O	1	STATE	06/25/01	5.066	GOOD	8200	\$11,808,000.00	2
2247410	Q	43RD AVE	CONRAIL	C	O	1	STATE	06/25/01	5.033	GOOD	4800	\$6,912,000.00	2
2247420	Q	44TH AVE	CONRAIL	C	O	1	STATE	06/26/01	5.033	GOOD	5100	\$7,344,000.00	2
2247430	Q	45TH AVE	CONRAIL	C	O	1	STATE	06/27/01	3.918	FAIR	2400	\$3,456,000.00	2
2247640	Q	39 ST (SOUTH)	AMTRAK & LIRR YARD	AL	O	9	STATE	11/09/01	6.18	VGOOD	34100	\$49,104,000.00	2
2230780	Q	BQE EAST LEG	30TH AVE		A	3	STATE	03/08/00	4.097	FAIR	9400	\$13,536,000.00	3
1247010	Q	91 PLACE (2247010)	LIRR PT WASH BRANCH	L	O	3	STATE	06/30/00	3.318	FAIR	4200	\$6,048,000.00	4
2247020	Q	94TH ST PED BRDG	LIRR N SIDE DIV	L	O-PED	5	CITY	12/12/00	4.211	FAIR	500	\$720,000.00	4
2247180	Q	GRAND AVE	LIRR MAIN LINE	L	O	3	STATE	07/12/00	5	GOOD	7415	\$10,677,600.00	4
2247190	Q	55TH AVE PED BRDG	LIRR MAIN LINE	L	O-PED	3	CITY	12/07/00	4.429	FAIR	13000	\$18,720,000.00	4
2247620	Q	MYRTLE AVE	ABANDONED LIRR	L	O	3	STATE	01/28/00	5.277	GOOD	6725	\$9,684,000.00	4
1247560	Q	METROPOLITAN AVE	LIRR MONTAUK DIV	L	O	2	STATE	07/31/01	3.888	FAIR	20900	\$30,096,000.00	5
2230040	Q	CYPRESS HILLS ST	JACKIE ROBINSON PKWY		A	1	STATE	09/06/00	5.888	GOOD	5000	\$7,200,000.00	5
2230050	Q	CYP HILLS CEM WEST	JACKIE ROBINSON PKWY		A	3	STATE	04/24/01	4	FAIR	4400	\$6,336,000.00	5
2230070	Q	CYP HILLS CEM EAST	JACKIE ROBINSON PKWY		A	3	STATE	02/29/00	4.113	FAIR	4400	\$6,336,000.00	5
2230099	Q	JACKIE ROBINSON PKWY	CYPRESS HILLS CEMETRY		A	1	STATE	01/05/00	5.482	GOOD	4200	\$6,048,000.00	5
2247440	Q	GRAND AVE	CONRAIL	C	O	1	STATE	07/03/01	4.396	FAIR	3400	\$4,896,000.00	5
2247450	Q	57TH AVE	CONRAIL	C	O	1	STATE	07/02/01	6.195	VGOOD	2400	\$3,456,000.00	5
2247460	Q	CALDWELL AVE	CONRAIL	C	O	1	STATE	08/09/00	6.638	VGOOD	2243	\$3,229,920.00	5
2247470	Q	ELIOT AVE	CONRAIL	C	O	1	STATE	07/05/01	5.25	GOOD	3600	\$5,184,000.00	5
2247480	Q	JUNIPER BLVD SO	CONRAIL	C	O	1	STATE	07/06/01	5.833	GOOD	8500	\$12,240,000.00	5
2247490	Q	69TH ST JUNPR BLVD	CONRAIL	C	O	1	STATE	08/08/00	5.709	GOOD	6175	\$8,892,000.00	5
2247500	Q	METROPOLITAN AVE	CONRAIL	C	O	1	STATE	07/31/01	4.633	FAIR	18650	\$26,856,000.00	5
2247530	Q	ANDREWS AVE	LIRR MONTAUK DIV	L	O	4	STATE	08/06/01	4.241	FAIR	3200	\$4,608,000.00	5
2247540	Q	60TH ST	LIRR MONTAUK DIV	L	O	2	STATE	08/06/01	5.083	GOOD	5340	\$7,689,600.00	5
2247550	Q	ELIOT AVE	LIRR MONTAUK DIV	L	O	2	STATE	08/06/01	5.893	GOOD	9200	\$13,248,000.00	5
2247570	Q	80TH ST	71ST TO 77TH AVE	L	O	5	STATE	06/20/00	5	GOOD	11725	\$16,884,000.00	5
2247630	Q	PED BRG NEAR UNION TPK	ABANDONED LIRR		O-PED	8	CITY	08/29/00	5.154	GOOD	900	\$1,296,000.00	5
2247650	Q	60TH RD PED BRDG	LIRR MAIN LINE	L	O-PED	3	CITY	12/08/00	5.345	GOOD	2293	\$3,301,920.00	5
2248200	Q	RUST ST	FLUSHING AVE		O	1	STATE	06/06/01	5.546	GOOD	2900	\$4,176,000.00	5
2248220	Q	FLUSHING AV SERVICE	FLUSHING AVE		O	1	STATE	05/22/01	5.05	GOOD	3000	\$4,320,000.00	5
2248240	Q	SERVICE RD TURNAROUND	OVER FLUSHING AVE		O	1	STATE	05/22/01	5.186	GOOD	2900	\$4,176,000.00	5
2248300	Q	71ST AVE	COOPER AVE		O	1	STATE	05/17/01	4.44	FAIR	2800	\$4,032,000.00	5
1247200	Q	67 AVE PED BR 2247200	LIRR MAIN LINE	L	O-PED	3	CITY	11/19/01	4.479	FAIR	1300	\$1,872,000.00	6
2066002	Q	495I (2066000)	WOODHAVEN BLVD		A	2	STATE	05/15/01	4.319	FAIR	25200	\$36,288,000.00	6
2248159	Q	WOODHAVEN BLVD	QUEENS BLVD		O	2	STATE	03/24/00	4.307	FAIR	11500	\$16,560,000.00	6
1065210	Q	WHITESTONE EXP NB	BCIP (2065210)		A	1	STATE	05/01/00	4.682	FAIR	2500	\$3,600,000.00	7
2055801	Q	NORTHERN BLVD W.B.	FLUSHING RIVER		W	40	STATE	07/28/00	4.746	FAIR	71900	\$103,536,000.00	7
2055802	Q	NORTHERN BLVD E.B.	FLUSHING RIVER		W	40	STATE	08/29/00	4.38	FAIR	78894	\$113,607,360.00	7
205580A	Q	N.BLVD WB TO 678I SB	VACANT LAND		AR	16	STATE	09/14/00	5.09	GOOD	8600	\$12,384,000.00	7
2231900	Q	BCIP	FORT TOTTEN ENTRANCE		A	1	STATE	03/23/00	4.484	FAIR	4900	\$7,056,000.00	7
2231910	Q	UTOPIA PKWY	BCIP		A	2	STATE	01/18/00	4.789	FAIR	7200	\$10,368,000.00	7
2231920	Q	160TH ST	BCIP		A	2	STATE	05/09/01	6.319	VGOOD	5500	\$7,920,000.00	7
2231930	Q	FRANCIS LEWIS BLVD	BCIP		A	3	STATE	01/20/00	4.772	FAIR	9100	\$13,104,000.00	7
2231940	Q	CLINTONVILLE ST	BCIP		A	2	STATE	01/21/00	4.727	FAIR	7400	\$10,656,000.00	7
2231950	Q	150TH ST	BCIP		A	2	STATE	01/21/00	4.363	FAIR	5900	\$8,496,000.00	7

## INVENTORY SORTED BY BOROUGH AND COMMUNITY BOARD DISTRICT

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2231960	Q	149TH ST	BCIP		A	2	STATE	01/13/00	4.5	FAIR	6100	\$8,784,000.00	7
2231970	Q	14TH AVE	BCIP		A	2	STATE	01/13/00	4.613	FAIR	8100	\$11,664,000.00	7
2231980	Q	147TH ST	BCIP		A	2	STATE	01/12/00	4.727	FAIR	6300	\$9,072,000.00	7
2247040	Q	UNION ST	LIRR N SIDE DIV	L	O	1	STATE	07/17/01	6.39	VGOOD	3313	\$4,770,720.00	7
2247050	Q	BOWNE AVE	LIRR N SIDE DIV	L	O	1	STATE	06/23/00	5.862	GOOD	4974	\$7,162,560.00	7
2247060	Q	PARSONS BLVD	LIRR N SIDE DIV	L	O	1	STATE	06/26/00	5.333	GOOD	4200	\$6,048,000.00	7
2247070	Q	147TH ST	LIRR N SIDE DIV	L	O	1	STATE	07/18/01	5.745	GOOD	2800	\$4,032,000.00	7
2247080	Q	149TH ST	LIRR N SIDE DIV	L	O	1	STATE	07/20/01	4.857	FAIR	4100	\$5,904,000.00	7
2247090	Q	149TH PLACE	LIRR N SIDE DIV	L	O	2	STATE	07/19/01	5.385	GOOD	4300	\$6,192,000.00	7
2247100	Q	150TH ST	LIRR N SIDE DIV	L	O	2	STATE	07/23/01	6.588	VGOOD	7830	\$11,275,200.00	7
2247110	Q	MURRAY ST	LIRR N SIDE DIV	L	O	1	STATE	07/24/01	5.555	GOOD	4000	\$5,760,000.00	7
2266160	Q	6781 SB TO BCIP EB	ACCESS RD FROM 6781		A	1	STATE	04/05/00	4.593	FAIR	2300	\$3,312,000.00	7
7705510	Q	167TH ST PED BRDG	LIRR PORT WASH BRANCH	L	O-PED	3	CITY	12/05/00	4.438	FAIR	600	\$864,000.00	7
2267199	Q	FRANCIS LEWIS BLVD	PARK ROAD		O	1	STATE	06/14/01	5.333	GOOD	7085	\$10,202,400.00	8
2230209	Q	QUEENS BLVD	JACKIE ROBINSON PKWY	T	A	5	STATE	05/19/00	4.698	FAIR	90000	\$129,600,000.00	9
2247220	Q	80TH ROAD	LIRR MAIN LINE	L	O	3	STATE	09/14/01	4.873	FAIR	4100	\$5,904,000.00	9
2247230	Q	82ND AVE	LIRR MAIN LINE	L	O	3	STATE	09/14/01	5.442	GOOD	4100	\$5,904,000.00	9
2247240	Q	LEFFERTS BLVD	LIRR MAIN LINE	L	O	3	STATE	09/05/01	5.972	GOOD	5460	\$7,862,400.00	9
2247590	Q	FOREST PARK DRIVE	LIRR MONTAUK DIV	L	O	5	STATE	08/27/01	5.543	GOOD	6000	\$8,640,000.00	9
2247600	Q	PARK LANE SOUTH	LIRR MONTAUK DIV	AL	O	3	STATE	06/22/00	7	VGOOD	5900	\$8,496,000.00	9
2247660	Q	FOREST PARK DRIVE	ABANDONED LIRR	L	O	6	STATE	07/27/01	5.253	GOOD	10000	\$14,400,000.00	9
2248019	Q	WOODHAVEN BLVD	ATLANTIC AVE		O	3	STATE	06/29/00	4.472	FAIR	19400	\$27,936,000.00	9
2248299	Q	INTER PKWY-UNION TPK	AUSTIN ST		O	1	STATE	01/05/00	4.75	FAIR	5900	\$8,496,000.00	9
2248340	Q	FOREST PARK DR	MYRTLE AVE		O	3	STATE	05/08/01	5.19	GOOD	5100	\$7,344,000.00	9
2231559	Q	CROSS BAY BLVD	BSHP		A	4	STATE	03/14/00	5.25	GOOD	23205	\$33,415,200.00	10
2231560	Q	S CONDUIT BLVD	BSOP		A	2	STATE	03/15/00	5.633	GOOD	15776	\$22,717,440.00	10
2231570	Q	COHANCY ST	BSOP		A	2	STATE	03/15/00	4.727	FAIR	6400	\$9,216,000.00	10
2231580	Q	AQUEDUCT RCTK RAMP	BSOP		A	4	STATE	08/28/00	4.375	FAIR	14000	\$20,160,000.00	10
2231590	Q	130TH ST	BSOP		A	2	STATE	01/14/00	4.818	FAIR	6800	\$9,792,000.00	10
2240650	Q	163RD ST PED BRDG	HAWTREE BASIN		W-PED	13	CITY	11/03/00	4.667	FAIR	5000	\$7,200,000.00	10
2248020	Q	WHITELAW PED BRDG	CONDUIT AVE		O-PED	7	CITY	09/06/00	4.887	FAIR	5500	\$7,920,000.00	10
2248039	Q	CROSS BAY BLVD	CONDUIT BLVD		O	2	STATE	06/26/01	3.638	FAIR	17000	\$24,480,000.00	10
2248040	Q	LINDEN BLVD	CONDUIT AVE		O	1	STATE	03/20/00	5.266	GOOD	3352	\$4,826,880.00	10
2248250	Q	102ND ST	HAWTREE BASIN		WO	7	STATE	07/17/01	6.941	VGOOD	3200	\$4,608,000.00	10
2231860	Q	W ALLEY ROAD	BCIP		A	2	STATE	06/06/00	5.636	GOOD	7200	\$10,368,000.00	11
2231870	Q	NORTHERN BLVD	BCIP		A	2	STATE	12/08/00	6.652	VGOOD	8900	\$12,816,000.00	11
2231880	Q	CROCHERON PK PED	BCIP		A-PED	9	CITY	02/27/01	3.806	FAIR	2300	\$3,312,000.00	11
2231890	Q	28TH AVE PED BRDG	BCIP		A-PED	24	CITY	03/15/01	4.833	FAIR	7600	\$10,944,000.00	11
2240440	Q	NORTHERN BLVD	ALLEY CREEK		W	2	STATE	03/27/00	4.986	FAIR	8300	\$11,952,000.00	11
2247130	Q	CORPORAL KENNEDY ST	LIRR N SIDE DIV	L	O	2	STATE	10/09/01	6.529	VGOOD	4340	\$6,249,600.00	11
2247140	Q	BELL BLVD	LIRR N SIDE DIV	L	O	1	STATE	07/30/01	5.881	GOOD	4320	\$6,220,800.00	11
2247170	Q	DOUGLSTON PKWY	LIRR N SIDE DIV	L	O	3	STATE	06/28/00	5.423	GOOD	6300	\$9,072,000.00	11
2247680	Q	221ST ST	LIRR N SIDE DIV	L	O	3	STATE	07/26/01	5.882	GOOD	6050	\$8,712,000.00	11
2266129	Q	WINCHESTER BLVD S.B.	BCIP		A	1	STATE	03/21/00	4.659	FAIR	4400	\$6,336,000.00	11
2266139	Q	WINCHESTER BLVD N.B.	BCIP		A	1	STATE	03/22/00	4.795	FAIR	6400	\$9,216,000.00	11
7703720	Q	216TH ST PED BRDG	LIRR PORT WASH BRANCH	L	O-PED	5	CITY	12/07/00	4.102	FAIR	400	\$576,000.00	11
2248160	Q	ELLIOT AVE	QUEENS BLVD		O	2	STATE	07/11/00	4.771	FAIR	13785	\$19,850,400.00	12
2231610	Q	GUY R. BREWER BLVD	BSOP		A	2	STATE	05/22/01	4.113	FAIR	7300	\$10,512,000.00	13
2231620	Q	FARMERS BLVD	BSOP		A	2	STATE	06/07/01	4.568	FAIR	6400	\$9,216,000.00	13
2231630	Q	SPRINGFIELD BLVD	BSOP		A	2	STATE	03/15/00	4.636	FAIR	8500	\$12,240,000.00	13
2231640	Q	225TH ST	BSOP		A	2	STATE	04/26/00	4.545	FAIR	7000	\$10,080,000.00	13
2231650	Q	SUNRISE HWY W.B.	BLP E.B.		A	1	STATE	03/02/00	4.622	FAIR	4100	\$5,904,000.00	13
2231660	Q	SUNRISE HWY W.B.	BLP W.B.		A	2	STATE	04/28/00	4.656	FAIR	5350	\$7,704,000.00	13
2231670	Q	N CONDUIT AVE W.B.	BLP E.B.		A	1	STATE	01/05/00	4.916	FAIR	4000	\$5,760,000.00	13
2231680	Q	N CONDUIT AVE WB	BLP W.B.		A	2	STATE	01/07/00	4.84	FAIR	6500	\$9,360,000.00	13
2231690	Q	FRANCIS LEWIS BLVD	BLP E.B.		A	1	STATE	03/13/00	5.333	GOOD	6000	\$8,640,000.00	13
2231700	Q	FRANCIS LEWIS BLVD	BLP W.B.		A	1	STATE	02/24/00	5.066	GOOD	6000	\$8,640,000.00	13
2231710	Q	MERRICK BLVD	BLP E.B.		A	1	STATE	03/10/00	4.133	FAIR	6000	\$8,640,000.00	13
2231720	Q	MERRICK BLVD	BLP W.B.		A	1	STATE	03/10/00	4.2	FAIR	6000	\$8,640,000.00	13
2231730	Q	130TH AVE	BLP E.B.		A	1	STATE	01/03/00	5	GOOD	4400	\$6,336,000.00	13
2231740	Q	130TH AVE	BLP W.B.		A	1	STATE	01/04/00	4.666	FAIR	4400	\$6,336,000.00	13
2231750	Q	LINDEN BLVD	BCIP		A	2	STATE	01/28/00	4.068	FAIR	6700	\$9,648,000.00	13
2231760	Q	BCIP	DUTCH BROADWAY-115 AVE		A	1	STATE	01/14/00	4.428	FAIR	7300	\$10,512,000.00	13
2231770	Q	BELMONT PARK RAMP	BCIP		A	1	STATE	02/24/00	4.875	FAIR	3200	\$4,608,000.00	13
2231780	Q	HEMPSTEAD AVE	BCIP		A	2	STATE	05/01/01	4.225	FAIR	14200	\$20,448,000.00	13
2231800	Q	SUPERIOR ROAD	BCIP		A	2	STATE	02/28/00	4.227	FAIR	7000	\$10,080,000.00	13
2231819	Q	JAMAICA AVE	BCIP		A	2	STATE	02/17/00	4.59	FAIR	11500	\$16,560,000.00	13
2231829	Q	BRADDOCK AVE	BCIP		A	2	STATE	02/01/00	4.681	FAIR	10600	\$15,264,000.00	13
2231840	Q	HILLSIDE AVE	BCIP		A	2	STATE	05/19/00	4.184	FAIR	9672	\$13,927,680.00	13
2231850	Q	UNION TPKE	BCIP		A	2	STATE	08/29/01	4.318	FAIR	13600	\$19,584,000.00	13
2248129	Q	UNION TPKE	CREEDMOORE HOSP RD		O	1	STATE	05/25/01	5.166	GOOD	3500	\$5,040,000.00	13
2266149	Q	HEMPSTEAD AVE	CROSS ISLAND PKWY		A	2	STATE	05/12/00	4.076	FAIR	9500	\$13,680,000.00	13
2266770	Q	CROSS ISLAND PKWY	LAURELTON PKWY		A	1	STATE	05/05/00	5.111	GOOD	9508	\$13,691,520.00	13
2268770	Q	SPRINGFIELD BLVD	EQUES. PATH (ABAND.)		O	1	STATE	06/29/01	4.777	FAIR	1470	\$2,116,800.00	13
2300130	Q	HOOK CREEK	HOOK CREEK BRIDGE		W	3	STATE	07/18/01	6.474	VGOOD	18302	\$26,354,880.00	13
Q00002	Q	BCIP	PATH OPPOSITE 88TH RD		A	1	CITY	03/20/01	5.633	GOOD	1200	\$1,728,000.00	13
2240507	Q	ROOSEVELT AVE	6781 - VAN WYCK EXPWY		W	27	STATE	06/12/00	3.507	FAIR	84424	\$121,570,560.00	81
2248260	Q	FLUSHING MEADOW PARK	MEADOW LAKE & 69TH RD		WO	5	STATE	03/02/00	4.8	FAIR	4200	\$6,048,000.00	81
2230120	Q	MYRTLE AVE	JACKIE ROBINSON PKWY		A	1	STATE	03/01/00	5	GOOD	6400	\$9,216,000.00	82
2230179	Q	JACKIE ROBINSON PKWY	METROPOLITAN AVE		A	2	STATE	01/13/00	5.035	GOOD	8673	\$12,489,120.00	82
2230180	Q	UNION TPKE	JACKIE ROBINSON PKWY		A	1	STATE	02/16/00	5.812	GOOD	5359	\$7,716,960.00	82
2230190	Q	MARKWOOD ROAD	JACKIE ROBINSON PKWY		A	1	STATE	02/23/00	5.333	GOOD	4400	\$6,336,000.00	82
2248369	Q	ROCKAWAY BLVD	THURSTON BASIN		WO	2	STATE	07/31/01	3.947	FAIR	6000	\$8,640,000.00	83
2248230	Q	BEACH CHANNEL DR WB	BEACH CHANNEL DR EB		O	1	STATE	06/15/01	4.533	FAIR	3600	\$5,184,000.00	84
2267160	Q	ROOSEVELT AVE	FLUSHING MDW PK ROAD		O	4	STATE	06/12/01	4.746	FAIR	7280	\$10,483,200.00	84
2249040	R	TOMPKINS AVE	B&O RR (ABANDONED)		O	1	STATE	02/29/00	6.515	VGOOD	5096	\$7,338,240.00	1
2249070	R	JOHN ST	B&O RAILROAD	O	O-PED	3	CITY	02/13/01	6.806	VGOOD	5800	\$8,352,000.00	1
2249090	R	MORNINGSTAR ROAD	B&O RAILROAD	O	O	4	STATE	04/24/01	5.508	GOOD	7900	\$11,376,000.00	1
2249100	R	GRANITE AVE	B&O RAILROAD	O	O	4	STATE	02/21/00	6.372	VGOOD	7300	\$10,512,000.00	1

INVENTORY SORTED BY BOROUGH AND COMMUNITY BOARD DISTRICT

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2249110	R	LAKE AVE	B&O RAILROAD	O	O	3	STATE	04/23/01	6	GOOD	5900	\$8,496,000.00	1
2249120	R	SIMONSON AVE	B&O RAILROAD	O	O	3	STATE	04/30/01	6.111	VGOOD	5819	\$8,379,360.00	1
2249130	R	VAN NAME AVE	B&O RAILROAD	O	O	3	STATE	04/25/01	5.389	GOOD	5474	\$7,882,560.00	1
2249140	R	VAN PELT AVE	B&O RAILROAD	O	O	3	STATE	04/27/01	5.779	GOOD	5000	\$7,200,000.00	1
2249160	R	DE HART AVE	B&O RAILROAD	O	O	4	STATE	05/02/01	6.518	VGOOD	6700	\$9,648,000.00	1
2249170	R	UNION AVE	B&O RAILROAD	O	O	4	STATE	05/07/01	5.425	GOOD	6500	\$9,360,000.00	1
2249180	R	HARBOR ROAD	B&O RAILROAD	O	O	4	STATE	05/01/01	6.254	VGOOD	6615	\$9,525,600.00	1
2249200	R	SOUTH AVE	B&O RAILROAD	O	O	5	STATE	06/09/00	2.469	POOR	10100	\$14,544,000.00	1
2249510	R	TOMPKINS AVE	WILLOW AVE, SIRT	S	O	2	STATE	06/21/00	5.915	GOOD	5378	\$7,744,320.00	1
2249520	R	HANNAH ST	SIRT SOUTH SHORE	S	O	10	STATE	09/07/01	5.322	GOOD	10020	\$14,428,800.00	1
2249530	R	MINTHORNE ST PED BRDG	SIRT SOUTH SHORE	S	O-PED	23	CITY	10/10/00	7	VGOOD	1600	\$2,304,000.00	1
2249760	R	MARTLINGS AVE	RICHMOND LAKE DAM		WO	2	STATE	05/11/01	4.933	FAIR	7000	\$10,080,000.00	1
2249800	R	FOREST AVE	CLOVE LAKES PK STREAM		WO	1	STATE	10/01/01	4.766	FAIR	1600	\$2,304,000.00	1
2249840	R	TOMPKINS AVE	GREENFIELD AVE		O	1	STATE	03/01/00	5.744	GOOD	2562	\$3,689,280.00	1
2240350	R	RICHMOND AVE	RICHMOND CREEK		W	3	STATE	07/24/01	6.152	VGOOD	32589	\$46,928,160.00	2
2249060	R	McCLEAN AVE	B&O RR (ABANDONED)		O	1	STATE	02/28/00	3.981	FAIR	2500	\$5,600,000.00	2
2249400	R	BEACH AVE	SIRT SOUTH SHORE	S	O	2	STATE	08/15/01	5.818	GOOD	3700	\$5,328,000.00	2
2249410	R	ROSS AVE	SIRT SOUTH SHORE	S	O	2	STATE	07/27/01	5.5	GOOD	3800	\$5,472,000.00	2
2249420	R	ROSE AVE	SIRT SOUTH SHORE	S	O	2	STATE	07/30/01	5.712	GOOD	3800	\$5,472,000.00	2
2249430	R	NEW DORP LANE	SIRT SOUTH SHORE	S	O	2	STATE	08/16/01	5.06	GOOD	7600	\$10,944,000.00	2
2249440	R	BANCROFT AVE	SIRT SOUTH SHORE	S	O	3	STATE	08/22/01	5.622	GOOD	5900	\$8,496,000.00	2
2249450	R	FREMONT AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	3	CITY	03/29/00	4.821	FAIR	800	\$1,152,000.00	2
2249460	R	LINCOLN AVE	SIRT SOUTH SHORE	S	O	1	STATE	08/23/01	5.807	GOOD	4500	\$6,480,000.00	2
2249470	R	MIDLAND AVE	SIRT SOUTH SHORE	S	O	1	STATE	08/27/01	5.634	GOOD	3000	\$4,320,000.00	2
2249480	R	FINGERBOARD ROAD	SIRT SOUTH SHORE	S	O	2	STATE	08/28/01	6.777	VGOOD	5100	\$7,344,000.00	2
2249490	R	CLOVE ROAD	SIRT SOUTH SHORE	S	O	3	STATE	06/20/00	6.222	VGOOD	8200	\$11,808,000.00	2
2249860	R	SLATER BLVD	NEW CREEK		WO	1	STATE	04/20/01	4.264	FAIR	3500	\$5,040,000.00	2
2249870	R	TRAVIS AVE	MAIN CREEK		WO	1	STATE	02/21/00	4.218	FAIR	1700	\$2,448,000.00	2
2249880	R	CHELSEA ROAD	SAWMILL CREEK		WO	1	STATE	05/24/01	7	VGOOD	2197	\$3,163,680.00	2
2249210	R	MAIN ST PED BRDG	SIRT SOUTH SHORE	S	O-PED	9	CITY	03/15/00	4.895	FAIR	400	\$576,000.00	3
2249230	R	TRACY AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	9	CITY	03/13/00	3.968	FAIR	200	\$288,000.00	3
2249240	R	ARTHUR KILL ROAD	SIRT SOUTH SHORE	S	O	1	STATE	06/02/00	4.944	FAIR	3700	\$5,328,000.00	3
2249250	R	BETHEL AV PED BRDG	SIRT SOUTH SHORE	S	O-PED	12	CITY	06/15/00	3.739	FAIR	500	\$720,000.00	3
2249269	R	PAGE AVE	SIRT SOUTH SHORE	S	O	4	STATE	07/26/01	6.361	VGOOD	30420	\$43,804,800.00	3
2249270	R	RICHMMD VALLY ROAD	SIRT SOUTH SHORE	S	O	4	STATE	08/21/01	5.327	GOOD	9300	\$13,392,000.00	3
2249280	R	COZZINS BLVD PED BRDG	SIRT SOUTH SHORE	S	O-PED	7	CITY	03/22/00	4.913	FAIR	200	\$288,000.00	3
2249290	R	SEGUINE AVE	SIRT SOUTH SHORE	S	O	1	STATE	07/31/01	6.468	VGOOD	2200	\$3,168,000.00	3
2249300	R	HUGUENOT AVE	SIRT SOUTH SHORE	S	O	2	STATE	08/02/01	4.818	FAIR	4900	\$7,056,000.00	3
2249320	R	ALBEE AVE	SIRT SOUTH SHORE	S	O	3	STATE	08/04/01	4.786	FAIR	6500	\$9,360,000.00	3
2249330	R	ANNADALE ROAD	SIRT SOUTH SHORE	S	O	2	STATE	08/08/01	4.454	FAIR	4500	\$6,480,000.00	3
2249350	R	NELSON AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	1	CITY	03/14/00	5.176	GOOD	300	\$432,000.00	3
2249360	R	GIFFORDS LANE	SIRT SOUTH SHORE	S	O	1	STATE	06/19/00	5.718	GOOD	3042	\$4,380,480.00	3
2249370	R	GREAVES AVE	SIRT SOUTH SHORE	S	O	3	STATE	07/11/01	7	VGOOD	6100	\$8,784,000.00	3
2249380	R	GUYON AVE	SIRT SOUTH SHORE	S	O	3	STATE	08/14/01	4.836	FAIR	6900	\$9,936,000.00	3
2249390	R	CEDARVIEW AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	5	CITY	03/14/00	4.684	FAIR	600	\$864,000.00	3
2249580	R	BELFIELD AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	5	CITY	03/13/00	4.333	FAIR	400	\$576,000.00	3
2249810	R	HYLAN BLVD	LEMON CREEK		WO	1	STATE	09/12/00	6.625	VGOOD	11400	\$16,416,000.00	3
2249820	R	ARTHUR KILL ROAD	ARTHUR KILL STREAM		WO	1	STATE	04/19/01	4.122	FAIR	2000	\$2,880,000.00	3
2268920	R	AMBOY ROAD	LEMON CREEK		WO	1	STATE	02/07/00	7	VGOOD	1444	\$2,079,360.00	3
<b>752 BRIDGES</b>						<b>4564</b>	<b>SPANS</b>					<b>\$20,589,892,320.00</b>	

## INVENTORY SORTED BY FEATURE CARRIED

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2248250	Q	102ND ST	HAWTREE BASIN		WO	7	STATE	07/17/01	6.941	VGOOD	3200	\$4,608,000.00	10
2243630	K	11TH AVE	LIRR & SEA BEACH	LT	O	5	STATE	10/20/00	6.808	VGOOD	9700	\$13,968,000.00	10
2245209	M	11TH AVE	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/27/00	4.529	FAIR	15400	\$22,176,000.00	4
2245010	M	11TH AVE VIADUCT	LIRR WEST SIDE YARD	AL	O	39	STATE	11/21/00	3.75	FAIR	157500	\$228,800,000.00	4
2246990	M	129 - 130 ST PED BRDG	RAMP OFF 3RD AVE		O-PED	5	CITY	09/06/00	4.095	FAIR	500	\$720,000.00	11
2231730	Q	130TH AVE	BLP E.B.		A	1	STATE	01/03/00	5	GOOD	4400	\$6,336,000.00	13
2231740	Q	130TH AVE	BLP W.B.		A	1	STATE	01/04/00	4.666	FAIR	4400	\$6,336,000.00	13
2231590	Q	130TH ST	BSOP		A	2	STATE	01/14/00	4.818	FAIR	6800	\$9,792,000.00	10
2243640	K	13TH AVE	LIRR & SEA BEACH	LT	O	5	STATE	11/08/01	4.666	FAIR	16000	\$23,040,000.00	10
2240089	BM	145TH ST BRIDGE	HARLEM RIVER		WM	8	STATE	05/30/00	3.347	FAIR	56700	\$81,648,000.00	10
2231980	Q	147TH ST	BCIP		A	2	STATE	01/12/00	4.727	FAIR	6300	\$9,072,000.00	7
2247070	Q	147TH ST	LIRR N SIDE DIV	L	O	1	STATE	07/18/01	5.745	GOOD	2800	\$4,032,000.00	7
2247090	Q	149TH PLACE	LIRR N SIDE DIV	L	O	2	STATE	07/19/01	5.385	GOOD	4300	\$6,192,000.00	7
2231960	Q	149TH ST	BCIP		A	2	STATE	01/13/00	4.5	FAIR	6100	\$8,784,000.00	7
2247080	Q	149TH ST	LIRR N SIDE DIV	L	O	1	STATE	07/20/01	4.857	FAIR	4100	\$5,904,000.00	7
2231970	Q	14TH AVE	BCIP		A	2	STATE	01/13/00	4.613	FAIR	8100	\$11,664,000.00	7
2243650	K	14TH AVE	LIRR BAY RIDGE	N	O	4	STATE	11/10/00	4.285	FAIR	10000	\$14,400,000.00	11
2231950	Q	150TH ST	BCIP		A	2	STATE	01/21/00	4.363	FAIR	5900	\$8,496,000.00	7
2247100	Q	150TH ST	LIRR N SIDE DIV	L	O	2	STATE	07/23/01	6.588	VGOOD	7830	\$11,275,200.00	7
2243340	K	15TH AVE	LIRR BAY RIDGE	N	O	1	STATE	11/03/00	4.607	FAIR	3614	\$5,204,160.00	11
2243670	K	15TH AVE	BMT SEA BEACH	T	O	6	STATE	11/12/01	4.136	FAIR	17300	\$24,912,000.00	11
2231920	Q	160TH ST	BCIP		A	2	STATE	05/09/01	6.319	VGOOD	5500	\$7,920,000.00	7
2240650	Q	163RD ST PED BRDG	HAWTREE BASIN		W-PED	13	CITY	11/03/00	4.667	FAIR	5000	\$7,200,000.00	10
7705510	Q	167TH ST PED BRDG	LIRR PORT WASH BRANCH	L	O-PED	3	CITY	12/05/00	4.438	FAIR	600	\$864,000.00	7
2243360	K	16TH AVE	LIRR BAY RIDGE	N	O	1	STATE	11/03/00	6.816	VGOOD	5300	\$7,632,000.00	11
2243680	K	16TH AVE	BMT SEA BEACH	T	O	4	STATE	04/14/00	5.372	GOOD	6816	\$9,815,040.00	11
206672A	B	174TH ST-NTH PED BRDG	895I - SHERIDAN EXPWY		A-PED	4	CITY	12/12/00	4.958	FAIR	1800	\$2,592,000.00	9
206672B	B	174TH ST-STH PED BRDG	895I - SHERIDAN EXPWY		A-PED	4	CITY	12/12/00	4.0903	FAIR	1900	\$2,736,000.00	9
2243370	K	17TH AVE	LIRR BAY RIDGE	N	O	1	STATE	02/29/00	5.313	GOOD	3406	\$4,904,640.00	12
2243690	K	17TH AVE	BMT SEA BEACH	T	O	4	STATE	11/14/01	3.71	FAIR	8500	\$12,240,000.00	11
2231300	K	17TH AVE PED BRDG	BSHP		A-PED	1	CITY	12/15/00	3.846	FAIR	2100	\$3,024,000.00	11
2243380	K	18TH AVE	LIRR BAY RIDGE	N	O	1	STATE	02/29/00	5.421	GOOD	6006	\$8,648,640.00	12
2243700	K	18TH AVE	BMT SEA BEACH	T	O	4	STATE	11/16/01	3.909	FAIR	8700	\$12,528,000.00	11
2243710	K	19TH AVE	BMT SEA BEACH	T	O	4	STATE	04/07/00	4.026	FAIR	4800	\$6,912,000.00	11
2241259	B	204TH ST PED BRDG	METRO NORTH RR HAR	M	O-PED	1	CITY	08/01/00	3.95	FAIR	4700	\$6,768,000.00	27
2243720	K	20TH AVE	BMT SEA BEACH	T	O	6	STATE	04/06/00	4.538	FAIR	12500	\$18,000,000.00	11
7703720	Q	216TH ST PED BRDG	LIRR PORT WASH BRANCH	L	O-PED	5	CITY	12/07/00	4.102	FAIR	400	\$576,000.00	11
2243820	K	21ST AVE	BMT SEA BEACH	T	O	4	STATE	11/29/01	4.131	FAIR	21400	\$30,816,000.00	11
2247270	Q	21ST STREET	CONRAIL	C	O	6	STATE	07/16/01	5.736	GOOD	17590	\$25,329,600.00	2
2247680	Q	221ST ST	LIRR N SIDE DIV	L	O	3	STATE	07/26/01	5.882	GOOD	6050	\$8,712,000.00	11
2231640	Q	225TH ST	BSOP		A	2	STATE	04/26/00	4.545	FAIR	7000	\$10,080,000.00	13
2229450	B	232ND ST	HHP		A	2	STATE	10/12/01	4.342	FAIR	4900	\$7,056,000.00	8
2229460	B	236TH ST PED BRDG	HHP		A-PED	3	CITY	11/13/01	4.672	FAIR	2500	\$3,600,000.00	8
2229470	B	239TH ST	HHP		A	2	STATE	08/02/01	4.71	FAIR	6100	\$8,784,000.00	8
2229490	B	246TH ST	HHP		A	2	STATE	06/26/01	4.552	FAIR	5600	\$8,064,000.00	8
2229500	B	252ND ST	HHP		A	2	STATE	01/14/00	4.342	FAIR	4500	\$6,480,000.00	8
2232070	M	25TH ST PED BRDG	FDR DRIVE		A-PED	4	CITY	06/03/01	5.266	GOOD	1700	\$2,448,000.00	6
224004J	M	25X	NYC GARAGE		OE	14	STATE	10/31/00	4.893	FAIR	22058	\$31,763,520.00	6
2230400	K	278I (B.Q.E.)	ATLANTIC AVE		A	1	STATE	10/04/00	5.88	GOOD	14230	\$20,491,200.00	6
2230410	K	278I (B.Q.E.)	WASHINGTON ST		A	1	STATE	10/12/00	4.656	FAIR	2500	\$3,600,000.00	2
2230420	K	278I (B.Q.E.)	WASHINGTON ST		A	1	STATE	10/12/00	4.906	FAIR	2500	\$3,600,000.00	2
2230430	K	278I (B.Q.E.)	PROSPECT ST		A	1	STATE	01/06/00	5.266	GOOD	1100	\$1,584,000.00	2
2230440	K	278I (B.Q.E.)	ADAMS ST N.B.		A	1	STATE	01/05/00	5.2	GOOD	2700	\$3,888,000.00	2
2230450	K	278I (B.Q.E.)	ADAMS ST S.B.		A	1	STATE	01/05/00	4.933	FAIR	2500	\$3,600,000.00	2
2230460	K	278I (B.Q.E.)	PEARL ST		A	1	STATE	01/04/00	5.333	GOOD	4500	\$6,480,000.00	2
2230470	K	278I (B.Q.E.)	JAY ST		A	1	STATE	01/04/00	5.233	GOOD	5100	\$7,344,000.00	2
2230480	K	278I (B.Q.E.)	PROSPECT ST		A	1	STATE	01/06/00	5.351	GOOD	8400	\$12,096,000.00	2
2230490	K	278I (B.Q.E.)	SANDS ST		A	1	STATE	01/06/00	5.277	GOOD	12600	\$18,144,000.00	2
2230500	K	278I (B.Q.E.)	RAMP TO BQE EB		A	1	STATE	01/06/00	5.566	GOOD	1300	\$1,872,000.00	2
2230510	K	278I (B.Q.E.)	NASSAU ST		A	6	STATE	01/13/00	4.444	FAIR	51200	\$73,728,000.00	2
2230669	Q	278I (B.Q.E.)	35TH AVE		A	1	STATE	04/26/01	3.718	FAIR	6500	\$9,360,000.00	2
2230679	Q	278I (B.Q.E.)	34TH AVE		A	3	STATE	03/30/00	4.166	FAIR	9500	\$13,680,000.00	2
2230680	Q	278I (B.Q.E.)	NORTHERN BLVD		A	1	STATE	03/28/00	4.377	FAIR	5900	\$8,496,000.00	2
2230857	K	278I (B.Q.E.)	JORALEMON ST		A	1	STATE	09/07/00	5.03	GOOD	2100	\$3,024,000.00	2
2230858	K	278I (B.Q.E.)	JORALEMON ST / BQE WB		A	2	STATE	09/08/00	3.758	FAIR	5900	\$8,496,000.00	2
2230888	K	278I E.B. (B.Q.E.)	CADMAN PLAZA / 278I WB		A	2	STATE	11/13/00	4.842	FAIR	4500	\$6,480,000.00	2
2268498	K	278I E.B. (B.Q.E.)	278I W.B. (B.Q.E.)		A	69	STATE	06/20/01	3.827	FAIR	120734	\$173,856,960.00	2
2268508	K	278I E.B. (B.Q.E.)	278I W.B. (B.Q.E.)		A	11	STATE	05/21/01	3.62	FAIR	17956	\$25,856,640.00	2
2268518	K	278I E.B. (B.Q.E.)	278I W.B. (B.Q.E.)		A	5	STATE	05/17/01	4.285	FAIR	8375	\$12,060,000.00	2
2230710	Q	278I S.B. (B.Q.E.)	32ND AVE		A	1	STATE	08/31/00	4.39	FAIR	4500	\$6,480,000.00	1
2230887	K	278I W.B. (B.Q.E.)	CADMAN PLAZA		A	2	STATE	10/18/00	4.338	FAIR	4500	\$6,480,000.00	2
2268497	K	278I W.B. (B.Q.E.)	FURMAN ST		A	45	STATE	06/11/01	4.375	FAIR	78022	\$112,351,680.00	2
2268507	K	278I W.B. (B.Q.E.)	YORK ST		A	6	STATE	06/25/01	4.205	FAIR	9380	\$13,507,200.00	2
2268517	K	278I W.B. (B.Q.E.)	FURMAN ST		A	7	STATE	05/16/01	4.205	FAIR	10988	\$15,822,720.00	2
2231330	K	27TH AVE PED BRDG	BSHP		A-PED	1	CITY	06/07/00	4.366	FAIR	2100	\$3,024,000.00	13
2231890	Q	28TH AVE PED BRDG	BCIP		A-PED	24	CITY	03/15/01	4.833	FAIR	7600	\$10,944,000.00	11
2243310	K	2ND AVE	LIRR BAY RIDGE	N	O	6	STATE	08/29/01	3.865	FAIR	17000	\$24,480,000.00	10
2230730	Q	31ST AVE	278I (B.Q.E.)		A	1	STATE	05/24/01	3.546	FAIR	3700	\$5,328,000.00	1
2230657	Q	31ST ST	278I (B.Q.E.)		A	2	STATE	06/02/00	5.083	GOOD	9500	\$13,680,000.00	1
2230640	Q	32ND ST	278I (B.Q.E.)		A	2	STATE	05/04/01	4.93	FAIR	8100	\$11,664,000.00	1
2230630	Q	35TH ST	278I (B.Q.E.)		A	4	STATE	06/21/00	4.875	FAIR	9000	\$12,960,000.00	1
2247370	Q	37TH AVE	CONRAIL HELLGATE	C	O	1	STATE	09/25/01	4.818	FAIR	5300	\$7,632,000.00	2
2230620	Q	37TH ST	278I (B.Q.E.)		A	2	STATE	03/10/00	4.486	FAIR	5300	\$7,632,000.00	1
2247640	Q	39 ST (SOUTH)	AMTRAK & LIRR YARD	AL	O	9	STATE	11/09/01	6.18	VGOOD	34100	\$49,104,000.00	2
2247330	Q	39TH ST (NORTH)	SUNNYSIDE YARDS	AL	O	15	STATE	10/11/01	6.666	VGOOD	48200	\$69,408,000.00	2
2243320	K	3RD AVE	LIRR BAY RIDGE	N	O	4	STATE	08/30/01	5.708	GOOD	17230	\$24,811,200.00	10
2244160	K	3RD AVE	SHORE RD DRIVE		O	1	STATE	05/11/01	7	VGOOD	7100	\$10,224,000.00	10
2230570	Q	41ST AVE	278I (B.Q.E.)		A	3	STATE	03/03/00	4.93	FAIR	8800	\$12,672,000.00	2
2247390	Q	41ST AVE	CONRAIL HELLGATE	C	O	2	STATE	09/24/01	4.942	FAIR	4000	\$5,760,000.00	2

INVENTORY SORTED BY FEATURE CARRIED

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2247410	Q	43RD AVE	CONRAIL	C	O	1	STATE	06/25/01	5.033	GOOD	4800	\$6,912,000.00	2
2247420	Q	44TH AVE	CONRAIL	C	O	1	STATE	06/26/01	5.033	GOOD	5100	\$7,344,000.00	2
2230840	Q	44TH ST	GCP		A	2	STATE	03/14/00	4.791	FAIR	5000	\$7,200,000.00	1
2247430	Q	45TH AVE	CONRAIL	C	O	1	STATE	06/27/01	3.918	FAIR	2400	\$3,456,000.00	2
2230820	Q	47TH ST	GCP		A	2	STATE	03/22/00	4.541	FAIR	5700	\$8,208,000.00	1
2066002	Q	4951 (2066000)	WOODHAVEN BLVD		A	2	STATE	05/15/01	4.319	FAIR	25200	\$36,288,000.00	6
2247290	Q	49TH AVE	LIRR,AMT,CON NE	L	O	5	STATE	08/04/00	4.027	FAIR	20200	\$29,088,000.00	2
2230800	Q	49TH ST	BQE WEST LEG		A	2	STATE	03/10/00	5.388	GOOD	4900	\$7,056,000.00	1
2230890	Q	49TH ST	GCP		A	2	STATE	06/01/00	4.777	FAIR	5500	\$7,920,000.00	1
2231270	K	4TH AVE	BSHP		A	2	STATE	01/24/00	4.71	FAIR	6100	\$6,784,000.00	10
2243330	K	4TH AVE	LIRR BAY RIDGE	NT	O	6	STATE	11/05/01	5.916	GOOD	19400	\$27,936,000.00	10
2243839	K	4TH AVE	NYCTA BMT TRACKS	T	O	1	STATE	05/05/00	3.129	FAIR	4100	\$5,904,000.00	7
2243400	K	50TH ST	LIRR BAY RIDGE	N	O	2	STATE	09/13/01	4.771	FAIR	7100	\$10,224,000.00	12
1247280	Q	51 AVE PED BR.2247280	LIRR MAIN LINE	L	O-PED	5	CITY	11/20/01	3.355	FAIR	700	\$1,008,000.00	2
2243390	K	52ND ST	LIRR BAY RIDGE	N	O	2	STATE	09/10/01	4.21	FAIR	2800	\$4,032,000.00	12
2247190	Q	55TH AVE PED BRDG	LIRR MAIN LINE	L	O-PED	3	CITY	12/07/00	4.429	FAIR	13000	\$18,720,000.00	4
2247450	Q	57TH AVE	CONRAIL	C	O	1	STATE	07/02/01	6.195	VGOOD	2400	\$3,456,000.00	5
2066100	K	5TH AVE	27 X PROSPECT EXPWY		A	1	STATE	01/27/00	5.25	GOOD	8800	\$12,672,000.00	7
2243580	K	5TH AVE	LIRR & SEA BEACH	LT	O	4	STATE	05/03/00	4.472	FAIR	12500	\$18,000,000.00	10
2244480	K	5TH AVE	GREENWOOD CEMETERY		O	1	STATE	05/14/01	5	GOOD	3600	\$5,184,000.00	7
2247650	Q	60TH RD PED BRDG	LIRR MAIN LINE	L	O-PED	3	CITY	12/08/00	5.345	GOOD	2293	\$3,301,920.00	5
2243350	K	60TH ST	LIRR BAY RIDGE	N	O	1	STATE	09/07/01	6.866	VGOOD	3900	\$5,616,000.00	11
2247540	Q	60TH ST	LIRR MONTAUK DIV	L	O	2	STATE	08/06/01	5.083	GOOD	5340	\$7,689,600.00	5
2230520	Q	65TH PLACE	2781 (B.Q.E.)		A	2	STATE	01/11/00	4.75	FAIR	11600	\$16,704,000.00	2
2247160	Q	65TH PLACE	LIRR N SHR DIV	L	O	3	STATE	10/26/01	6.5	VGOOD	8381	\$12,068,640.00	2
2243730	K	65TH ST	BMT SEA BEACH	T	O	4	STATE	03/31/00	5.947	GOOD	12000	\$17,280,000.00	11
2247150	Q	65TH ST	LIRR N SIDE DIV	L	O	3	STATE	10/26/01	6.611	VGOOD	6000	\$8,640,000.00	2
1247200	Q	67 AVE PED BR 2247200	LIRR MAIN LINE	L	O-PED	3	CITY	11/19/01	4.479	FAIR	1300	\$1,872,000.00	6
2266160	Q	6781 SB TO BCIP EB	ACCESS RD FROM 6781		A	1	STATE	04/05/00	4.593	FAIR	2300	\$3,312,000.00	7
2230550	Q	69TH ST	2781 (B.Q.E.)		A	2	STATE	03/02/00	5.017	GOOD	12600	\$18,144,000.00	2
2247490	Q	69TH ST JUNPR BLVD	CONRAIL	C	O	1	STATE	08/08/00	5.709	GOOD	6175	\$8,892,000.00	5
2243280	K	6TH AVE	LIRR ATLANTIC AVE	L	O	9	STATE	10/06/00	4.902	FAIR	12276	\$17,677,440.00	8
2243590	K	6TH AVE	LIRR & SEA BEACH	LT	O	5	STATE	05/02/00	3.583	FAIR	14200	\$20,448,000.00	10
2230560	Q	70TH ST	2781 (B.Q.E.)		A	2	STATE	03/03/00	5.055	GOOD	8500	\$12,240,000.00	2
2248300	Q	71ST AVE	COOPER AVE		O	1	STATE	05/17/01	4.44	FAIR	2800	\$4,032,000.00	5
2246150	M	72ND ST CROSS DR	NEAR CONCERT GRNDS		O	3	STATE	03/02/00	4.941	FAIR	7300	\$10,512,000.00	64
2246140	M	72ND ST ENT TO W DR	BRIDLE PATH		O	1	STATE	02/21/00	5.066	GOOD	3600	\$5,184,000.00	64
2246460	M	77 ST ENTR TO W DR	PED PATH OPP 77TH ST		O	2	STATE	03/01/00	4.789	FAIR	5800	\$8,352,000.00	64
2246450	M	79 ST ENTR TO E DR	PED PATH OPP 77TH ST		O	1	STATE	02/23/00	5.19	GOOD	5000	\$7,200,000.00	64
2267717	M	79 ST PED PLAZA	79 ST BT BASIN GAR		A	10	STATE	04/25/01	4.592	FAIR	27400	\$39,456,000.00	7
226771B	M	79 ST RAMP TO GAR	79 ST BT BASIN GAR		AR	21	STATE	09/26/01	4.403	FAIR	7114	\$10,244,160.00	7
226771A	M	79 ST RAMP TO HHP	79 ST BT BASIN GAR		AR	4	STATE	05/22/01	4.241	FAIR	3131	\$4,508,640.00	7
2267718	M	79 ST TRAFFIC CIRC	79 ST PED PLAZA		A	34	STATE	09/26/01	3.803	FAIR	24130	\$34,747,200.00	7
2243600	K	7TH AVE	LIRR & SEA BEACH	LT	O	7	STATE	05/01/00	5.402	GOOD	18913	\$27,234,720.00	10
2243920	K	7TH AVE	NYCTA BMT YARD	T	O	2	STATE	05/11/00	3.916	FAIR	5200	\$7,488,000.00	7
2247220	Q	80TH ROAD	LIRR MAIN LINE	L	O	3	STATE	09/14/01	4.873	FAIR	4100	\$5,904,000.00	9
2247570	Q	80TH ST	71ST TO 77TH AVE	L	O	5	STATE	06/20/00	5	GOOD	11725	\$16,884,000.00	5
2231250	K	81ST ST PED BR	BSHP		A-PED	5	CITY	11/07/00	5.222	GOOD	3100	\$4,464,000.00	10
2247230	Q	82ND AVE	LIRR MAIN LINE	L	O	3	STATE	09/14/01	5.442	GOOD	4100	\$5,904,000.00	9
2243570	K	86TH ST	LIRR & SEA BEACH	LT	O	6	STATE	03/24/00	6.25	VGOOD	18200	\$26,208,000.00	13
2243610	K	8TH AVE	LIRR & SEA BEACH	LT	O	4	STATE	11/07/01	4.37	FAIR	11400	\$16,416,000.00	10
1247010	Q	91 PLACE (2247010)	LIRR PT WASH BRANCH	L	O	3	STATE	06/30/00	3.318	FAIR	4200	\$6,048,000.00	4
2231260	K	92ND ST PED BR	BSHP		A-PED	6	CITY	05/09/00	4.161	FAIR	3000	\$4,320,000.00	10
2247020	Q	94TH ST PED BRDG	LIRR N SIDE DIV	L	O-PED	5	CITY	12/12/00	4.211	FAIR	500	\$720,000.00	4
2243840	K	9TH AVE	NYCTA BMT YARD	T	O	5	STATE	12/10/01	6.777	VGOOD	12440	\$17,913,600.00	12
2243940	K	9TH AVE	NYCTA IND SBWY	T	O	5	STATE	12/06/01	4.754	FAIR	11900	\$17,136,000.00	12
2246490	M	A.C. POWELL BLVD N.B.	A.C. POWELL BLVD		O	1	STATE	04/21/00	4.061	FAIR	5600	\$8,064,000.00	10
2249320	R	ALBEE AVE	SIRT SOUTH SHORE	S	O	3	STATE	08/04/01	4.786	FAIR	6500	\$9,360,000.00	3
2268920	R	AMBOY ROAD	LEMON CREEK		WO	1	STATE	02/07/00	7	VGOOD	1444	\$2,079,360.00	3
2247530	Q	ANDREWS AVE	LIRR MONTAUK DIV	L	O	4	STATE	08/06/01	4.241	FAIR	3200	\$4,608,000.00	5
2249330	R	ANNADALE ROAD	SIRT SOUTH SHORE	S	O	2	STATE	08/08/01	4.454	FAIR	4500	\$6,480,000.00	3
2231580	Q	AQUEDUCT RCTK RAMP	BSOP		A	4	STATE	08/28/00	4.375	FAIR	14000	\$20,160,000.00	10
2249240	R	ARTHUR KILL ROAD	SIRT SOUTH SHORE	S	O	1	STATE	06/02/00	4.944	FAIR	3700	\$5,328,000.00	3
2249820	R	ARTHUR KILL ROAD	ARTHUR KILL STREAM		WO	1	STATE	04/19/01	4.122	FAIR	2000	\$2,880,000.00	3
2230810	Q	ASTORIA BLVD E.B.	BQE WEST LEG		A	4	STATE	03/29/00	4.308	FAIR	8200	\$11,808,000.00	1
2243569	K	ATLANTIC AVE	LIRR ATLANTIC AVE	L	O	75	STATE	11/20/00	3.666	FAIR	135100	\$194,544,000.00	16
2244170	K	ATLNTC AV SVC RD E.B.	EAST NEW YORK AVE		O	2	STATE	05/03/01	4.543	FAIR	5500	\$7,920,000.00	5
2244180	K	ATLNTC AV SVC RD W.B.	EAST NEW YORK AVE		O	2	STATE	05/07/01	4.491	FAIR	6200	\$8,928,000.00	16
2243530	K	AVENUE H	LIRR BAY RIDGE	N	O	2	STATE	09/28/01	6.823	VGOOD	35100	\$50,544,000.00	18
2243750	K	AVENUE O	BMT SEA BEACH	T	O	4	STATE	11/20/01	6.568	VGOOD	4658	\$6,707,520.00	11
2243760	K	AVENUE P	BMT SEA BEACH	T	O	4	STATE	11/21/01	6.883	VGOOD	6000	\$8,640,000.00	11
2243790	K	AVENUE S	BMT SEA BEACH	T	O	4	STATE	12/03/01	6.6	VGOOD	4800	\$6,912,000.00	15
2243800	K	AVENUE T	BMT SEA BEACH	T	O	4	STATE	11/27/01	6.5	VGOOD	8500	\$12,240,000.00	11
2243810	K	AVENUE U	BMT SEA BEACH	T	O	4	STATE	03/27/00	6.725	VGOOD	8500	\$12,240,000.00	15
2231370	K	B 8TH ST ACCESS RMP	BSHP		A	4	STATE	05/31/00	4.097	FAIR	12800	\$18,432,000.00	13
2249440	R	BANCROFT AVE	SIRT SOUTH SHORE	S	O	3	STATE	08/22/01	5.622	GOOD	5900	\$8,496,000.00	2
2241180	B	BARRETTO ST	AMTRAK	A	O	1	STATE	05/26/00	6.281	VGOOD	5313	\$7,650,720.00	2
2232000	M	BATTERY PLACE	FDR DRIVE		AT	2	CITY	06/13/01	4.614	FAIR	75000	\$108,000,000.00	1
2231290	K	BAY 8TH ST	BSHP		A	1	STATE	05/09/01	6.206	VGOOD	4920	\$7,084,800.00	11
2243740	K	BAY PKWY	BMT SEA BEACH	T	O	4	STATE	12/04/01	5.078	GOOD	16800	\$24,192,000.00	11
2231760	Q	BCIP	DUTCH BROADWAY-115 AVE		A	1	STATE	01/14/00	4.428	FAIR	7300	\$10,512,000.00	13
2231900	Q	BCIP	FORT TOTTEN ENTRANCE		A	1	STATE	03/23/00	4.484	FAIR	4900	\$7,056,000.00	7
Q00002	Q	BCIP	PATH OPPOSITE 88TH RD		A	1	CITY	03/20/01	5.633	GOOD	1200	\$1,728,000.00	13
2076109	B	BE NB SERVICE RD	HUTCHINSON RVR PKWY		A	2	STATE	10/09/01	4.736	FAIR	7800	\$11,232,000.00	10
2076129	B	BE SB SERVICE RD	HUTCHINSON RVR PKWY		A	2	STATE	02/09/00	5	GOOD	7100	\$10,224,000.00	10
2249400	R	BEACH AVE	SIRT SOUTH SHORE	S	O	2	STATE	08/15/01	5.818	GOOD	3700	\$5,328,000.00	2
2248230	Q	BEACH CHANNEL DR WB	BEACH CHANNEL DR EB		O	1	STATE	06/15/01	4.533	FAIR	3600	\$5,184,000.00	84
2243490	K	BEDFORD AVE	LIRR BAY RIDGE	N	O	6	STATE	03/07/00	4.777	FAIR	12000	\$17,280,000.00	14
2241840	B	BEDFORD PARK BLVD	METRO NORTH RR HAR	M	O	1	STATE	03/07/00	4.616	FAIR	6400	\$9,216,000.00	27

## INVENTORY SORTED BY FEATURE CARRIED

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2241930	B	BEDFORD PARK BLVD	NYCTA IND YARDS	T	O	17	STATE	08/31/00	6.5	VGOOD	46300	\$66,672,000.00	7
2249580	R	BELFIELD AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	5	CITY	03/13/00	4.333	FAIR	400	\$576,000.00	3
2247140	Q	BELL BLVD	LIRR N SIDE DIV	L	O	1	STATE	07/30/01	5.881	GOOD	4320	\$6,220,800.00	11
2231770	Q	BELMONT PARK RAMP	BCIP		A	1	STATE	02/24/00	4.875	FAIR	3200	\$4,608,000.00	13
2249250	R	BETHEL AV PED BRDG	SIRT SOUTH SHORE	S	O-PED	12	CITY	06/15/00	3.739	FAIR	500	\$720,000.00	3
2243100	K	BEVERLY ROAD	BMT SUBWAY, BRIGHTON	T	O	3	STATE	10/22/01	3.982	FAIR	2700	\$3,888,000.00	14
2243900	K	BLAKE AVE	LIRR BAY RIDGE LINE	N	O	3	STATE	04/14/00	5.309	GOOD	4900	\$7,056,000.00	16
2240410	Q	BORDEN AVE	DUTCH KILLS		WM	2	STATE	07/30/01	3.791	FAIR	8400	\$12,096,000.00	2
2229579	B	BOSTON POST ROAD	HUTCHINSON RIVER		W	14	STATE	07/13/01	4.611	FAIR	95700	\$137,808,000.00	12
2242110	B	BOSTON ROAD	BRONX RIVER		WO	1	STATE	04/07/00	4.25	FAIR	6200	\$8,928,000.00	27
2242100	B	BOTANICAL GARDEN ROAD	TWIN LAKES		O-PED	1	STATE	04/12/00	4.966	FAIR	2200	\$3,168,000.00	27
2247050	Q	BOWNE AVE	LIRR N SIDE DIV	L	O	1	STATE	06/23/00	5.862	GOOD	4974	\$7,162,560.00	7
2230700	Q	BQE EAST LEG	TO BQE WEST LEG		A	14	STATE	03/20/00	3.486	FAIR	16800	\$24,192,000.00	1
2230720	Q	BQE EAST LEG	BQE NB WEST LEG		A	1	STATE	03/22/00	4.328	FAIR	2700	\$3,888,000.00	1
2230780	Q	BQE EAST LEG	30TH AVE		A	3	STATE	03/08/00	4.097	FAIR	9400	\$13,536,000.00	3
2230690	Q	BQE EAST LEG NB	32ND AVE		A	1	STATE	04/25/01	4.312	FAIR	6160	\$8,870,400.00	1
2230750	Q	BQE EAST LEG SB	31ST AVE		A	1	STATE	07/03/00	4.156	FAIR	2900	\$4,176,000.00	1
2230770	Q	BQE WEST LEG	30TH AVE		A	1	STATE	06/18/01	4.468	FAIR	6500	\$9,360,000.00	1
2230830	Q	BQE WEST LEG	GCP		A	2	STATE	06/09/00	4.916	FAIR	7600	\$10,944,000.00	1
2230760	Q	BQE WEST LEG NB	31ST AVE		A	1	STATE	07/25/01	4.109	FAIR	2900	\$4,176,000.00	1
2230740	Q	BQE WEST LEG SB	31ST AVE		A	1	STATE	06/26/00	4.531	FAIR	3700	\$5,328,000.00	1
2231829	Q	BRADDOCK AVE	BCIP		A	2	STATE	02/01/00	4.681	FAIR	10600	\$15,264,000.00	13
2232168	M	BREARLY SCHOOL	FDR DR PROMENADE		A	7	STATE	05/16/97	4.649	FAIR	3700	\$5,328,000.00	8
2230590	Q	BROADWAY	2781 (B.Q.E.)		O	2	STATE	04/20/00	3.894	FAIR	16000	\$23,040,000.00	2
2240137	BM	BROADWAY BRIDGE	HARLEM RIVER	T	WM	3	STATE	10/17/01	3.93	FAIR	38100	\$54,864,000.00	12
2242072	B	BRONX BLVD N.B.	BRONX RIVER		WO	1	STATE	05/17/00	4.766	FAIR	1800	\$2,592,000.00	12
2242082	B	BRONX BLVD N.B.	BRONX RIVER		WO	1	STATE	05/16/00	4.466	FAIR	2800	\$4,032,000.00	12
2242071	B	BRONX BLVD S.B.	BRONX RIVER		WO	1	STATE	04/13/00	4.7	FAIR	1800	\$2,592,000.00	12
2242081	B	BRONX BLVD S.B.	BRONX RIVER		WO	1	STATE	05/16/00	4.466	FAIR	2800	\$4,032,000.00	12
2075849	B	BRONX PELHAM PKWY	HUTCHINSON RVR PKWY		A	2	STATE	06/30/00	4.184	FAIR	17600	\$25,344,000.00	10
2229560	B	BRONX PELHAM PKWY	AMTRAK,METRO NORTH	MA	A	3	STATE	07/06/00	4.861	FAIR	24591	\$35,411,040.00	11
2242010	B	BRONX PELHAM PKWY	BRONX RIVER		W	1	STATE	07/05/00	4.931	FAIR	9200	\$13,248,000.00	27
2065629	B	BRONX RVR PKWY	BOSTON RD BX ZOO		A	1	STATE	09/20/01	5.275	GOOD	6300	\$9,072,000.00	27
2243520	K	BROOKLYN AVE	LIRR BAY RIDGE	N	O	3	STATE	09/27/01	5.92	GOOD	4500	\$6,480,000.00	18
2267860	K	BROOKLYN BR APPROACH	SANDS STREET		O	1	STATE	11/21/00	4.66	FAIR	6490	\$9,345,600.00	2
2240019	KM	BROOKLYN BRIDGE	2781 (B.Q.E.)		WE	75	STATE	11/30/00	2.93	POOR	503788	\$725,454,720.00	3
2268350	K	BROOKLYN PROMENADE	2781 N.B. (B.Q.E.)		A-PED	35	CITY	08/04/00	4.286	FAIR	46184	\$66,504,960.00	6
2241099	B	BRUCKNER BLVD	CONRAIL PT MORRIS	C	O	1	STATE	09/15/00	6.796	VGOOD	6700	\$9,648,000.00	1
2266540	B	BRUCKNER BLVD OVRPAS	133RD - 135TH ST		A	2	STATE	06/19/01	4.548	FAIR	32900	\$47,376,000.00	1
1066510	B	BRUCKNER EXP.(2066510)	WESTCHESTER CREEK		WM	17	STATE	07/27/01	3.835	FAIR	39400	\$56,736,000.00	9
2076929	B	BRUCKNER EXPWY	AMTRAK	A	A	1	STATE	07/02/01	4.9	FAIR	3800	\$5,472,000.00	2
2066672	B	BRUCKNER EXPWY NB	BRONX RIVER		WM	8	STATE	07/30/01	4.761	FAIR	22300	\$32,112,000.00	2
2075352	B	BRUCKNER EXPWY NB	AMTRAK	A	A	1	STATE	07/12/00	3.484	FAIR	10900	\$15,696,000.00	2
2066671	B	BRUCKNER EXPWY SB	BRONX RIVER		WM	3	STATE	07/20/01	5.527	GOOD	12400	\$17,856,000.00	2
2075351	B	BRUCKNER EXPWY SB	AMTRAK	A	A	1	STATE	07/14/00	3.718	FAIR	11600	\$16,704,000.00	2
2241210	B	BRYANT AVE	AMTRAK	A	O	1	STATE	06/28/01	3.152	FAIR	5300	\$7,632,000.00	2
2231249	K	BSHP	BAY RIDGE AVE		A	1	STATE	11/27/00	3.566	FAIR	4900	\$7,056,000.00	10
2231319	K	BSHP	BAY PKWY		A	1	STATE	10/25/00	4.345	FAIR	7200	\$10,368,000.00	11
2231329	K	BSHP	26TH AVE		A	1	STATE	10/25/00	4.466	FAIR	6700	\$9,648,000.00	13
2231360	K	BSHP	OCEAN PKWY		A	2	STATE	05/30/01	3.361	FAIR	11800	\$16,992,000.00	13
2231409	K	BSHP	SHEEPSHEAD BAY ROAD		A	1	STATE	01/19/00	4.967	FAIR	6500	\$9,360,000.00	15
2231419	K	BSHP	OCEAN AVE		A	3	STATE	01/19/00	4.43	FAIR	14000	\$20,160,000.00	15
2231429	K	BSHP	BEDFORD AVE		A	3	STATE	08/04/00	4.388	FAIR	12000	\$17,280,000.00	15
2231439	K	BSHP	NOSTRAND AVE		A	3	STATE	08/04/00	4.041	FAIR	13000	\$18,720,000.00	15
2231450	K	BSHP	GERRITSEN INLET		WA	11	STATE	08/03/01	3.582	FAIR	46400	\$66,816,000.00	56
2231479	K	BSHP	MILL BASIN		WM	14	STATE	07/23/01	3.313	FAIR	73500	\$105,840,000.00	18
2231489	K	BSHP	PAERDEGAT BASIN		WA	15	STATE	07/20/01	3.24	FAIR	58300	\$83,952,000.00	18
2231499	K	BSHP	ROCKAWAY PKWY		A	4	STATE	05/31/01	3.833	FAIR	11500	\$16,560,000.00	56
2231509	K	BSHP	FRESH CREEK		WA	5	STATE	07/17/01	3.166	FAIR	23000	\$33,120,000.00	56
2230790	Q	BULOVA AVE	BQE WEST LEG		A	2	STATE	03/03/00	5.761	GOOD	3300	\$4,752,000.00	1
2247460	Q	CALDWELL AVE	CONRAIL	C	O	1	STATE	08/09/00	6.638	VGOOD	2243	\$3,229,920.00	5
2243290	K	CARLTON AVE	LIRR ATLANTIC AVE	L	O	7	STATE	03/02/00	4.986	FAIR	10823	\$15,585,120.00	8
2240260	K	CARROLL ST	GOWANUS CANAL		WM	2	STATE	06/22/01	4.69	FAIR	3000	\$5,000,000.00	6
2243220	K	CARROLL ST PED BRDG	FRANKLIN SHUTTLE	T	O-PED	3	CITY	07/07/00	5.484	GOOD	600	\$864,000.00	9
2243050	K	CATON AVE	BMT SUBWAY, BRIGHTON	T	O	4	STATE	10/24/01	4.5	FAIR	20800	\$29,952,000.00	14
2249390	R	CEDARVIEW AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	5	CITY	03/14/00	4.684	FAIR	600	\$864,000.00	3
2244050	K	CENTRAL DRIVE	PED PATH & STREAM		W	3	STATE	04/27/01	5.315	GOOD	7400	\$10,656,000.00	55
2246050	M	CENTRAL DRIVE	PED OPP 63RD ST		O	1	STATE	04/14/00	5	GOOD	2000	\$2,880,000.00	64
2246130	M	CENTRAL PARK	UNDER EAST DRIVE		O	1	CITY	02/15/01	4.207	FAIR	1200	\$1,728,000.00	64
2268480	M	CHAMBERS ST PED BRDG	WEST SIDE HWY		O-PED	8	CITY	06/05/00	6.623	VGOOD	3344	\$4,815,360.00	1
2249880	R	CHELSEA ROAD	SAWMILL CREEK		WO	1	STATE	05/24/01	7	VGOOD	2197	\$3,163,680.00	2
2243080	K	CHURCH AVE	BMT SUBWAY, BRIGHTON	T	O	4	STATE	10/26/01	4.545	FAIR	18200	\$26,208,000.00	14
2240210	B	CITY ISLAND ROAD	EASTCHESTER BAY		W	7	STATE	10/04/01	3.472	FAIR	28900	\$41,616,000.00	28
2241710	B	CLAREMONT PKWY	METRO NORTH RR HAR	M	O	1	STATE	02/23/00	4.421	FAIR	6300	\$9,072,000.00	3
2244060	K	CLEFT RIDGE SPAN	PROSPECT PARK		O	1	CITY	06/21/01	4.5	FAIR	900	\$1,296,000.00	55
2231940	Q	CLINTONVILLE ST	BCIP		A	2	STATE	01/21/00	4.727	FAIR	7400	\$10,656,000.00	7
2249490	R	CLOVE ROAD	SIRT SOUTH SHORE	S	O	3	STATE	06/20/00	6.222	VGOOD	8200	\$11,808,000.00	2
2246350	M	CNTRL PK OVER E DRIVE	S OF CLEOPATRAS NDL		O	1	CITY	02/14/01	4.8	FAIR	750	\$1,080,000.00	64
2231570	Q	COHANCY ST	BSOP		A	2	STATE	03/15/00	4.727	FAIR	6400	\$9,216,000.00	10
2230870	K	COLUMBIA HEIGHTS	2781 (B.Q.E.)		A	1	STATE	11/27/00	4.583	FAIR	16500	\$23,760,000.00	2
2241590	B	CONCOURSE VILL AVE	METRO NORTH RR HAR	M	O	1	STATE	03/02/00	3.906	FAIR	17800	\$25,632,000.00	1
2244460	K	CONDUIT BLVD NB	ATLANTIC AVE EB		O	1	STATE	02/10/00	4.666	FAIR	3800	\$5,472,000.00	5
2231380	K	CONEY ISLAND AVE	BSHP		A	4	STATE	02/17/00	3.555	FAIR	20600	\$29,664,000.00	13
2243440	K	CONEY ISLAND AVE	LIRR BAY RIDGE	N	O	1	STATE	03/01/00	5.744	GOOD	3231	\$4,652,640.00	12
2230390	K	CONGRESS ST	2781 (B.Q.E.)		A	2	STATE	11/13/00	4.426	FAIR	5000	\$7,200,000.00	6
2246100	M	CONTRAL DRIVE	TRANSVERSE RD #1		O	1	STATE	04/20/00	4.333	FAIR	6000	\$8,640,000.00	64

## INVENTORY SORTED BY FEATURE CARRIED

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2246510	M	CORBIN PL OVERPASS	CORBIN PLACE		O	1	STATE	03/16/00	4.933	FAIR	2200	\$3,168,000.00	12
2232029	M	CORLEARS PARK ROAD	FDR DRIVE		A	4	STATE	03/23/00	4.272	FAIR	4100	\$5,904,000.00	3
2247130	Q	CORPORAL KENNEDY ST	LIRR N SIDE DIV	L	O	2	STATE	10/09/01	6.529	VGGOOD	4340	\$6,249,600.00	11
2243110	K	CORTELYOU ROAD	BMT SUBWAY, BRIGHTON	T	O	3	STATE	10/29/01	3.926	FAIR	2900	\$4,176,000.00	14
2249280	R	COZZINS BLVD PED BRDG	SIRT SOUTH SHORE	S	O-PED	7	CITY	03/22/00	4.913	FAIR	200	\$288,000.00	3
2246070	M	CPK UNDER CENTR DR	OPP 65TH ST-IN E&W		O	1	CITY	06/08/99	5.733	GOOD	1200	\$1,728,000.00	64
2231880	Q	CROCHERON PK PED	BCIP		A-PED	9	CITY	02/27/01	3.806	FAIR	2300	\$3,312,000.00	11
2243040	K	CROOKE AVE	BMT SUBWAY, BRIGHTON	T	O	4	STATE	10/15/01	4.157	FAIR	6000	\$8,640,000.00	14
2231340	K	CROPSEY AVE	BSHP		A	2	STATE	10/24/00	4.944	FAIR	13100	\$18,864,000.00	13
2240301	K	CROPSEY AVE	CONEY ISLAND CREEK		W	3	STATE	06/08/01	5.194	GOOD	9400	\$13,536,000.00	13
2240302	K	CROPSEY AVE	CONEY ISLAND CREEK		W	3	STATE	06/15/01	5.084	GOOD	9400	\$13,536,000.00	13
2231559	Q	CROSS BAY BLVD	BSHP		A	4	STATE	03/14/00	5.25	GOOD	23205	\$33,415,200.00	10
2248039	Q	CROSS BAY BLVD	CONDUIT BLVD		O	2	STATE	06/26/01	3.638	FAIR	17000	\$24,480,000.00	10
2266770	Q	CROSS ISLAND PKWY	LAURELTON PKWY		A	1	STATE	05/05/00	5.111	GOOD	9508	\$13,691,520.00	13
2242030	B	CROTONA AVE	BRONX PELHAM PKWY		O	2	STATE	02/07/00	5.184	GOOD	7600	\$10,944,000.00	6
2243230	K	CROWN ST	FRANKLIN SHUTTLE	T	O	3	STATE	11/02/01	5.263	GOOD	4800	\$6,912,000.00	9
2230070	Q	CYP HILLS CEM EAST	JACKIE ROBINSON PKWY		A	3	STATE	02/29/00	4.113	FAIR	4400	\$6,336,000.00	5
2230050	Q	CYP HILLS CEM WEST	JACKIE ROBINSON PKWY		A	3	STATE	04/24/01	4	FAIR	4400	\$6,336,000.00	5
2230040	Q	CYPRESS HILLS ST	JACKIE ROBINSON PKWY		A	1	STATE	09/06/00	5.888	GOOD	5000	\$7,200,000.00	5
2249160	R	DE HART AVE	B&O RAILROAD	O	O	4	STATE	05/02/01	6.518	VGGOOD	6700	\$9,448,000.00	1
2232030	M	DELANCEY ST PED BRDG	FDR DRIVE		A-PED	9	CITY	07/29/01	4.406	FAIR	2900	\$4,176,000.00	3
2076640	B	DEPOT PLACE	CONRAIL HUDSON DIV	C	O	11	STATE	10/31/01	5.611	GOOD	30192	\$43,476,480.00	4
2243130	K	DITMAS AVE	BMT SUBWAY, BRIGHTON	T	O	1	STATE	10/30/01	5.659	GOOD	4100	\$5,904,000.00	14
2243120	K	DORCHESTER ROAD	BMT SUBWAY, BRIGHTON	T	O	1	STATE	03/08/00	6.156	VGGOOD	4825	\$6,948,000.00	14
2247170	Q	DOUGLSTON PKWY	LIRR N SIDE DIV	L	O	3	STATE	06/28/00	5.423	GOOD	6300	\$9,072,000.00	11
2232180	M	E 103RD ST PED BRDG	FDR DRIVE		A-PED	20	CITY	05/30/01	4.897	FAIR	6000	\$8,640,000.00	11
2233020	M	E 10TH ST PED BRDG	FDR DRIVE		A-PED	22	CITY	04/18/01	3.681	FAIR	1632	\$2,350,080.00	3
2232190	M	E 111TH ST PED BRDG	FDR DRIVE		A-PED	14	CITY	01/27/02	3.8	FAIR	2600	\$3,744,000.00	11
2232200	M	E 120TH ST PED BRDG	FDR DRIVE		A-PED	23	CITY	04/08/01	4.3	FAIR	2500	\$3,600,000.00	11
2231390	K	E 12TH ST	BSHP		A	4	STATE	02/15/00	5.013	GOOD	17200	\$24,768,000.00	15
2233080	K	E 14 ST PED BR	BSHP		A-PED	14	CITY	07/18/01	4.7	FAIR	4700	\$6,768,000.00	15
2241550	B	E 144TH ST	METRO NORTH RR HAR	M	O	2	STATE	11/02/01	6.708	VGGOOD	8290	\$11,937,600.00	1
2241129	B	E 149TH ST	AMTRAK	A	O	2	STATE	05/22/00	4.774	FAIR	12575	\$18,108,000.00	1
2241560	B	E 149TH ST	METRO NORTH RR HAR	M	O	8	STATE	03/10/00	4.736	FAIR	27900	\$40,176,000.00	1
2241050	B	E 149TH ST/JACKSON AVE	CONRAIL PT MORRIS	C	O	1	STATE	09/12/00	5.25	GOOD	65000	\$93,600,000.00	1
2243450	K	E 14TH ST	LIRR BAY RIDGE	N	O	1	STATE	03/01/00	5.595	GOOD	1775	\$2,556,000.00	14
2241010	B	E 156TH STREET	CONRAIL PT MORRIS	C	O	1	STATE	09/06/00	4.555	FAIR	2400	\$3,456,000.00	1
2241600	B	E 158TH ST	METRO NORTH RR HAR	M	O	1	STATE	11/02/01	5.233	GOOD	3400	\$4,896,000.00	1
2243460	K	E 15TH ST - PED	LIRR BAY RIDGE	N	O-PED	3	CITY	01/17/01	7	VGGOOD	900	\$1,296,000.00	14
2241610	B	E 161ST ST	METRO NORTH RR HAR	M	O	1	STATE	11/02/01	5.383	GOOD	6600	\$9,504,000.00	1
2241020	B	E 161ST STREET	CONRAIL PT MORRIS	C	O	1	STATE	06/06/01	3.454	FAIR	12800	\$18,432,000.00	1
2241620	B	E 162ND ST	METRO NORTH RR HAR	M	O	1	STATE	03/01/00	4.983	FAIR	4700	\$6,768,000.00	3
2241030	B	E 163RD STREET	CONRAIL PT MORRIS	C	O	1	STATE	09/07/00	5.129	GOOD	3200	\$4,608,000.00	3
2241630	B	E 165TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/29/00	4.5	FAIR	16400	\$23,616,000.00	3
2241650	B	E 167TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/28/00	5.862	GOOD	3363	\$4,842,720.00	3
2241660	B	E 168TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/25/00	4.921	FAIR	7700	\$11,088,000.00	3
2241670	B	E 169TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/24/00	4.734	FAIR	3300	\$4,752,000.00	3
2241680	B	E 170TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/24/00	6.45	VGGOOD	3150	\$4,536,000.00	3
2241720	B	E 173RD ST	METRO NORTH RR HAR	M	O	1	STATE	02/22/00	4.65	FAIR	3000	\$4,320,000.00	3
2066720	B	E 174TH ST	SHERIDAN EXPWY/AMTRAK	A	A	13	STATE	06/15/00	4.486	FAIR	47430	\$68,299,200.00	9
2241740	B	E 175TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/21/00	4.031	FAIR	3600	\$5,184,000.00	3
2241269	B	E 177TH ST	AMTRAK	A	O	3	STATE	06/15/00	5.43	GOOD	16606	\$23,912,640.00	9
2241770	B	E 178TH ST PED BRDG	METRO NORTH RR HAR	M	O-PED	5	CITY	11/27/01	6.73	VGGOOD	700	\$1,008,000.00	6
2241780	B	E 179TH ST PED BRDG	METRO NORTH RR HAR	M	O-PED	6	CITY	08/02/00	6.774	VGGOOD	700	\$1,008,000.00	6
2241790	B	E 180TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/17/00	4.109	FAIR	5000	\$7,200,000.00	6
2242400	B	E 180TH ST	BRONX RIVER		WO	1	STATE	07/03/00	4.809	FAIR	4500	\$6,480,000.00	6
2241800	B	E 183TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/16/00	4.328	FAIR	3600	\$5,184,000.00	6
2241820	B	E 187TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/15/00	4.843	FAIR	3800	\$5,472,000.00	6
2241810	B	E 188TH ST	METRO NORTH RR HAR	M	O	1	STATE	02/14/00	4.312	FAIR	5300	\$7,632,000.00	6
2241839	B	E 189TH ST	METRO NORTH RR HAR	M	O	1	STATE	11/02/01	6.533	VGGOOD	43157	\$62,146,080.00	6
2241870	B	E 233RD ST	METRO NORTH RR HAR	M	O	1	STATE	03/16/00	5.156	GOOD	7664	\$11,036,160.00	12
2242459	B	E 233RD ST	BRONX RIVER		WO	1	STATE	05/18/00	4.433	FAIR	7000	\$10,080,000.00	12
2242460	B	E 233RD ST	ENTR RD BNX RVR PKWY		O	1	STATE	01/26/00	5.6	GOOD	5300	\$7,632,000.00	12
2241890	B	E 241ST ST	BRP, METRO NORTH HAR	M	O	28	STATE	11/15/01	4.736	FAIR	49500	\$71,280,000.00	12
2246540	M	E 34TH ST	PARK AVE TUNNEL		OT	1	STATE	09/09/00	4.266	FAIR	36200	\$52,128,000.00	5
2243420	K	E 3RD ST	LIRR BAY RIDGE	N	O	1	STATE	09/24/01	5.02	GOOD	1500	\$2,160,000.00	12
2232100	M	E 51ST ST PED BRDG	FDR DRIVE		A-PED	10	CITY	10/22/00	4.156	FAIR	2800	\$4,032,000.00	6
2233040	M	E 60TH ST	FDR DRIVE		A	17	STATE	04/26/01	3.318	FAIR	24480	\$35,251,200.00	6
2232110	M	E 64TH ST PED BRDG	FDR DRIVE		A-PED	13	CITY	06/27/01	5.266	GOOD	2100	\$3,024,000.00	8
2245380	M	E 66TH ST	PED WALK N. OF ZOO		O	1	STATE	04/10/00	5	GOOD	1500	\$2,160,000.00	8
2232050	M	E 6TH ST PED BRDG	FDR DRIVE		A-PED	22	CITY	12/07/01	4.356	FAIR	2200	\$3,168,000.00	3
2232120	M	E 71ST ST PED BRDG	FDR DRIVE		A-PED	19	CITY	05/31/01	7	VGGOOD	1800	\$2,592,000.00	8
2232140	M	E 78TH ST PED BRDG	FDR DRIVE		A-PED	9	CITY	01/17/02	3.475	FAIR	1700	\$2,448,000.00	8
2245319	M	E 97TH ST	METRO NORTH MAIN LN	M	O	1	STATE	10/09/00	5	GOOD	3200	\$4,608,000.00	8
2246400	M	E FOOTBRIDGE	TRANSVERSE RD #2		O-PED	1	CITY	10/13/01	4.5	FAIR	3700	\$5,328,000.00	64
2075820	B	E TREMONT AVE	HUTCHINSON RVR PKWY		A	2	STATE	08/14/01	4.152	FAIR	10200	\$14,688,000.00	10
2241760	B	E TREMONT AVE	METRO NORTH RR HAR	M	O	1	STATE	05/15/01	3.593	FAIR	7300	\$10,512,000.00	6
2242149	B	E TREMONT AVE	BRONX RIVER		WO	2	STATE	04/14/00	4.777	FAIR	12900	\$18,576,000.00	6
2242260	B	EAGLE AVE	E 161ST ST		O	1	STATE	03/21/00	5.468	GOOD	2800	\$4,032,000.00	1
2246040	M	EAST DR AT CNTRL PARK	PEDESTRIAN WALK		O	1	CITY	06/08/01	5	GOOD	1200	\$1,728,000.00	5
2244030	K	EAST DRIVE	BRIDLE PATH		O	1	STATE	04/25/01	5.183	GOOD	2000	\$2,880,000.00	55
2244040	K	EAST DRIVE	EAST WOOD ARCH		O	1	CITY	06/08/01	4.2	FAIR	900	\$1,296,000.00	55
2246069	M	EAST DRIVE	PEDESTRIAN WALK		O	1	STATE	04/21/00	4.566	FAIR	2700	\$3,888,000.00	64
2246110	M	EAST DRIVE	TRANSVERSE RD #1		O	1	STATE	04/21/00	4.6	FAIR	6000	\$8,640,000.00	64
2246170	M	EAST DRIVE	PED WALK @ 73RD ST		O	1	STATE	02/28/00	5.018	GOOD	1900	\$2,736,000.00	64
2246230	M	EAST DRIVE	TRANSVERSE RD #2		O	1	STATE	04/19/00	4.6	FAIR	6500	\$9,360,000.00	64
2246250	M	EAST DRIVE	TRANSVERSE RD #3		O	1	STATE	02/01/00	4.466	FAIR	5100	\$7,344,000.00	64
2246270	M	EAST DRIVE	TRANSVERSE RD #4		O	1	STATE	02/31/00	3.966	FAIR	7000	\$10,080,000.00	64
2246470	M	EAST DRIVE	THE LOCH		W	1	STATE	04/05/00	4.7	FAIR	1100	\$1,584,000.00	64

## INVENTORY SORTED BY FEATURE CARRIED

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2242350	B	EAST FORDHAM RD	GRAND CONCOURSE		O	1	STATE	02/21/00	4.566	FAIR	10300	\$14,832,000.00	5
2241270	B	EAST TREMONT AVE	AMTRAK	A	O	2	STATE	06/16/00	5.791	GOOD	22300	\$32,112,000.00	9
2241900	B	EASTCHESTER ROAD	NYCTA-DYRE AVE LN	T	O	3	STATE	02/18/00	5.138	GOOD	13500	\$19,440,000.00	12
2243279	K	EASTERN PKWY	FRANKLIN SHUTTLE	T	O	1	STATE	03/21/00	4.833	FAIR	7700	\$11,088,000.00	9
2247470	Q	ELIOT AVE	CONRAIL	C	O	1	STATE	07/05/01	5.25	GOOD	3600	\$5,184,000.00	5
2247550	Q	ELIOT AVE	LIRR MONTAUK DIV	L	O	2	STATE	08/06/01	5.893	GOOD	9200	\$13,248,000.00	5
2248160	Q	ELLIOT AVE	QUEENS BLVD	O	2	STATE	07/11/00	4.771	FAIR	13785	\$19,850,400.00	12	
2244010	K	EMDALE ARCH E DRV	NR GRAND ARMY PLZ	O	1	CITY	05/02/01	4.633	FAIR	900	\$1,296,000.00	55	
2241200	B	FAILE ST	AMTRAK	A	O	1	STATE	06/02/00	6.156	VGOOD	6208	\$8,939,520.00	2
2231620	Q	FARMERS BLVD	BSOP	A	2	STATE	06/07/01	4.568	FAIR	6400	\$9,216,000.00	13	
223201A	M	FDR DR N.B. OFF RMP	FDR DR & SOUTH ST	AR	17	STATE	03/14/00	3.686	FAIR	102225	\$147,204,000.00	1	
2232158	M	FDR DRIVE S.B.	FDR DRIVE N.B.	AT	56	STATE	11/15/01	4.772	FAIR	54302	\$78,194,880.00	8	
2233038	M	FDR DRIVE SB	FDR NB / E 62ND ST	AT	46	STATE	05/17/01	2.509	POOR	70113	\$100,962,720.00	8	
2268650	M	FDR NB 42ND TO 49ST	EAST RIVER	A	119	STATE	08/27/01	4.415	FAIR	30767	\$44,304,480.00	6	
223204A	M	FDR NB TO HOUSTON ST	RELIEF	AR	4	STATE	03/22/00	3.9	FAIR	7642	\$11,004,480.00	3	
2229520	B	FIELDSTON ROAD	HHP	A	1	STATE	10/10/01	4.793	FAIR	6600	\$9,504,000.00	8	
2249480	R	FINGERBOARD ROAD	SIRT SOUTH SHORE	S	O	2	STATE	08/28/01	6.777	VGOOD	5100	\$7,344,000.00	2
2231460	K	FLATBUSH AVE	BSHP	A	2	STATE	07/28/00	3.694	FAIR	13600	\$19,584,000.00	56	
2243260	K	FLATBUSH AVE	FRANKLIN SHUTTLE	T	O	2	STATE	03/20/00	5.254	GOOD	11300	\$16,272,000.00	9
2243510	K	FLATBUSH AVE	LIRR BAY RIDGE	N	O	2	STATE	09/26/01	4.666	FAIR	5700	\$8,208,000.00	18
2248220	Q	FLUSHING AV SERVICE	FLUSHING AVE	O	1	STATE	05/22/01	5.05	GOOD	3000	\$4,320,000.00	5	
2248260	Q	FLUSHING MEADW PARK	MEADOW LAKE & 69TH RD	WO	5	STATE	03/02/00	4.8	FAIR	4200	\$6,048,000.00	81	
2249800	R	FOREST AVE	CLOVE LAKES PK STREAM	WO	1	STATE	10/01/01	4.766	FAIR	1600	\$2,304,000.00	1	
2248340	Q	FOREST PARK DR	MYRTLE AVE	O	3	STATE	05/08/01	5.19	GOOD	5100	\$7,344,000.00	9	
2247590	Q	FOREST PARK DRIVE	LIRR MONTAUK DIV	L	O	5	STATE	08/27/01	5.543	GOOD	6000	\$8,640,000.00	9
2247660	Q	FOREST PARK DRIVE	ABANDONED LIRR	L	O	6	STATE	07/27/01	5.253	GOOD	10000	\$14,400,000.00	9
2243620	K	FORT HAMILTON PKWY	LIRR & SEA BEACH	LT	O	3	STATE	05/23/00	5.627	GOOD	14800	\$21,312,000.00	10
2245040	M	FORT TRYON PARK	SOUTH OF CLOISTERS	O	1	CITY	04/05/01	5.467	GOOD	750	\$1,080,000.00	12	
2245050	M	FORT TRYON PARK	UNDERPASS	O	1	CITY	04/06/99	4.6	FAIR	750	\$1,080,000.00	12	
2246500	M	FORT TRYON PLACE	ENTR FROM RIVERSIDE DR	O	1	STATE	04/17/00	4.366	FAIR	6600	\$9,504,000.00	12	
2243150	K	FOSTER AVE	BMT SUBWAY, BRIGHTON	T	O	1	STATE	03/09/00	4.383	FAIR	3000	\$4,320,000.00	14
2231690	Q	FRANCIS LEWIS BLVD	BLP E.B.	A	1	STATE	03/13/00	5.333	GOOD	6000	\$8,640,000.00	13	
2231700	Q	FRANCIS LEWIS BLVD	BLP W.B.	A	1	STATE	02/24/00	5.066	GOOD	6000	\$8,640,000.00	13	
2231930	Q	FRANCIS LEWIS BLVD	BCIP	A	3	STATE	01/20/00	4.772	FAIR	9100	\$13,104,000.00	7	
2267199	Q	FRANCIS LEWIS BLVD	PARK ROAD	O	1	STATE	06/14/01	5.333	GOOD	7085	\$10,202,400.00	8	
2249450	R	FREMONT AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	3	CITY	03/29/00	4.821	FAIR	800	\$1,152,000.00	2
224005A	M	FROM FDR DRIVE	HARLEM RIVER DR	OR	19	STATE	06/14/00	4.059	FAIR	29900	\$43,056,000.00	11	
226771C	M	GAR RAMP TO 79 ST	79 ST BT BASIN GAR	AR	21	STATE	10/08/01	4.596	FAIR	9095	\$13,096,800.00	7	
2241420	B	GERARD AVE	METRO NORTH RR HUD	M	O	1	STATE	03/03/00	6.765	VGOOD	5063	\$7,290,720.00	4
2249360	R	GIFFORDS LANE	SIRT SOUTH SHORE	S	O	1	STATE	06/19/00	5.718	GOOD	3042	\$4,380,480.00	3
2243860	K	GLENMORE AVE	LIRR BAY RIDGE	N	O	2	STATE	10/05/01	3.947	FAIR	5700	\$8,208,000.00	16
2247180	Q	GRAND AVE	LIRR MAIN LINE	L	O	3	STATE	07/12/00	5	GOOD	7415	\$10,677,600.00	4
2247440	Q	GRAND AVE	CONRAIL	C	O	1	STATE	07/03/01	4.396	FAIR	3400	\$4,896,000.00	5
2241409	B	GRAND CONCOURSE	METRO NORTH RR HUD	TCM	O	1	STATE	05/24/00	3.625	FAIR	16100	\$23,184,000.00	4
2242259	B	GRAND CONCOURSE	E 161ST ST	O	1	STATE	10/10/00	3.5	FAIR	24100	\$34,704,000.00	4	
2242280	B	GRAND CONCOURSE	E 167TH ST	O	2	STATE	07/25/00	4.719	FAIR	42900	\$61,776,000.00	4	
2242299	B	GRAND CONCOURSE	E 138TH ST	O	1	STATE	06/04/01	5.6	GOOD	9500	\$13,680,000.00	1	
2242300	B	GRAND CONCOURSE	E 170TH ST	O	2	STATE	05/12/00	4.754	FAIR	39300	\$56,592,000.00	4	
2242319	B	GRAND CONCOURSE	E 174TH ST	T	O	1	STATE	03/24/00	4.133	FAIR	14900	\$21,456,000.00	4
2242329	B	GRAND CONCOURSE	E 175TH ST	T	O	1	STATE	09/12/00	4.466	FAIR	11900	\$17,136,000.00	4
2242330	B	GRAND CONCOURSE	E TREMONT AVE	O	2	STATE	10/19/01	6.483	VGOOD	11700	\$16,848,000.00	5	
2242340	B	GRAND CONCOURSE	EAST KINGSBRIDGE	O	2	STATE	09/14/00	4.714	FAIR	16500	\$23,760,000.00	7	
2242360	B	GRAND CONCOURSE	BURNSIDE AVE	O	2	STATE	09/29/00	4.588	FAIR	8400	\$12,096,000.00	5	
2242370	B	GRAND CONCOURSE	BEDFORD PARK BLVD	O	1	STATE	05/09/00	4.823	FAIR	8418	\$12,121,920.00	7	
2242380	B	GRAND CONCOURSE	E 204TH ST	O	1	STATE	06/05/01	5.828	GOOD	9272	\$13,351,680.00	7	
2240390	KQ	GRAND ST BRIDGE	NEWTOWN CREEK		WM	2	STATE	11/21/00	4.458	FAIR	5100	\$25,000,000.00	5
2249100	R	GRANITE AVE	B&O RAILROAD	O	O	4	STATE	02/21/00	6.372	VGOOD	7300	\$10,512,000.00	1
2249370	R	GREAVES AVE	SIRT SOUTH SHORE	S	O	3	STATE	07/11/01	7	VGOOD	6100	\$8,784,000.00	3
2240370	KQ	GREENPOINT AVE BRIDGE	NEWTOWN CREEK	L	WM	12	STATE	12/20/01	5.666	GOOD	76106	\$109,592,640.00	2
2241860	B	GUN HILL RD	METRO NORTH RR HAR	M	O	2	STATE	03/09/00	4.279	FAIR	9000	\$12,960,000.00	12
2241910	B	GUN HILL ROAD	NYCTA-DYRE AVE LN	T	O	2	STATE	08/29/00	6.906	VGOOD	6300	\$9,072,000.00	11
2242430	B	GUN HILL ROAD	BRONX BLVD	O	4	STATE	07/12/00	5.052	GOOD	9400	\$13,536,000.00	12	
2242440	B	GUN HILL ROAD	BRONX RIVER	WO	1	STATE	03/09/00	5.3	GOOD	8700	\$12,528,000.00	12	
2231610	Q	GUY R. BREWER BLVD	BSOP	A	2	STATE	05/22/01	4.113	FAIR	7300	\$10,512,000.00	13	
2249380	R	GUYON AVE	SIRT SOUTH SHORE	S	O	3	STATE	08/14/01	4.836	FAIR	6900	\$9,936,000.00	3
2240231	K	HAMILTON AVE BRIDGE	GOWANUS CANAL		WM	3	STATE	08/16/00	4.083	FAIR	7300	\$10,512,000.00	7
2240232	K	HAMILTON AVE BRIDGE	GOWANUS CANAL		WM	3	STATE	07/09/01	4.18	FAIR	7300	\$10,512,000.00	6
2249520	R	HANNAH ST	SIRT SOUTH SHORE	S	O	10	STATE	09/07/01	5.322	GOOD	10020	\$14,428,800.00	1
2249180	R	HARBOR ROAD	B&O RAILROAD	O	O	4	STATE	05/01/01	6.254	VGOOD	6615	\$9,525,600.00	1
2233059	M	HARLEM RIVER DRIVE	RAMP TO HRD N.B.		A	11	STATE	08/04/00	3.208	FAIR	51000	\$73,440,000.00	11
2231780	Q	HEMPSTEAD AVE	BCIP	A	2	STATE	05/01/01	4.225	FAIR	14200	\$20,448,000.00	13	
2266149	Q	HEMPSTEAD AVE	CROSS ISLAND PKWY	A	2	STATE	05/12/00	4.076	FAIR	9500	\$13,680,000.00	13	
2229309	M	HHP	RIVERSIDE PARK	A	1	STATE	02/11/00	5.1	GOOD	2400	\$3,456,000.00	7	
2229339	M	HHP	ST CLAIR PLACE	A	64	STATE	03/21/00	3.887	FAIR	370000	\$532,800,000.00	9	
2229349	M	HHP	W 158 ST	A	A	44	STATE	11/08/00	4	FAIR	140000	\$201,600,000.00	12
2229440	B	HHP	KAPPOCK ST	A	1	STATE	09/21/01	4.655	FAIR	3900	\$5,616,000.00	8	
2229530	B	HHP	BROADWAY	A	1	STATE	10/11/01	4.595	FAIR	7500	\$10,800,000.00	8	
2266229	M	HHP	PED UNDERPASS @ 148 ST	A	A	1	STATE	04/11/00	4.714	FAIR	1800	\$2,592,000.00	9
2266230	M	HHP	PED UNDERPASS INWD PK	A	A	1	STATE	02/17/00	4.909	FAIR	800	\$1,152,000.00	12
2266240	M	HHP	PED UNDERPASS INWD PK	A	A	1	STATE	03/14/00	5.857	GOOD	1100	\$1,584,000.00	12
2267250	M	HHP	AMTRAK 30TH ST LINE	A	A	55	STATE	07/11/00	3.451	FAIR	40000	\$57,600,000.00	7
2229312	M	HHP NB	RAMP TO 96 ST	A	A	1	STATE	02/16/00	4.272	FAIR	2000	\$2,880,000.00	7
2229322	M	HHP NB	RAMP TO 96 ST	A	A	1	STATE	07/13/00	5.433	GOOD	2000	\$2,880,000.00	7
M00004	M	HHP ON/OFF RMP-79 EB	PEDESTRIAN PATH	A	1	CITY	07/20/00	4.933	FAIR	900	\$1,296,000.00	7	
M00003	M	HHP ON/OFF RMP-79 WB	PEDESTRIAN PATH	A	1	CITY	11/16/00	4.767	FAIR	900	\$1,296,000.00	7	
2229311	M	HHP SB	RAMP TO 96 ST	A	A	1	STATE	02/16/00	4.181	FAIR	2000	\$2,880,000.00	7
2229321	M	HHP SB	RAMP TO 96 ST	A	A	1	STATE	07/13/00	5.2	GOOD	2000	\$2,880,000.00	7
2229289	M	HHP VIADUCT	W 72 ST TO W 79 ST	A	A	145	STATE	10/25/00	3.388	FAIR	236100	\$339,984,000.00	7
2230000	K	HIGHLAND BLVD E.B.	JACKIE ROBINSON PKWY	A	A	1	STATE	02/09/00	4.933	FAIR	4900	\$7,056,000.00	5

## INVENTORY SORTED BY FEATURE CARRIED

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2230220	K	HIGHLAND BLVD NB	VERMONT AVE		A	1	STATE	05/08/01	6.328	VGOOD	3995	\$5,752,800.00	5
2230010	K	HIGHLAND BLVD W.B.	JACKIE ROBINSON PKWY		A	1	STATE	02/09/00	5.266	GOOD	3500	\$5,040,000.00	5
2230020	K	HIGHLAND BLVD W.B.	JACKIE ROBINSON PKWY		A	2	STATE	02/09/00	4.947	FAIR	4700	\$6,768,000.00	5
2243780	K	HIGHLAWN AVE	BMT SEA BEACH	T	O	6	STATE	11/30/01	7	VGOOD	11300	\$16,272,000.00	11
2244120	K	HILL DRIVE	PROSPECT PK LAKE		WO	3	STATE	05/01/01	3.636	FAIR	7800	\$11,232,000.00	55
2231840	Q	HILLSIDE AVE	BCIP		A	2	STATE	05/19/00	4.184	FAIR	9672	\$13,927,680.00	13
2247320	Q	HONEYWELL ST	AMTRAK & LIRR YARD	AL	O	22	STATE	12/07/01	2.328	POOR	98300	\$141,552,000.00	2
2300130	Q	HOOK CREEK	HOOK CREEK BRIDGE		W	3	STATE	07/18/01	6.474	VGOOD	18302	\$26,354,880.00	13
2232040	M	HOUSTON ST	FDR DRIVE		A	2	STATE	07/06/01	3.09	FAIR	11010	\$15,854,400.00	3
223204B	M	HOUSTON ST RAMP TO FDR	RELIEF		AR	4	STATE	04/03/00	4.333	FAIR	7642	\$11,004,480.00	3
2267240	M	HRD NB RAMP	HARLEM RIVER DR		A	51	STATE	10/18/01	3	POOR	112860	\$162,518,400.00	12
2249300	R	HUGUENOT AVE	SIRT SOUTH SHORE	S	O	2	STATE	08/02/01	4.818	FAIR	4900	\$7,056,000.00	3
2240450	Q	HUNTERS PT AVE BRIDGE	DUTCH KILLS		WM	4	STATE	03/17/00	5.333	GOOD	11544	\$16,623,360.00	2
2241190	B	HUNTS POINT AVE	AMTRAK	A	O	1	STATE	06/02/00	5.25	GOOD	13700	\$19,728,000.00	2
2075859	B	HUTCHINSON RVR PKWY	HUTCHINSON RIVER		WM	7	STATE	10/13/00	5.375	GOOD	60500	\$87,120,000.00	10
2241959	B	HUTCHINSON RVR PKWY	AMTRAK	A	O	1	STATE	06/26/00	6.237	VGOOD	15444	\$22,239,360.00	10
2249810	R	HYLAN BLVD	LEMONT CREEK		WO	1	STATE	09/12/00	6.625	VGOOD	11400	\$16,416,000.00	3
2248299	Q	INTER PKWY-UNION TPK	AUSTIN ST		O	1	STATE	01/05/00	4.75	FAIR	5900	\$8,496,000.00	9
2245300	M	INWOOD HILL PK FTBR	AMTRAK 30 ST BRANCH	A	O-PED	6	CITY	11/13/00	4.472	FAIR	700	\$1,008,000.00	12
2246690	M	ISHAM PK VEHICULR	HARLEM RIVER INLET		O	1	STATE	04/26/00	4.366	FAIR	700	\$1,008,000.00	12
2230099	Q	JACKIE ROBINSON PKWY	CYPRESS HILLS CEMETRY		A	1	STATE	01/05/00	5.482	GOOD	4200	\$6,048,000.00	5
2230179	Q	JACKIE ROBINSON PKWY	METROPOLITAN AVE		A	2	STATE	01/13/00	5.035	GOOD	8673	\$12,489,120.00	82
2247260	Q	JACKSON AVE	LIRR,AMT,CON NE	L	O	1	STATE	08/02/00	6.316	VGOOD	4517	\$6,504,480.00	2
2231819	Q	JAMAICA AVE	BCIP		A	2	STATE	02/17/00	4.59	FAIR	11500	\$16,560,000.00	13
2230287	B	JEROME AVE	MOSHOLU PARKWAY	T	A	3	STATE	06/25/01	5.052	GOOD	11800	\$16,992,000.00	7
2249070	R	JOHN ST	B&O RAILROAD	O	O-PED	3	CITY	02/13/01	6.806	VGOOD	5800	\$8,352,000.00	1
2247480	Q	JUNIPER BLVD SO	CONRAIL	C	O	1	STATE	07/06/01	5.833	GOOD	8500	\$12,240,000.00	5
2230380	K	KANE ST	2781 (B.Q.E.)		A	2	STATE	03/06/00	4.458	FAIR	5000	\$7,200,000.00	6
2243770	K	KINGS HIGHWAY	BMT SEA BEACH	T	O	4	STATE	03/29/00	3.368	FAIR	12000	\$17,280,000.00	11
2231449	K	KNAPP ST	BSHP		A	1	STATE	01/21/00	4.796	FAIR	9500	\$13,680,000.00	15
2241169	B	LAFAYETTE AVE	AMTRAK	A	O	1	STATE	05/25/00	5.825	GOOD	12000	\$17,280,000.00	2
2249110	R	LAKE AVE	B&O RAILROAD	O	O	3	STATE	04/23/01	6	GOOD	5900	\$8,496,000.00	1
2247240	Q	LEFFERTS BLVD	LIRR MAIN LINE	L	O	3	STATE	09/05/01	5.972	GOOD	5460	\$7,862,400.00	9
2241139	B	LEGGETT AVE	AMTRAK	A	O	3	STATE	06/21/00	4.69	FAIR	28300	\$40,752,000.00	2
2243850	K	LIBERTY AVE	LIRR BAY RIDGE	N	O	4	STATE	10/03/01	4.191	FAIR	6400	\$9,216,000.00	16
2249460	R	LINCOLN AVE	SIRT SOUTH SHORE	S	O	1	STATE	08/23/01	5.807	GOOD	4500	\$6,480,000.00	2
2243190	K	LINCOLN PLACE	FRANKLIN SHUTTLE	T	O	3	STATE	03/17/00	7	VGOOD	3400	\$4,896,000.00	9
2243010	K	LINCOLN ROAD	BMT SUBWAY, BRIGHTON	T	O	4	STATE	09/06/01	4.161	FAIR	6100	\$8,784,000.00	55
2231750	Q	LINDEN BLVD	BCIP		A	2	STATE	01/28/00	4.068	FAIR	6700	\$9,648,000.00	13
2248040	Q	LINDEN BLVD	CONDUIT AVE		O	1	STATE	03/20/00	5.266	GOOD	3352	\$4,826,880.00	10
2243910	K	LIVONIA AVE PED BRDG	LIRR BAY RIDGE LINE	N	O-PED	3	CITY	01/18/01	5.458	GOOD	2500	\$3,600,000.00	16
2241159	B	LONGWOOD AVE	AMTRAK	A	O	1	STATE	05/24/00	6.041	VGOOD	10625	\$15,300,000.00	2
1240090	BM	MACOMBS DAM BRIDGE	HARLEM RIVER		WM	52	STATE	10/12/01	2.722	POOR	139100	\$200,304,000.00	10
2240079	BM	MADISON AVE BRIDGE	HARLEM RIVER		WM	31	STATE	07/21/00	5.583	GOOD	80000	\$115,200,000.00	11
2249210	R	MAIN ST PED BRDG	SIRT SOUTH SHORE	S	O-PED	9	CITY	03/15/00	4.895	FAIR	400	\$576,000.00	3
2240027	KM	MANHATTAN BRIDGE(LL)	EAST RIVER	T	WE	23	STATE	11/17/00	3.472	FAIR	616390	\$887,601,600.00	3
2240028	KM	MANHATTAN BRIDGE(UL)	NYCTA TRACKS-BMT	T	WE	43	STATE	10/16/00	3.5	FAIR	587424	\$845,890,560.00	3
2229480	B	MANHATTAN COLL PKWY	HHP		A	3	STATE	06/26/01	4.184	FAIR	6200	\$8,928,000.00	8
2230190	Q	MARKWOOD ROAD	JACKIE ROBINSON PKWY		A	1	STATE	02/23/00	5.333	GOOD	4400	\$6,336,000.00	82
2249760	R	MARTLINGS AVE	RICHMOND LAKE DAM		WO	2	STATE	05/11/01	4.933	FAIR	7000	\$10,080,000.00	1
2269030	B	MATTHEWSON ROAD	MAC CRACKEN AVE		O	15	STATE	10/18/00	3.758	FAIR	14880	\$21,427,200.00	7
2249060	R	McCLEAN AVE	B&O RR (ABANDONED)		O	1	STATE	02/28/00	3.981	FAIR	2500	\$3,600,000.00	2
2243410	K	MCDONALD AVE	LIRR BAY RIDGE	N	O	1	STATE	04/13/00	5.421	GOOD	2760	\$3,974,400.00	12
2241110	B	MELROSE AVE	CONRAIL PT MORRIS	C	O	11	STATE	08/06/01	6.208	VGOOD	37854	\$54,509,760.00	3
2231710	Q	MERRICK BLVD	BLP E.B.		A	1	STATE	03/10/00	4.133	FAIR	6000	\$8,640,000.00	13
2231720	Q	MERRICK BLVD	BLP W.B.		A	1	STATE	03/10/00	4.2	FAIR	6000	\$8,640,000.00	13
1247560	Q	METROPOLITAN AVE	LIRR MONTAUK DIV	L	O	2	STATE	07/31/01	3.888	FAIR	20900	\$30,096,000.00	5
2240290	K	METROPOLITAN AVE	ENGLISH KILLS		WM	5	STATE	07/02/01	4.186	FAIR	15245	\$21,952,800.00	1
2247500	Q	METROPOLITAN AVE	CONRAIL	C	O	1	STATE	07/31/01	4.633	FAIR	18650	\$26,856,000.00	5
2249470	R	MIDLAND AVE	SIRT SOUTH SHORE	S	O	1	STATE	08/27/01	5.634	GOOD	3000	\$4,320,000.00	2
2257569	M	MILLER HIGHWAY	TERRAIN		A	63	STATE	08/28/01	5.07	GOOD	287539	\$414,056,160.00	7
2249530	R	MINTHORNE ST PED BRDG	SIRT SOUTH SHORE	S	O-PED	23	CITY	10/10/00	7	VGOOD	1600	\$2,304,000.00	1
2243240	K	MONTGOMERY ST	FRANKLIN SHUTTLE	T	O	1	STATE	11/04/01	6.627	VGOOD	2200	\$3,168,000.00	9
2249090	R	MORNINGSTAR ROAD	B&O RAILROAD	O	O	4	STATE	04/24/01	5.508	GOOD	7900	\$11,376,000.00	1
2268930	M	MORRIS ST PED BRDG	BKLN-BATTERY TUNN PLZ		A-PED	3	CITY	07/11/00	4.535	FAIR	1200	\$1,728,000.00	1
2230250	B	MOSHOLU PARKWAY	BRONX RIVER		A	5	STATE	01/04/00	4.263	FAIR	16300	\$23,472,000.00	27
2230260	B	MOSHOLU PARKWAY	METRO NORTH	M	A	1	STATE	03/17/00	6.484	VGOOD	8880	\$12,787,200.00	27
2230270	B	MOSHOLU PARKWAY	WEBSTER AVE		A	1	STATE	04/12/01	6.015	VGOOD	8480	\$12,211,200.00	27
2230290	B	MOSHOLU PARKWAY	EQUESTRIAN PATH		A	1	STATE	01/20/00	4.724	FAIR	4300	\$6,192,000.00	26
2230300	B	MOSHOLU PARKWAY	CONRAIL (ABANDONED)	C	A	1	STATE	09/18/00	4.229	FAIR	5200	\$7,488,000.00	26
2230310	B	MOSHOLU PARKWAY	SB RAMP TO HHP		A	2	STATE	10/30/01	5.243	GOOD	7400	\$10,656,000.00	26
2247110	Q	MURRAY ST	LIRR N SIDE DIV	L	O	1	STATE	07/24/01	5.555	GOOD	4000	\$5,760,000.00	7
2230120	Q	MYRTLE AVE	JACKIE ROBINSON PKWY		A	1	STATE	03/01/00	5	GOOD	6400	\$9,216,000.00	82
2247620	Q	MYRTLE AVE	ABANDONED LIRR	L	O	3	STATE	01/28/00	5.277	GOOD	6725	\$9,684,000.00	4
2231670	Q	N CONDUIT AVE W.B.	BLP E.B.		A	1	STATE	01/05/00	4.916	FAIR	4000	\$5,760,000.00	13
2231680	Q	N CONDUIT AVE WB	BLP W.B.		A	2	STATE	01/07/00	4.84	FAIR	6500	\$9,360,000.00	13
205580A	Q	N.BLVD WB TO 678I SB	VACANT LAND		AR	16	STATE	09/14/00	5.09	GOOD	8600	\$12,384,000.00	7
2249350	R	NELSON AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	1	CITY	03/14/00	5.176	GOOD	300	\$432,000.00	3
1067150	B	NEREID AVE (2241880)	BRONX RIVER PKWY	M	O	10	STATE	11/20/01	4.21	FAIR	57750	\$83,160,000.00	12
2249430	R	NEW DORP LANE	SIRT SOUTH SHORE	S	O	2	STATE	08/16/01	5.06	GOOD	7600	\$10,944,000.00	2
2243660	K	NEW UTRECHT AVE	LIRR BAY RIDGE	N	O	1	STATE	04/12/00	4.346	FAIR	2400	\$3,456,000.00	11
2243140	K	NEWKIRK AVE	BMT SUBWAY, BRIGHTON	T	O	3	STATE	11/01/01	4.661	FAIR	4100	\$5,904,000.00	14
2240240	K	NINTH ST BRIDGE	GOWANUS CANAL		WM	5	STATE	06/19/01	7	VGOOD	4800	\$30,000,000.00	6
2231870	Q	NORTHERN BLVD	BCIP		A	2	STATE	12/08/00	6.652	VGOOD	8900	\$12,816,000.00	11
2240440	Q	NORTHERN BLVD	ALLEY CREEK		W	2	STATE	03/27/00	4.986	FAIR	8300	\$11,952,000.00	11
2055802	Q	NORTHERN BLVD E.B.	FLUSHING RIVER		W	40	STATE	08/29/00	4.38	FAIR	78894	\$113,607,360.00	7
2055801	Q	NORTHERN BLVD W.B.	FLUSHING RIVER		W	40	STATE	07/28/00	4.746	FAIR	71900	\$103,536,000.00	7

INVENTORY SORTED BY FEATURE CARRIED

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2243500	K	NOSTRAND AVE	LIRR BAY RIDGE	N	O	2	STATE	03/03/00	5.322	GOOD	4320	\$6,220,800.00	14
2240138	BM	NYCTA IRT	HARLEM RVR/BROADWAY	T	WM	3	STATE	10/18/01	4.588	FAIR	38100	\$54,864,000.00	12
2243480	K	OCEAN AVE	LIRR BAY RIDGE	N	O	2	STATE	10/30/00	4.859	FAIR	5000	\$7,200,000.00	14
2240320	K	OCEAN AVE PED BRDG	SHEEPSHEAD BAY		W-PED	30	CITY	12/05/00	4.263	FAIR	4000	\$5,760,000.00	15
2243439	K	OCEAN PKWY	LIRR BAY RIDGE	N	O	1	STATE	10/30/00	4.833	FAIR	7000	\$10,080,000.00	12
2249269	R	PAGE AVE	SIRT SOUTH SHORE	S	O	4	STATE	07/26/01	6.361	VGGOOD	30420	\$43,804,800.00	3
2245470	M	PARK AVE N.B	E 45TH ST		O	1	STATE	04/10/01	4.864	FAIR	2400	\$3,456,000.00	5
2245460	M	PARK AVE S.B.	E 45TH ST		O	1	STATE	04/10/01	4.729	FAIR	2400	\$3,456,000.00	5
2246550	M	PARK AVE VIADUCT	E 42ND ST		O	10	STATE	10/04/01	4.597	FAIR	19600	\$28,224,000.00	6
2247600	Q	PARK LANE SOUTH	LIRR MONTAUK DIV	AL	O	3	STATE	06/22/00	7	VGGOOD	5900	\$8,496,000.00	9
2242099	B	PARK ROAD (204TH ST)	BRONX RIVER		W	1	STATE	07/07/00	4.172	FAIR	4700	\$6,768,000.00	27
224001A	M	PARK ROW TO BKLN	WILLIAM ST N.B.		OE	3	STATE	04/06/01	4.111	FAIR	8685	\$12,506,400.00	1
2243020	K	PARKSIDE AVE	BMT SUBWAY, BRIGHTON	T	O	6	STATE	10/18/01	4.263	FAIR	48700	\$70,128,000.00	14
2247060	Q	PARSONS BLVD	LIRR N SIDE DIV	L	O	1	STATE	06/26/00	5.333	GOOD	4200	\$6,048,000.00	7
224001C	M	PEARL ST TO BKLN	LAND ADJ TO BRDG		OE	12	STATE	04/30/01	3.711	FAIR	6489	\$9,344,160.00	3
224001F	M	PEARL ST TO FDR DR	LAND ADJ TO BRDG		OE	3	STATE	03/28/01	5.394	GOOD	5200	\$7,488,000.00	1
2246090	M	PED BRDG OPP 65 ST	TRANSVERSE RD #1		O-PED	1	CITY	11/12/00	4.655	FAIR	2300	\$3,312,000.00	64
2245400	M	PED BRDG W OF 8TH AV	W 155TH ST		O-PED	1	CITY	11/20/00	1	POOR	400	\$576,000.00	10
2247630	Q	PED BRG NEAR UNION TPK	ABANDONED LIRR		O-PED	8	CITY	08/29/00	5.154	GOOD	900	\$1,296,000.00	5
2246440	M	PED IN CTR OF PK	TRANSVERSE RD NO.2		O-PED	1	CITY	10/13/01	4.172	FAIR	5900	\$8,496,000.00	64
2246030	M	PEDESTRIAN BRIDGE	POND		O-PED	1	CITY	03/22/00	3.857	FAIR	1400	\$2,016,000.00	64
2246620	M	PEDESTRIAN BRIDGE	E 128TH ST		O-PED	18	CITY	01/09/01	4.019	FAIR	2300	\$3,312,000.00	11
M00001	M	PEDESTRIAN TUNNEL	BROADWAY TO		O-PED	1	CITY	07/12/00	4.2	FAIR	2000	\$2,880,000.00	12
2231519	K	PENNSYLVANIA AVE	BSHP		A	2	STATE	05/18/01	6.277	VGGOOD	6191	\$8,915,040.00	56
2243870	K	PITKIN AVE	LIRR BAY RIDGE	N	O	3	STATE	11/01/00	4.088	FAIR	5600	\$8,064,000.00	16
2243210	K	PRESIDENT ST	FRANKLIN SHUTTLE	T	O	2	STATE	03/23/00	5.161	GOOD	2500	\$3,600,000.00	9
2232167	M	PROMENADE OVER FDR	FDR/E79TH ST-E91ST ST		A-PED	53	STATE	11/12/01	3.285	FAIR	93000	\$133,920,000.00	8
2268760	M	PS-5 PEDESTRIAN BR.	TENTH AVENUE		O-PED	5	CITY	06/19/01	6.592	VGGOOD	1500	\$2,160,000.00	12
2240639	KQ	PULASKI BRIDGE	NEWTOWN CREEK		WM	48	STATE	03/14/00	4.943	FAIR	205770	\$296,308,800.00	2
2230209	Q	QUEENS BLVD	JACKIE ROBINSON PKWY	T	A	5	STATE	05/19/00	4.698	FAIR	90000	\$129,600,000.00	9
2230530	Q	QUEENS BLVD	278I (B.Q.E.)		A	2	STATE	06/27/00	4.138	FAIR	23500	\$33,840,000.00	2
2230869	Q	QUEENS BLVD	ACCESS RD BQE S.B.		A	1	STATE	04/10/00	4.09	FAIR	7900	\$11,376,000.00	2
2247310	Q	QUEENS BLVD	AMTRAK & LIRR YARD	L	O	19	STATE	10/12/01	3.722	FAIR	92400	\$133,056,000.00	2
2240047	MQ	QUEENSBORO BRIDGE(LL)	EAST RIVER	L	WE	53	STATE	12/20/00	4.861	FAIR	626900	\$902,736,000.00	6
2240048	MQ	QUEENSBORO BRIDGE(UL)	EAST RIVER-LL		WE	37	STATE	12/20/00	4.471	FAIR	322300	\$464,112,000.00	6
222933A	M	RAMP FROM S.B. HHP	W 135 ST		AR	9	STATE	07/21/00	4.802	FAIR	12900	\$18,576,000.00	9
223201D	M	RAMP TO N.B. FDR DRIVE	FDR & SOUTH ST.		AR	22	STATE	06/29/00	5.622	GOOD	15825	\$22,788,000.00	1
222933B	M	RAMP TO N.B. HHP	W 135 ST		AR	14	STATE	01/20/00	4.422	FAIR	14400	\$20,736,000.00	9
222934A	M	RAMP TO N.B. HHP	AMTRAK WEST SIDE	A	AR	26	STATE	11/07/00	3.722	FAIR	10800	\$15,552,000.00	12
2249270	R	RICHMOND VALLY ROAD	SIRT SOUTH SHORE	S	O	4	STATE	08/21/01	5.327	GOOD	9300	\$13,392,000.00	3
2240350	R	RICHMOND AVE	RICHMOND CREEK		W	3	STATE	07/24/01	6.152	VGGOOD	32589	\$46,928,160.00	2
2244150	K	RIDGE BLVD	SHORE RD DRIVE		O	1	STATE	05/10/01	7	VGGOOD	7000	\$10,080,000.00	10
2240660	Q	RIKERS ISLAND BRIDGE	RIKERS ISL CHANNEL		W	56	STATE	09/06/01	4.647	FAIR	183100	\$263,664,000.00	1
2241430	B	RIVER AVE	METRO NORTH RR HUD	M	O	1	STATE	11/02/01	6.421	VGGOOD	5040	\$7,257,600.00	4
2229510	B	RIVERDALE AVE	HHP		A	2	STATE	10/09/01	4.052	FAIR	5200	\$7,488,000.00	8
2246660	M	RIVERSIDE DRIVE	W 125TH ST & OTHERS		O	27	STATE	07/03/01	4.5	FAIR	148300	\$213,552,000.00	9
2246720	M	RIVERSIDE DRIVE	W 158TH ST		O	77	STATE	08/30/01	3.541	FAIR	181400	\$261,216,000.00	9
2246970	M	RIVERSIDE DRIVE	W 96TH ST		O	3	STATE	08/02/00	5.352	GOOD	10600	\$15,264,000.00	7
2246980	M	RIVERSIDE DRIVE	W 138TH ST		O	1	STATE	07/11/00	4.633	FAIR	6700	\$9,648,000.00	9
2267130	M	RIVERSIDE DRIVE	W 145TH ST		O	1	STATE	04/02/01	4.866	FAIR	5800	\$8,352,000.00	9
2248369	Q	ROCKAWAY BLVD	THURSTON BASIN		WO	2	STATE	07/31/01	3.947	FAIR	6000	\$8,640,000.00	83
2230587	Q	ROOSEVELT AVE	278I (B.Q.E.)		A	2	STATE	01/19/00	4.529	FAIR	6600	\$9,504,000.00	2
2240507	Q	ROOSEVELT AVE	678I - VAN WYCK EXPWY		W	27	STATE	06/12/00	3.507	FAIR	84424	\$121,570,560.00	81
2247380	Q	ROOSEVELT AVE	CONRAIL HELLGATE	C	O	2	STATE	08/07/00	5.097	GOOD	5200	\$7,488,000.00	2
2267160	Q	ROOSEVELT AVE	FLUSHING MDW PK ROAD		O	4	STATE	06/12/01	4.746	FAIR	7280	\$10,483,200.00	84
2240640	MQ	ROOSEVELT ISLAND	E. RIVER E. CHANNEL		WM	8	STATE	03/20/00	4.347	FAIR	36500	\$52,560,000.00	8
2249420	R	ROSE AVE	SIRT SOUTH SHORE	S	O	2	STATE	07/30/01	5.712	GOOD	3800	\$5,472,000.00	2
2249410	R	ROSS AVE	SIRT SOUTH SHORE	S	O	2	STATE	07/27/01	5.5	GOOD	3800	\$5,472,000.00	2
2248200	Q	RUST ST	FLUSHING AVE		O	1	STATE	06/06/01	5.546	GOOD	2900	\$4,176,000.00	5
2231560	Q	S CONDUIT BLVD	BSOP		A	2	STATE	03/15/00	5.633	GOOD	15776	\$22,717,440.00	10
2242210	B	S OF ALLERTON AVE	BRONX RIVER		WO	3	STATE	03/21/00	4.763	FAIR	6200	\$8,928,000.00	27
2230370	K	SACKETT ST	278I (B.Q.E.)		A	2	STATE	03/10/00	4.625	FAIR	5000	\$7,200,000.00	6
226771D	M	SB HHP RAMP TO 79 ST	79 ST BT BASIN GAR		AR	4	STATE	05/22/01	4.37	FAIR	2601	\$3,745,440.00	7
2244470	K	SEELEY ST	PROSPECT AVE		O	1	STATE	05/09/01	4.1	FAIR	7700	\$11,088,000.00	7
2249290	R	SEGUINE AVE	SIRT SOUTH SHORE	S	O	1	STATE	07/31/01	6.468	VGGOOD	2200	\$3,168,000.00	3
2248240	Q	SERVICE RD TURNAROUND	OVER FLUSHING AVE		O	1	STATE	05/22/01	5.186	GOOD	2900	\$4,176,000.00	5
2241390	B	SHORE RD CIRCLE	AMTRAK	A	O	2	STATE	06/29/01	3.597	FAIR	4800	\$6,912,000.00	10
2240200	B	SHORE ROAD	HUTCHINSON RIVER		WM	7	STATE	10/31/00	3.985	FAIR	4800	\$120,000,000.00	28
2249120	R	SIMONSON AVE	B&O RAILROAD	O	O	3	STATE	04/30/01	6.111	VGGOOD	5819	\$8,379,360.00	1
2249860	R	SLATER BLVD	NEW CREEK		WO	1	STATE	04/20/01	4.264	FAIR	3500	\$5,040,000.00	2
2249200	R	SOUTH AVE	B&O RAILROAD	O	O	5	STATE	06/09/00	2.469	POOR	10100	\$14,544,000.00	1
2244440	K	SOUTH OF TILLARY ST	NAVY ST		O-PED	1	CITY	03/08/01	4.333	FAIR	6200	\$8,928,000.00	2
2241080	B	SOUTHERN BLVD	CONRAIL PT MORRIS	C	O	1	STATE	09/14/00	4.185	FAIR	3900	\$5,616,000.00	1
2242029	B	SOUTHERN BLVD	BRONX PELHAM PKWY		O	2	STATE	02/04/00	4.447	FAIR	12900	\$18,576,000.00	27
2242220	B	SOUTHERN BLVD	BRONX RIVER		W	2	STATE	03/20/00	4.21	FAIR	4800	\$6,912,000.00	27
2231630	Q	SPRINGFIELD BLVD	BSOP		A	2	STATE	03/15/00	4.636	FAIR	8500	\$12,240,000.00	13
2268770	Q	SPRINGFIELD BLVD	EQUES. PATH (ABAND.)		O	1	STATE	06/29/01	4.777	FAIR	1470	\$2,116,800.00	13
2243180	K	ST JOHNS PLACE	FRANKLIN SHUTTLE	T	O	1	STATE	11/03/01	6.796	VGGOOD	2200	\$3,168,000.00	9
2241700	B	ST PAULS PL PED BRDG	METRO NORTH RR HAR	M	O-PED	2	CITY	08/03/00	6.296	VGGOOD	600	\$864,000.00	3
2241060	B	ST. MARYS & CONCORD	CONRAIL PT MORRIS	C	O	1	STATE	09/12/00	5.333	GOOD	4500	\$6,480,000.00	1
2230600	Q	STEINWAY ST	278I W.B. (B.Q.E.)		A	1	STATE	01/13/00	4.333	FAIR	4200	\$6,048,000.00	1
2230610	Q	STEINWAY ST	278I E.B. (B.Q.E.)		A	1	STATE	01/12/00	4.027	FAIR	4200	\$6,048,000.00	1
2243170	K	STERLING PLACE	FRANKLIN SHUTTLE	T	O	1	STATE	11/06/01	6.593	VGGOOD	2300	\$3,312,000.00	8
223201C	M	STH ST RMP TO FDR	SOUTH ST		AR	8	STATE	03/03/00	4.641	FAIR	39150	\$56,376,000.00	1
223201B	M	STH ST RMP TO FDR S.B.	SOUTH ST		AR	10	STATE	02/24/00	3.716	FAIR	44625	\$64,260,000.00	1
2240540	K	STILLWELL AVE	CONY ISLAND CRK		W	2	STATE	06/18/01	6.097	VGGOOD	17000	\$24,480,000.00	13

## INVENTORY SORTED BY FEATURE CARRIED

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD
2230350	K	SUMMIT ST PED BRDG	278I (B.Q.E.)		A-PED	2	STATE	10/03/00	4.714	FAIR	1400	\$2,016,000.00	6
2231650	Q	SUNRISE HWY W.B.	BLP E.B.		A	1	STATE	03/02/00	4.622	FAIR	4100	\$5,904,000.00	13
2231660	Q	SUNRISE HWY W.B.	BLP W.B.		A	2	STATE	04/28/00	4.656	FAIR	5350	\$7,704,000.00	13
2231800	Q	SUPERIOR ROAD	BCIP		A	2	STATE	02/28/00	4.227	FAIR	7000	\$10,080,000.00	13
2243890	K	SUTTER AVE	LIRR BAY RIDGE	N	O	3	STATE	10/09/01	4.117	FAIR	5400	\$7,776,000.00	16
2240310	K	THIRD AVE	GOWANUS CANAL		W	1	STATE	06/26/01	4.545	FAIR	3200	\$4,608,000.00	6
2241040	B	THIRD AVE	CONRAIL PT MORRIS	C	O	1	STATE	09/08/00	4.625	FAIR	2700	\$3,888,000.00	1
2240069	BM	THIRD AVE BRIDGE	HARLEM RIVER		WM	32	STATE	08/01/01	3.013	FAIR	79950	\$115,128,000.00	11
2240250	K	THIRD ST	GOWANUS CANAL		WM	5	STATE	06/22/01	4.958	FAIR	4900	\$15,000,000.00	6
2247300	Q	THOMPSON AVE	AMTRAK YARD	L	O	14	STATE	08/18/00	5.527	GOOD	61280	\$88,243,200.00	2
2241170	B	TIFFANY ST	AMTRAK	A	O	1	STATE	08/01/01	5.941	GOOD	7267	\$10,464,480.00	2
224004H	Q	TO 21ST ST FROM NY	22ND ST		OE	34	STATE	11/02/00	4.211	FAIR	48100	\$69,264,000.00	2
224001B	M	TO BKLN FRM FDR	FRANKFRT & CITY		OE	31	STATE	04/26/00	4.111	FAIR	51400	\$74,016,000.00	1
224005B	B	TO BRUCKNER BLVD	RELIEF		OR	5	STATE	09/27/01	4.208	FAIR	12100	\$17,424,000.00	1
224006A	B	TO BRUCKNER BLVD	RELIEF		OR	11	STATE	05/18/01	2.864	POOR	11100	\$15,984,000.00	1
224004B	M	TO E 60TH ST FROM QNS	FIRST AVE		OE	13	STATE	11/13/00	5.791	GOOD	14800	\$21,312,000.00	6
224004C	M	TO E 62ND ST FROM QNS	E 60TH ST		OE	10	STATE	11/09/00	4.984	FAIR	16720	\$24,076,800.00	6
224001D	M	TO FDR DR N.B.	PEARL STREET		OE	30	STATE	05/08/01	5.358	GOOD	49600	\$71,424,000.00	1
2245480	M	TO GWB OPP W 171ST ST	RIVERSIDE DRIVE		O	1	STATE	07/24/00	5.571	GOOD	10800	\$15,552,000.00	12
224007A	M	TO MADISON AVENUE	RELIEF		OR	9	STATE	07/21/00	6.14	VGOOD	22600	\$32,544,000.00	11
224004E	Q	TO NY FR THOMSON AVE	JACKSON AVE		OE	64	STATE	12/15/00	3.886	FAIR	104600	\$150,624,000.00	2
224004G	Q	TO NY FROM 11TH ST	TERRAIN (CHAMBER)		OE	36	STATE	10/06/00	4.595	FAIR	8360	\$12,038,400.00	1
224004F	Q	TO NY FROM 21ST ST	21ST ST (QUEENS)		OE	63	STATE	12/15/00	4.439	FAIR	63310	\$91,166,400.00	2
224001G	M	TO PARK ROW	ROSE ST		OE	11	STATE	07/14/01	4.736	FAIR	16551	\$23,833,440.00	1
224001E	M	TO PEARL ST	LAND ADJ TO BRDG		OE	3	STATE	04/03/01	5.394	GOOD	5300	\$7,632,000.00	6
224004A	M	TO QNS FRM E 59TH ST	FIRST AVE		OE	13	STATE	11/13/00	5.788	GOOD	14800	\$21,312,000.00	6
224004D	M	TO QNS FROM E 58TH ST	E 59TH ST		OE	12	STATE	10/20/00	4.622	FAIR	11781	\$16,964,640.00	6
224004I	Q	TO THOMSON AVE FROM NY	JACKSON AVE		OE	38	STATE	11/28/00	5.377	GOOD	59100	\$85,104,000.00	2
2249040	R	TOMPkins AVE	B&O RR (ABANDONED)		O	1	STATE	02/29/00	6.515	VGOOD	5096	\$7,338,240.00	1
2249510	R	TOMPkins AVE	WILLOW AVE, SIRT	S	O	2	STATE	06/21/00	5.915	GOOD	5378	\$7,744,320.00	1
2249840	R	TOMPkins AVE	GREENFIELD AVE		O	1	STATE	03/01/00	5.744	GOOD	2562	\$3,689,280.00	1
2249230	R	TRACY AVE PED BRDG	SIRT SOUTH SHORE	S	O-PED	9	CITY	03/13/00	3.968	FAIR	200	\$288,000.00	3
2246410	M	TRANSVERSE RD. #1	PED WALK NEAR 5 AV		O	1	STATE	04/10/00	4.409	FAIR	2000	\$2,880,000.00	8
2249870	R	TRAVIS AVE	MAIN CREEK		WO	1	STATE	02/21/00	4.218	FAIR	1700	\$2,448,000.00	2
2246560	M	TUDOR CITY PLACE	E 42ND ST		O	1	STATE	03/24/00	5.027	GOOD	6600	\$9,504,000.00	6
2249170	R	UNION AVE	B&O RAILROAD	O	O	4	STATE	05/07/01	5.425	GOOD	6500	\$9,360,000.00	1
2230360	K	UNION ST	278I (B.Q.E.)		A	2	STATE	03/10/00	4.486	FAIR	5000	\$7,200,000.00	6
2240270	K	UNION ST	GOWANUS CANAL		WM	5	STATE	08/07/00	4.152	FAIR	4900	\$15,000,000.00	6
2243200	K	UNION ST	FRANKLIN SHUTTLE	T	O	2	STATE	03/22/00	5.047	GOOD	4100	\$5,904,000.00	9
2247040	Q	UNION ST	LIRR N SIDE DIV	L	O	1	STATE	07/17/01	6.39	VGOOD	3313	\$4,770,720.00	7
2230180	Q	UNION TPKE	JACKIE ROBINSON PKWY		A	1	STATE	02/16/00	5.812	GOOD	5359	\$7,716,960.00	82
2231850	Q	UNION TPKE	BCIP		A	2	STATE	08/29/01	4.318	FAIR	13600	\$19,584,000.00	13
2248129	Q	UNION TPKE	CREEDMOORE HOSP RD		A	1	STATE	05/25/01	5.166	GOOD	3500	\$5,040,000.00	13
2241330	B	UNIONPORT ROAD	AMTRAK	A	O	1	STATE	06/24/00	4.906	FAIR	4400	\$6,336,000.00	9
2246570	M	UNITED NATIONS PL	FIRST AVE TUNNEL		OT	2	STATE	10/02/00	5.078	GOOD	92200	\$132,768,000.00	6
2231910	Q	UTOPIA PKWY	BCIP		A	2	STATE	01/18/00	4.789	FAIR	7200	\$10,368,000.00	7
2229550	B	VAN CRTLDT EQUES	HHP		A-PED	2	CITY	10/09/01	4.825	FAIR	2100	\$3,024,000.00	26
2229540	B	VAN CRTLDT PARK	HHP		A-PED	2	CITY	10/09/01	4.565	FAIR	3900	\$5,616,000.00	26
2249130	R	VAN NAME AVE	B&O RAILROAD	O	O	3	STATE	04/25/01	5.389	GOOD	5474	\$7,882,560.00	1
2249140	R	VAN PELT AVE	B&O RAILROAD	O	O	3	STATE	04/27/01	5.779	GOOD	5000	\$7,200,000.00	1
2246670	M	W 134 ST VIADUCT	RIVERSIDE DRIVE		O	3	STATE	06/15/01	5	GOOD	7927	\$11,414,880.00	9
2245230	M	W 148TH ST PED BRDG	AMTRAK 30 ST BRANCH	A	O-PED	3	CITY	11/16/00	4	FAIR	1100	\$1,584,000.00	9
2246710	M	W 153 ST	A.C. POWELL BLVD		O	1	STATE	04/20/00	4.388	FAIR	3082	\$4,438,080.00	10
2245290	M	W 155TH ST PED BRDG	AMTRAK 30 ST BRANCH	A	O-PED	3	CITY	11/15/00	4.015	FAIR	800	\$1,152,000.00	9
2245250	M	W 158TH ST	AMTRAK 30 ST BRANCH	A	O	7	STATE	08/14/01	6.43	VGOOD	29170	\$42,004,800.00	12
2245260	M	W 173RD ST PED BRDG	AMTRAK 30 ST BRANCH	A	O-PED	2	CITY	11/14/00	4.743	FAIR	1500	\$2,160,000.00	12
2246600	M	W 176TH ST PED BRDG	APPROACH TO G.W.B.		O-PED	1	CITY	12/28/00	4.778	FAIR	1200	\$1,728,000.00	12
2246489	M	W 181 ST	RAMP TO WASH BR		O	1	STATE	03/06/00	4.766	FAIR	8200	\$11,808,000.00	12
2229400	M	W 181ST ST PED BRDG	HHP N.B.		A-PED	6	CITY	10/24/00	3.429	FAIR	1500	\$2,160,000.00	12
2241940	B	W 205TH ST	NYCTA IND YARDS	T	O	7	STATE	11/06/00	6.666	VGOOD	37800	\$54,432,000.00	7
2240120	BM	W 207TH/W FORDHAM RD	HARLEM RIVER		WM	5	STATE	04/28/00	5.75	GOOD	29682	\$42,742,080.00	12
2241489	B	W 225TH ST	CONRAIL PUTNAM	C	O	2	STATE	06/01/00	5.462	GOOD	10900	\$15,696,000.00	7
2241490	B	W 230TH ST	CONRAIL PUTNAM	C	O	1	STATE	04/16/01	5.843	GOOD	5600	\$8,064,000.00	8
2241509	B	W 231ST ST	CONRAIL PUTNAM	C	O	1	STATE	10/06/00	5.764	GOOD	4723	\$6,801,120.00	8
2241510	B	W 233RD ST	CONRAIL PUTNAM	C	O	1	STATE	04/11/01	5.47	GOOD	3760	\$5,414,400.00	8
2241520	B	W 234TH ST	CONRAIL PUTNAM	C	O	1	STATE	05/23/01	5.568	GOOD	3770	\$5,428,800.00	8
226672A	M	W 31ST ST	AMTRAK LAYUP TRACKS	A	O	9	STATE	08/28/00	3.523	FAIR	8800	\$12,672,000.00	4
224501B	M	W 33RD ST	AMTRAK 30 ST BRANCH	A	O	8	STATE	04/10/00	4.347	FAIR	16500	\$23,760,000.00	4
224501C	M	W 33RD ST	LAND ADJ TO AMTRAK	A	O	2	STATE	05/11/01	4.555	FAIR	4620	\$6,652,800.00	4
224501D	M	W 34TH ST	AMTRAK 30 ST BRANCH	A	O	4	STATE	05/15/01	4.319	FAIR	11800	\$16,992,000.00	4
224501E	M	W 35TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	04/21/00	4.388	FAIR	6500	\$9,360,000.00	4
224501F	M	W 36TH ST	AMTRAK 30 ST BRANCH	A	O	7	STATE	08/28/00	4.119	FAIR	16400	\$23,616,000.00	4
2245060	M	W 37TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	08/24/00	3.961	FAIR	7600	\$10,944,000.00	4
2245070	M	W 38TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	05/24/00	3.73	FAIR	6200	\$8,928,000.00	4
2245080	M	W 39TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	06/02/00	4.365	FAIR	6300	\$9,072,000.00	4
2245440	M	W 40TH ST	AMTRAK 30 ST BRANCH	A	O	4	STATE	05/24/00	4.073	FAIR	9400	\$13,536,000.00	4
2245330	M	W 41ST ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	04/21/00	4.444	FAIR	6200	\$8,928,000.00	4
2245210	M	W 42ND ST	AMTRAK 30 ST BRANCH	A	O	4	STATE	11/20/00	4.428	FAIR	10300	\$14,832,000.00	4
2245090	M	W 43RD ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/14/00	4.764	FAIR	4100	\$5,904,000.00	4
2245100	M	W 44TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/15/00	4.661	FAIR	4300	\$6,192,000.00	4
2245110	M	W 45TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/16/00	4.632	FAIR	4100	\$5,904,000.00	4
2245120	M	W 46TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/25/00	4.676	FAIR	4100	\$5,904,000.00	4
2245130	M	W 47TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/21/00	4.72	FAIR	4100	\$5,904,000.00	4
2245140	M	W 48TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/22/00	4.735	FAIR	4100	\$5,904,000.00	4
2245150	M	W 49TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	03/24/00	4.573	FAIR	4100	\$5,904,000.00	4
2245340	M	W 50TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	03/27/00	4.647	FAIR	4100	\$5,904,000.00	4
2245160	M	W 51ST ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/04/00	4.764	FAIR	4300	\$6,192,000.00	4
2245170	M	W 52ND ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/26/00	5.073	GOOD	4300	\$6,192,000.00	4

## INVENTORY SORTED BY FEATURE CARRIED

BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	RATING SOURCE	INSPECTION DATE	RATING	VERBAL RATING	DECK AREA	REPLACEMENT COST	CD	
2245180	M	W 53RD ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/04/00	5.338	GOOD	5100	\$7,344,000.00	4	
2245350	M	W 54TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/05/00	5.412	GOOD	4700	\$6,768,000.00	4	
2245360	M	W 55TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/06/00	5.352	GOOD	4300	\$6,192,000.00	4	
2245370	M	W 56TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/07/00	5.367	GOOD	4400	\$6,336,000.00	4	
2245220	M	W 57TH ST	AMTRAK 30 ST BRANCH	A	O	3	STATE	04/14/00	4.867	FAIR	9100	\$13,104,000.00	4	
2245190	M	W 58TH ST	AMTRAK 30 ST BRANCH	A	O	2	STATE	04/07/00	4.705	FAIR	4100	\$5,904,000.00	4	
2245420	M	W 65TH ST E.B.	BRIDLE PATH W END		O	1	STATE	04/10/00	5.318	GOOD	1600	\$2,304,000.00	64	
2229290	M	W 79 ST	AMTRAK	A	A	1	STATE	10/17/00	4.559	FAIR	4500	\$6,480,000.00	7	
2231860	Q	W ALLEY ROAD	BCIP		A	2	STATE	06/06/00	5.636	GOOD	7200	\$10,368,000.00	11	
2244020	K	W DR OV WK-MA.ENT	MEADOWPORT ARCH		O	1	STATE	04/24/01	5.571	GOOD	2500	\$3,600,000.00	55	
2241470	B	W FORDHAM RD	METRO NORTH RR HUD	M	O	5	STATE	10/27/01	6.333	VGOOD	16052	\$23,114,880.00	7	
2241460	B	W TREMONT AVE	METRO NORTH RR HUD	M	O	8	STATE	03/28/00	5.029	GOOD	12900	\$18,576,000.00	5	
2269260	K	W. 8TH STREET	SURF AVE.		O-PED	55	CITY	06/12/00	4.111	FAIR	14742	\$21,228,480.00	13	
2269210	M	W.68TH STREET	AMTRAK		O	3	STATE	08/13/01	6.796	VGOOD	5349	\$7,702,560.00	7	
2269190	M	W.70TH STREET	AMTRAK		O	3	STATE	08/13/01	6.944	VGOOD	17433	\$25,103,520.00	7	
2241070	B	WALEES AVE	CONRAIL PT MORRIS	C	O	1	STATE	09/13/00	6.566	VGOOD	2300	\$3,312,000.00	1	
2241410	B	WALTON AVE	METRO NORTH RR HUD	M	O	1	STATE	03/15/00	4.234	FAIR	3600	\$5,184,000.00	4	
2240620	M	WARDS ISLAND PED BRDG	HARLEM RIVER		WM-PED	10	CITY	10/08/00	4.049	FAIR	12600	\$18,144,000.00	11	
2243250	K	WASHINGTON AVE	FRANKLIN SHUTTLE	T	O	1	STATE	03/15/00	6.328	VGOOD	6500	\$9,360,000.00	9	
2066919	BM	WASHINGTON BRIDGE	HARLEM RIVER		W	9	STATE	10/27/00	4.88	FAIR	128339	\$184,808,160.00	12	
2246000	M	WEST DRIVE	PED BET 61ST & 62ST		O	1	STATE	04/13/00	5	GOOD	2500	\$3,600,000.00	64	
2246080	M	WEST DRIVE	BRIDLE PATH @ 64TH ST		O	1	STATE	04/10/00	5.166	GOOD	2000	\$2,880,000.00	64	
2246120	M	WEST DRIVE	TRANSVERSE RD #1		O	1	STATE	04/20/00	5	GOOD	7900	\$11,376,000.00	64	
2246240	M	WEST DRIVE	TRANSVERSE RD #2		O	1	STATE	04/19/00	4.166	FAIR	7200	\$10,368,000.00	64	
2246260	M	WEST DRIVE	TRANSVERSE RD #3		O	1	STATE	01/28/00	4.8	FAIR	5100	\$7,344,000.00	64	
2246280	M	WEST DRIVE	TRANSVERSE RD #4		O	1	STATE	01/26/00	4.166	FAIR	4700	\$6,768,000.00	64	
2246330	M	WEST DRIVE	FEEDER TO LAKE		WO	1	STATE	02/29/00	5	GOOD	6700	\$9,648,000.00	64	
2246360	M	WEST DRIVE	PED WALK OPP 82 ST		O	1	STATE	03/02/00	6.045	VGOOD	3100	\$4,464,000.00	64	
2246430	M	WEST DRIVE	PED OPP 109TH ST		O	1	STATE	04/07/00	4.266	FAIR	1200	\$1,728,000.00	64	
2267380	M	WEST STREET	RECTOR ST		AT	1	STATE	08/20/01	5.033	GOOD	4320	\$6,220,800.00	1	
2075837	B	WESTCHESTER AVE	HUTCHINSON RVR PKWY		A	2	STATE	05/21/01	4.388	FAIR	15858	\$22,835,520.00	10	
2240180	B	WESTCHESTER AVE	BRONX RIVER		W	1	STATE	07/19/01	5.015	GOOD	5476	\$7,885,440.00	2	
2241000	B	WESTCHESTER AVE	CONRAIL PT MORRIS	C	O	1	STATE	09/05/00	5.17	GOOD	1740	\$2,505,600.00	1	
2241230	B	WESTCHESTER AVE	AMTRAK	A	O	5	STATE	06/02/00	6.25	VGOOD	15600	\$22,464,000.00	2	
2241329	B	WHITE PLAINS ROAD	AMTRAK	A	O	1	STATE	06/24/00	5.046	GOOD	6900	\$9,936,000.00	9	
2248020	Q	WHITELAW PED BRDG	CONDUIT AVE		O-PED	7	CITY	09/06/00	4.887	FAIR	5500	\$7,920,000.00	10	
1065210	Q	WHITESTONE EXP NB	BCIP (2065210)		A	1	STATE	05/01/00	4.682	FAIR	2500	\$3,600,000.00	7	
2241369	B	WILLIAMSBRIDGE RD	AMTRAK	A	O	2	STATE	06/20/00	4.776	FAIR	10400	\$14,976,000.00	11	
2240039	KM	WILLIAMSBRIDGE BRIDGE	EAST RIVER	T	WE	72	STATE	12/06/00	2.68	POOR	741000	\$1,067,040,000.00	3	
2240059	BM	WILLIS AVENUE	HARLEM RIVER		WM	26	STATE	07/13/01	3.152	FAIR	94700	\$136,368,000.00	11	
2266139	Q	WINCHESTER BLVD N.B.	BCIP		A	1	STATE	03/22/00	4.795	FAIR	6400	\$9,216,000.00	11	
2266129	Q	WINCHESTER BLVD S.B.	BCIP		A	1	STATE	03/21/00	4.659	FAIR	4400	\$6,336,000.00	11	
2244421	K	WLLMSBRG BRDG NTH APP	DRIGGS AVE		O	1	STATE	02/16/00	4.293	FAIR	3170	\$4,564,800.00	1	
2248019	Q	WOODHAVEN BLVD	ATLANTIC AVE		O	3	STATE	06/29/00	4.472	FAIR	19400	\$27,936,000.00	9	
2248159	Q	WOODHAVEN BLVD	QUEENS BLVD		O	2	STATE	03/24/00	4.307	FAIR	11500	\$16,560,000.00	6	
2230540	Q	WOODSIDE AVE	2781 (B.Q.E.)		A	1	STATE	01/03/00	5.14	GOOD	7500	\$10,800,000.00	2	
2247120	Q	WOODSIDE AVE	LIRR MAIN LINE	L	O	3	STATE	10/27/01	4.428	FAIR	14900	\$21,456,000.00	2	
2247400	Q	WOODSIDE AVE	CONRAIL	C	O	1	STATE	06/25/01	5.066	GOOD	8200	\$11,808,000.00	2	
2242200	B	YANKEE STDM PED BRDG	E 153 ST, METRO NORTH	M	O-PED	5	CITY	07/31/00	5	GOOD	4200	\$6,048,000.00	4	
<b>752 BRIDGES</b>						<b>4564</b>	<b>SPANS</b>						<b>\$20,589,892,320.00</b>	

STATEN ISLAND CULVERTS							
BIN	BORO	FEATURE CARRIED	FEATURE CROSSED	RAIL ROAD	BRIDGE TYPE	SPANS	SOURCE
R00003	R	DELAFIELD AVE	RAYMOND PLACE		O	1	CITY
R00004	R	DICKIE AVE	NEAR COLUMBUS PLACE		O	1	CITY
R00005	R	BIDWELL AVE	COLUMBUS PLACE		O	1	CITY
R00006	R	LIVERMORE AVE	WATCHOGUE ROAD		O	1	CITY
R00010	R	GALLOWAY AVE	MARIANNE ST		O	1	CITY
R00011	R	FOREST AVE	CRYSTAL AVE		O	1	CITY
R00013	R	NAUGHTON AVE	PATTERSON AVE		O	3	CITY
R00015	R	OLYMPIA BLVD	SLATER AVE		O	1	CITY
R00016	R	GRAHAM BLVD	JAY ST		O	2	CITY
R00021	R	HUNTER AVE	IDLEPLACE		O	1	CITY
R00022	R	IDLEPLACE	HUNTER AVE		O	1	CITY
R00023	R	MIDLAND AVE	HYLAN BLVD		O	1	CITY
R00024	R	LINCOLN AVE	SANILAC ST		O	1	CITY
R00025	R	GREELEY AVE	SANILAC ST		O	1	CITY
R00027	R	ELEANOR ST	ROCKLAND AVE		O	1	CITY
R00031	R	TARLTON ST	GREAT KILLS LANE		O	1	CITY
R00032	R	SEGUINE AVE	PURDY PLACE		O	1	CITY
R00034	R	ROCKLAND AVE	BRIELLE AVE		O	1	CITY
R00035	R	BRADLEY AVE	WILLOWBROOK ROAD		O	1	CITY
R00036	R	AMBOY ROAD	ARBUTUS AVE		O	1	CITY
R00038	R	MAGUIRE AVE	DEPEW PLACE		O	1	CITY
R00039	R	MAGUIRE AVE	DEPEW PLACE		O	1	CITY
R00040	R	113 MAGUIRE AVE	DEPEW PLACE		O	1	CITY
R00041	R	93 FOSTER ROAD	AMBOY ROAD		O	1	CITY
R00042	R	LEDYARD PLACE	LACONIA AVE		O	1	CITY
R00044	R	REID AVE	HURBERT ST		O	1	CITY
R00046	R	RICHMOND TERRACE	SNUG HARBOUR		O	2	CITY
R00047	R	SIMONSON AVE	WALKER ST		O	1	CITY
R00048	R	VAN NAME AVE	WALKER AVE		O	1	CITY
R00049	R	VAN PELT AVE	WALKER ST		O	1	CITY
R00050	R	UNION AVE	NETHERLAND AVE		O	1	CITY
R00051	R	HARBOR ROAD	DUBLIN PLACE		O	1	CITY
R00055	R	TRAVIS AVE	VICTORY BLVD		O	1	CITY
R00056	R	RICHMOND TERR	WESTERN AVE		WO	1	CITY
R00059	R	WESTERN AVE	RR BRIDGE		WO	1	CITY
R00060	R	SIGNS ROAD	VICTORY BLVD		O	1	CITY
R00062	R	KISSEL AVE	SNUG HARBOR ROAD		O	1	CITY
R00065	R	HENDERSON AVE	WESTBURY AVE		O	1	CITY
R00068	R	FOREST AVE	RANDALL AVE		O	1	CITY
R00069	R	GREGG PLACE	RANDALL AVE		O	1	CITY
R00076	R	ROOSEVELT AVE	HAROLD ST		O	1	CITY
R00077	R	BUCHANAN AVE	HAROLD ST		O	1	CITY
R00078	R	WILLOW BROOK ROAD	FILLMORE AVE		O	1	CITY
R00079	R	FILLMORE AVE	WILLOW BROOK ROAD		O	1	CITY
R00084	R	ARTHUR KILL ROAD	MULDOON AVE		O	1	CITY
R00085	R	ARTHUR KILL ROAD	150' N.W. ELLIS ROAD		O	1	CITY
R00086	R	ARTHUR KILL ROAD	ENGLEWOOD ST		O	1	CITY
R00095	R	MEISNER AVE	ROCKLAND AVE		O	1	CITY
R00096	R	ROCKLAND AVE	MANOR ROAD		O	1	CITY

**STATEN ISLAND CULVERTS**

<b>BIN</b>	<b>BORO</b>	<b>FEATURE CARRIED</b>	<b>FEATURE CROSSED</b>	<b>RAIL ROAD</b>	<b>BRIDGE TYPE</b>	<b>SPANS</b>	<b>SOURCE</b>
R00097	R	RICHMOND HILL ROAD	RICHMOND ROAD		O	1	CITY
R00101	R	ST ANDREWS ROAD	LIGHTHOUSE AVE		O	1	CITY
R00103	R	AULTMAN AVE	ST GEORGE ROAD		O	2	CITY
R00104	R	ST. GEORGE ROAD	ASCOTT AVE		O	1	CITY
R00106	R	ARTHUR KILL ROAD	RICHMONDTOWN ROAD		O	1	CITY
R00111	R	ELTINGVILLE BLVD	KATAN AVE		O	2	CITY
R00114	R	SWEET BROOK ROAD	RIDGEWOOD ROAD		O	1	CITY
R00115	R	VICTORY BLVD	CLOVES LAKE PARK		O	3	CITY
R00122	R	ARTHUR KILL ROAD	RIDGEWOOD AVE		O	1	CITY
R00129	R	LAMOKA AVE	DEMOPOLIS AVE		O	1	CITY
R00130	R	DEMOPOLIS AVE	LAMOKA AVE		O	2	CITY
R00133	R	ARDEN AVE	HALPIN AVE		O	1	CITY
R00135	R	HYLAN BLVD	CORNELIA AVE		O	1	CITY
R00136	R	SNUG HARBOR ROAD	KISSEL AVE		O	1	CITY
R00137	R	RICHMOND TERRACE	WESTERN AVE		O	2	CITY
R00138	R	HOLLAND AVE	BENJAMIN PLACE		O	1	CITY
R00139	R	DE PEW PL	MAGUIRE AVE		O	1	CITY
R00141	R	ALTER AVE	STORM&GRND FED STREAM		O	1	CITY

## GLOSSARY

A brief glossary of those terms most commonly used in bridge design, construction and maintenance is presented below. Cross-references are indicated through the use of BLOCK LETTERING.

### **ABUTMENT**

Walls of reinforced concrete or masonry. Abutments support a bridge's SUPERSTRUCTURE and APPROACHES, as well as retain the embankments that are positioned at the extreme ends of a multi-span bridge.

### **ANCHORAGE**

A solid mass, usually comprised of concrete, that encases a grillage of heavy steel bars into which the ends of a suspension bridge's main cables are anchored. Anchorages are designed to resist the pull of the cables.

### **APPROACH**

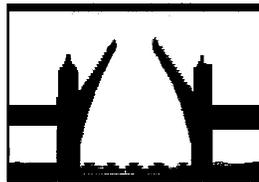
Roadway at each end of a bridge, beyond the ABUTMENT, providing access to the bridge.

### **ARTERIAL BRIDGE**

Any bridge upon which an arterial highway runs as it crosses streets, water, railroads, etc.

### **BASCULE BRIDGES**

Bascule bridges are movable bridges, typically referred to as "draw bridges" which rotate the superstructure vertically. The movable leaf of the structure - known as a *bascule* - is counterbalanced by weights of such size that minimal power is required for operation - just enough to overcome inertia, frictional resistance, wind and snow loads. Such bridges are relatively speedy to operate and provide unlimited vertical clearance. Examples of bascule bridges currently under the jurisdiction of the New York City Department of Transportation include the Unionport, **Pelham**, Hamilton Avenue, Third Street, Union Street, and Greenpoint Avenue Bridges.



### **BEARINGS**

Designed to transmit the load from the SUPERSTRUCTURE to the SUBSTRUCTURE. Divided into two types, expansion and fixed, bearings are needed to ensure that certain elements are not forced to take more load than that for which they were designed and that the bridge can move slightly under load and temperature changes as needed.

### **BID**

A contractor's formal proposal, including prices, to perform the work set out in the project SPECIFICATIONS.

### **BRIDGE**

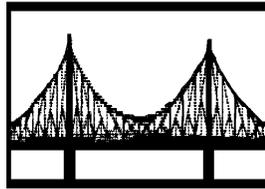
A structure connecting two points, greater than 20 feet in distance, which carries vehicular and/or pedestrian traffic over water, a descending slope, or another road.

## **CABLE**

A steel rope, composed of parallel or twisted wires, used to support the road deck of SUSPENSION BRIDGES or cable stayed bridges.

## **CANTILEVER BRIDGES**

Bridges of this type are economical to build because they require less material in construction and less condemnation of property is necessary for the narrow piers which are sufficient for support. Typically, no falsework is required during construction and the bridge does not exceed 1,800 feet in length. NYCDOT's **Queensboro Bridge** is a notable example of this type of structure.



## **CHANGE ORDER**

An approved modification of the SPECIFICATIONS or the costs in a construction contract.

## **CHIPPING HAMMER**

A welder's compressed-air tool for cleaning steel after welding. It is also used by bridge inspectors.

## **CULVERT**

Any structure under the roadway with a clear opening of twenty feet or less, measured along the center of the roadway.

## **DEAD LOAD**

The weight of the bridge itself without any traffic or external loads.

## **DECK**

The supporting slab and wearing surface of a bridge.

## **DESIGN-BUILD CONTRACTS**

A delivery procedure where one company is retained to perform both design and construction, thus expediting the capital bridge rehabilitation program.

## **EFFLORESCENCE**

White salts that water movement brings to the surface of porous construction materials.

## **ELECTRICAL MAINTENANCE**

Preventive maintenance to electrical systems on the East River bridges (e.g., travelers, lighting systems) and the movable bridges (e.g., contacts, relays, switches, controls, limit switches, and lighting systems).

## **EXPANSION JOINTS**

Located throughout a bridge, expansion joints are located in the deck, directly above the BEARINGS. Expansion joints allow parts of the structure to expand independently and therefore relieve stresses that may otherwise cause damage.

## **EYEBARS**

Steel bars with each end shaped like the eyes of giant needles. They provide total anchorage of the suspension cable and are buried deep within the ANCHORAGE structure.

## **FIXED PRICE CONTRACT**

A contract with an overall predetermined price for the project work.

## **FLAG CONDITIONS**

A "Flag" is a hazardous or potentially hazardous condition on a bridge. A "Flag" is classified as either Red, Yellow, or Safety. A "Red Flag" requires prompt evaluation and, possibly, corrective action. A "Yellow Flag" is used to report a potentially hazardous structural condition, which if left unresolved will most likely become a danger to the soundness of the bridge and a hazard to the public. In the case of a "Safety Flag", there is no danger of partial or complete structural failure of the bridge; however, if left unattended, those conditions can present a vehicular or pedestrian hazard.

## **FOOTINGS**

Part of the substructure known as the bridge foundation, they are masses of reinforced concrete which can be found beneath the ABUTMENTS and PIER and which spread the load to allow the soil to support the structure above.

## **FULL STEEL PAINTING**

A bridge painting technique that involves cleaning of steel surfaces using approved environmentally safe paint removal techniques (blasting, power tools, or hand tools). A full primer, intermediate and finish coat are applied using combinations of brush, roller, or (if necessary) spray painting.

## **GENERAL CONTRACTOR**

has overall responsibility for a construction project. The general contractor may break down the project into smaller pieces to be handled by subcontractors.

## **GIRDER SPAN BRIDGES**

are primarily employed in bridging short distances, and may be classified as either simple or continuous. The steel girders carry the roadway and roadway load to end supports. The Midtown Highway, Hook Creek, Little Neck and Brooklyn Third Avenue Bridges are of this type.



## **LIVE LOAD**

The weight of the traffic crossing a bridge and of other external loads applied to the structure (excluding the weight of the bridge itself.)

## **LUBRICATION MAINTENANCE**

Lubrication of mechanical parts of the East River bridges (e.g., travelers, cables, solid rod suspenders, and eyebars), and the movable bridges (e.g., bearings, brakes, limit switches, and gates).

**MASONRY**

Construction materials made of concrete, brick, tile, or stone.

**MOVABLE BRIDGE**

A type of bridge which carries vehicular or pedestrian traffic over a navigable waterway, and which opens to permit the passage of a ship, barge or boat.

**NECKLACE LIGHTS**

The necklace lights are those lights on the main cables of suspension bridges which, when illuminated at night, resemble a necklace.

**PANEL POINT**

The point at which two members of a TRUSS cross.

**PIER**

Part of a bridge's substructure, piers are the intermediate supports or columns which support a multi-span bridge. Piers may be composed of steel or reinforced concrete, and can appear as columns or solid walls.

**PILES**

A concrete, steel or timber column located beneath the footings of a bridge and embedded in the soil. Piles are employed in bridges only if the soil directly below the footing is not firm enough to support the bridge loads.

**PLUMB BOB**

A weight hanging on a string (plumb line), used by bridge inspectors to show the direction of the vertical distance.

**PORTLAND CEMENT CONCRETE**

The most common concrete used in construction. It was patented in England in 1820, and is so named because when hard, it resembles Portland stones from Dorset.

**POTHOLE**

A hole in a roadway or pavement, usually caused by heavy vehicular traffic or weathering.

**PREVENTIVE MAINTENANCE**

Extends the useful life of a bridge and reduces the need for capital reconstruction expenditures and the associated vehicular traffic problems, including lane closures and congestion. Preventive maintenance tasks on the bridges include: the cleaning of drainage systems, gratings, and expansion joints; the washing of the deck area and salt splash zones; full-steel, salt splash, and spot painting; the patching of sidewalks; the maintenance of electrical devices; and the oiling of mechanical components.

**PRIMER**

The first layer of paint used to cover the unsealed surface. This is followed by at least one more coat of paint.

**PUNCH LIST**

A catalogue of minor items still outstanding towards the end of a construction project.

## **RAILROAD FORCE ACCOUNTS**

Railroad force accounts are contracts between the Agency and railroads by which the railroads supply flag personnel so the Division can perform repair work on bridges that cross over railroad tracks.

## **REBAR, or REINFORCING BAR**

Steel bars placed within concrete to add strength (tensile load-bearing capacity) to the structure.

## **RECONSTRUCTION**

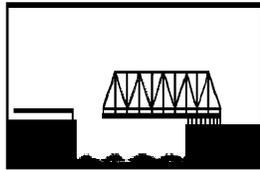
Reconstruction of severely deteriorated bridges includes extensive rehabilitation, as well as partial or complete replacement, either in-kind or newly designed.

## **REHABILITATION**

Extending the useful life of a bridge by painting, repairing or replacing the DECK or selected elements of the SUBSTRUCTURE or SUPERSTRUCTURE. This type of work is performed primarily on those structures not classified as deficient, but which contain specific components that have low condition ratings.

## **RETRACTILE BRIDGES**

Retractile bridges are movable bridges that are mounted on tracks that are positioned to one side of a navigational channel. To open, the bridge is withdrawn or "retracted" to shore. Although fascinating to observe and efficient to operate, retractile bridges are considered obsolete because of the expansive land areas that must be condemned in order to accommodate their tracks. The New York City Department of Transportation currently possesses two retractile bridges - the **Borden Avenue** and Carroll Street bridges, rare examples of the bridge builders' art.



## **SADDLE**

A special curved casting atop a SUSPENSION BRIDGE tower into which the cables are placed to avoid sharp bends in directional changes of the cable.

## **SALT SPLASH ZONE PAINTING**

A bridge painting process that involves preparation of the area to be painted by power wash, using clean water or steam. After power washing, hand and power tools are used in areas which have started to show deterioration from accumulated de-icing agents. Solvent cleaning is done in locations where oil and grease need to be removed from the steel surface. A spot PRIMER coat and finish coat are then applied by brush or roller. Occasionally, when there is no danger of overspray, spray painting may be performed.

## **SPALLING**

The flaking or breaking out of concrete parallel to the main surface, caused by a blow, or by the action of weather or pressure.

## **SPAN**

The distance between consecutive supports of a bridge.

**SPECIFICATIONS OR SPECS**

A detailed listing of required construction materials and methods to be used in the project. This information is a supplement to the blue prints and working drawings.

**SPLAY CASTING**

A steel or cast-iron collar fitted around a bridge suspension CABLE at the location where it spreads out (splays) into separate bundles of wires which are then attached to the ANCHORAGE EYEBARS. It is used to control the degree and location of the splay. These castings are usually located at the entry point of the cable into the anchorage chamber.



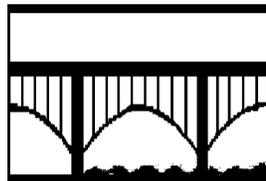
Consultants Inspecting the Splay Casting at Anchorage D of the Williamsburg Bridge, Where the Suspension Cables are Secured

**SPOT PAINTING**

When the surface to be painted is contaminated with de-icing salts, sea salt, bird excrement, or other corrosive agents, the area is prepared by power washing, using clean water or steam. When grease or oil is present, it is removed by solvents. Mechanical cleaning with hand and/or power tools is performed in the areas containing deteriorated paint. A spot PRIMER coat and a single finish coat are applied by brush or roller. Occasionally, when there is no danger of overspray, spray painting may be performed.

**STEEL ARCH BRIDGES**

Steel arch bridges consist of either a single arch or a series of arches fashioned from steel or concrete. Aesthetically one of the more attractive bridge types. Arch structures can prove economical to construct if the bridge spans between high ABUTMENTS. At present, there is only one bridge of this kind in steel under the guardianship of the NYCDOT; the twin-arched **Washington Bridge**, positioned over the Harlem River at 181<sup>st</sup> Street. This bridge opened to traffic in December 1888 and, with its approaches, is 2,375 feet long.



**STEM**

The vertical part of a retaining wall, usually made of concrete or masonry.

## **STRAIN GAUGE TESTING**

Small strips of material (imagine a small band-aid) are glued onto part of a structure to measure the stress in the material under load. Inside the small "band-aid" are tiny electrical wires. When a structure is under load it stretches (tension) or contracts (compression). When this happens, the resistance in the tiny wires in the strain gauge changes, resulting in a change in the wire's current. What is actually being measured are changes in the electrical current in the tiny wires. Knowing the physical properties of the structural member that the gauge is attached to, (such as steel), a calculation can then be made to convert these changes in current to changes in stress. The readings are taken with special instruments that record the information over the desired period of time or loading sequences.

## **STRAND**

Comprised of hundreds of thin wires laid parallel to form a bundle, strands comprise the base element in the CABLES, or main cables, on a SUSPENSION BRIDGE or cable stayed bridge.

## **STRINGER**

A part of a bridge's SUPERSTRUCTURE, a stringer is essentially a beam parallel to the span used to support the road DECK.

## **SUBSTRUCTURE**

The name given to those elements below a bridge's road deck system, namely the ABUTMENTS, ANCHORAGES, BEARINGS, and PIERS.

## **SUPERSTRUCTURE**

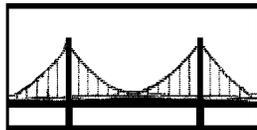
The superstructure is all that part of a structure above the bearings of simple and continuous spans, skewbacks of arches and top of footings of rigid frames; excluding backwalls, WINGWALLS and wing protection railings.

## **SUSPENDER**

A wire rope or a short vertical rod that enables the forces of the roadway of a SUSPENSION BRIDGE to be translated into an axial force in the supporting CABLES.

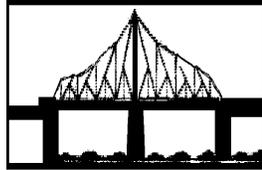
## **SUSPENSION BRIDGES**

Suspension bridges are high level bridges with spans that usually exceed 1,500 feet in length. Supported by large wire CABLES that are anchored to masses of concrete and which pass over the tops of towers, the road DECK is suspended at regular intervals by smaller cables called suspenders. While the main cables carry the entire live and dead load, stiffening TRUSSES are required to distribute the live load and prevent excessive deflection at any point. The Brooklyn, Manhattan and **Williamsburg** Bridges are noted New York City examples of this type.



## **SWING BRIDGES**

Swing bridges are movable bridges that are supported on a center PIER in the center of a waterway, and are opened by rotating the SUPERSTRUCTURE horizontally on wheels riding on a circular track. Two channels are provided on either side of the bridge for navigational ease when the bridge is in the open position. Because swing bridges are slow to operate and restrict channel width, they are rarely constructed today. Examples of swing bridges in New York City include the Third Avenue, Madison Avenue, 145th Street, **University Heights**, Grand Street and Macombs Dam Bridges.



## **TIME AND MATERIALS CONTRACT**

A contract in which the contractor's labor and material costs are reimbursed at a predetermined rate of profit.

## **TORSION**

Twisting force usually caused by unbalanced or asymmetrical loading.

## **TOWER**

Often the most majestic element in a SUSPENSION or cable stayed bridge, the **tower** serves as a support for the structure's main CABLES.



## **TRAVELER MAINTENANCE**

The maintenance of a traveler (movable underdeck platform) that runs under the East River Bridges so maintenance, inspections and repairs can be performed to the underside of the bridge.

## **TRUSS**

A rigid framework built of interconnecting steel beams, creating a large "girder" to support the floor system and transfer loads to the substructure over a longer span.

## **TRUSS BRIDGES**

Truss bridges possess road decks that are supported by Steel TRUSSES that rest on PIERS and ABUTMENTS, and which span short distances. The 174th Street Bridge in the Bronx is an example of a truss bridge.

### **VERTICAL LIFT BRIDGES**

Vertical lift bridges are movable bridges which have road DECKS that operate in much the same fashion as an elevator. Comprised of supporting end CABLES that are attached at one end to the road DECK and at the other to rotating drums, these bridges are raised and lowered to allow for the safe passage of marine traffic. The **103rd Street - Wards Island Pedestrian Bridge**, Ninth Street Bridge, and Broadway Bridge are examples of this type of bridge.



### **VIADUCT BRIDGES**

Viaduct bridges are multi-span bridges containing two end spans and any number of intermediate SPANS. The end spans are supported by an ABUTMENT on one end and a PIER on the other. The intermediate spans held aloft by piers.

### **WINGWALL**

Walls of reinforced concrete or stone that prevent the soil behind the ABUTMENT from eroding away and leaving a void beneath the approaches of the bridge. Also known as a retaining wall.

## COMPONENTS OF THE PREVENTIVE MAINTENANCE PROGRAM\*

### Bridge Protection through Dirt and Water Control

**Cleaning of Abutment and Pier Tops** Removal of debris, dirt and vegetation from abutment and pier tops; cleaning and lubrication of bridge bearings.

**Debris Removal** Removal of spilled trash; removal of rocks, wood, plastic or metal objects, tires, mufflers, wheel covers, and other traffic droppings; removal of paper products, bottles, cans, accumulated dirt and other trash. Debris removal is also required for walkways and plazas. For movable bridges and bridges over water, the protective fender system need to be cleared of debris. The removal of debris from bridges is an important and critical component of maintenance. Debris can cause safety and hazard conditions. In addition, debris traps moisture and salts on the structure and prevents proper drainage.



Manhattan Bridge Tower After Debris Removal



Hutchinson River Parkway Under Westchester Avenue

**Cleaning of Drainage System** Removal of debris, dirt and vegetation from drainage systems, including gutter gratings, gutters and leaders, scuppers, down spouts and scupper piping systems. The cleaning of surface gratings and gutters requires hand tools, brooms and brushes. In some cases, an air compressor might be needed to blow out some gutters. Cleaning the scuppers and scupper piping systems requires specialized equipment.



Cleaning Catch Basins on the Manhattan Bridge



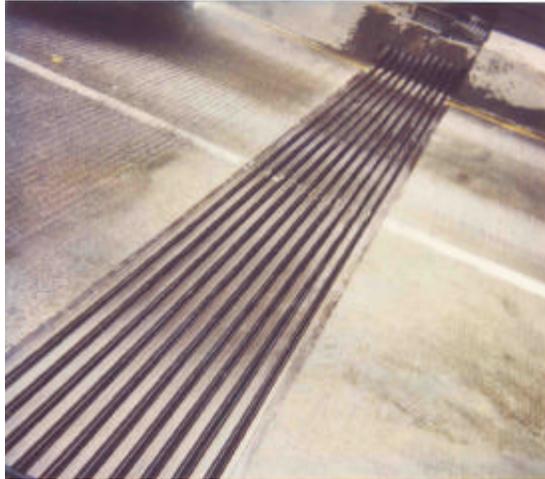
## COMPONENTS OF THE PREVENTIVE MAINTENANCE PROGRAM\*

### Cleaning of Expansion Joints

Removal of debris and dirt from the troughs using compressed air or water; and cleaning and resealing of the joints. Performed on all bridges. Expansion joints are located at the surface level where they are subjected to impact and vibration and are exposed not only to the elements such as water, dust, grit, ultra-violet rays and ozone, but also to the effect of chemicals such as salt solutions, cement alkalis and petroleum derivatives. In addition to regular lubrication of moving parts, penetration of water, silt and grit must be effectively prevented or provision made for their removal.



Expansion Joint Cleaning on the Manhattan Bridge



Clean Expansion Joint on the Manhattan Bridge

### Cleaning of Open Grating Decks

Removal of debris and dirt from open-grating decks and washing with high-pressure water jets.

### Sweeping

Sweeping each bridge with a mechanical sweeper along each curb.

Sweeping each bridge with a mechanical sweeper along each curb.



Sweeping the Grand Street Bridge

## COMPONENTS OF THE PREVENTIVE MAINTENANCE PROGRAM\*

**Washing of Decks and Salt Splash Zones** Washing of decks and salt splash zones to remove remnants of de-icing salts; use of compressed air and water jets to clean tight corners.

### Roadway Surface Maintenance

**Crack Sealing in Pavement and Curbline Sealing** Cleaning of cracks and filling them with sealant; sealing with mastic material along the curb line to prevent water leakage onto bridge components. This maintenance function is sensitive to weather conditions.

**Repair of Sidewalks and Curbs** Sidewalk repair to restore sidewalk to original condition. Curb repair to be undertaken along with this task.

**Replacement of Wearing Surfaces** Removal of old wearing surface; preparation of exposed concrete slab or steel plate; installation of new wearing surface. The wearing surface is a two-inch course of bituminous concrete. Also includes minor deck repair, cleaning and waterproofing of deck.



Asphalt Repair on the Grand Street Bridge

### Electrical and Mechanical Component Maintenance of the 4 East River Bridges and 25 Movable Bridges

**Maintenance of Electrical Devices** Checking and servicing electrical systems such as travelers, relays, auxiliary contacts, meters, overload relays, time delay relays, span and tail locks, brake systems, transmitters, transformers, fuses, wiring, resistors, etc. Also includes checking interior anchorage lighting, caution lighting, navigation lighting, and necklace lighting. During inspection, the travelers of the East River Bridges are operated to ensure proper calibration of electric motors. If motors are not calibrated properly, the travelers may rotate and jam along their guides. Many of the movable bridges are very old and replacement parts are difficult to find or may not be available any longer. When necessary, Division personnel fabricate machine parts such as shafts, and brake and warning gate components. In addition to inspection of systems, the electrical technicians replace poor condition components with electric systems before corrective maintenance is required. This preventive maintenance strategy avoids disruption of bridge service to motorists. This is important, as once corrective maintenance is necessary, it may require the bridge to be out of service for lengthy periods.

## COMPONENTS OF THE PREVENTIVE MAINTENANCE PROGRAM\*

**Maintenance of Mechanical Components** Cleaning and lubrication of all movable parts and bridge cables for the four East River Bridges and the twenty-five movable bridges. Cleaning and lubrication of travelers; cleaning, wedging and oiling of the main cable strands and eyebars; cleaning of truss bearings; cleaning and lubricating air and fire line valves. Cleaning and lubrication is required to keep components from corroding and becoming immobile. Allowing components to seize could cause operating failure and introduce unsafe structural stresses.

### Steel Protection – Painting\*\*

**Total Paint Removal and Repainting** Constructing negative pressure containment (Class 1A); washing and surface blasting to commercial-blast or near-white metal condition (SSPC SP-6 or SP-10); lead monitoring and disposal; applying lead-free paint; primer, intermediate coat and top coat. Surface preparation is accomplished by abrasive blasting. The containment materials include tarps, plywood, scaffolding, and cables. Equipment includes blasting machines, spray pumps, compressors, dust collectors, filters, and ductwork.

**Full-Steel (Overcoating)** Overcoating of the entire bridge. Solvent cleaning and cleaning of steel surfaces in areas with deteriorated paint is conducted using approved environmentally safe paint removal techniques, and either power tools, hand tools or combination hand/power tools. Power tool cleaning is performed in a Class 3P containment, and hand tool cleaning in a Class 4 containment. Combination hand/power tool cleaning is performed in a Class 3P containment. A localized primer coat and a single finish coat are then applied by brush, roller, or spray over the entire bridge.

**Spot Painting** When the surface to be painted is contaminated with de-icing salts, sea salt, bird excrement, or other corrosive agents, the area is prepared by power washing, using clean water or steam. When grease or oil is present, it is removed by solvents. Mechanical cleaning with hand and/or power tools is performed in the areas containing deteriorated paint. Power tool cleaning is performed in a Class 3P containment, and hand tool cleaning in a Class 4 containment. Combination hand/power tool cleaning is performed in a Class 3P containment. A spot primer coat and a single finish coat are applied by brush or roller. Occasionally, when there is no danger of overspray, spray painting may be performed.

## COMPONENTS OF THE PREVENTIVE MAINTENANCE PROGRAM\*

**Salt Splash Painting** A bridge painting process that involves preparation of the area to be painted by power wash, using clean water or steam. Solvent cleaning is done in locations where oil and grease need to be removed from the steel surface. Areas to be power washed and painted are: the superstructure (up to six feet upwards from the deck), the underdeck steel (up to three feet from each side of the center line of the expansion joints), and the outside of the bridge's steel faces. After power washing, hand and power tools are used in areas that have started to show deterioration from accumulated de-icing agents. Power tool cleaning is performed in a Class 3P containment, and hand tool cleaning in a Class 4 containment. Combination hand/power tool cleaning is performed in a Class 3P containment. A spot primer coat and finish coat are then applied by brush or roller. Occasionally, when there is no danger of overspray, spray painting may be performed.



Spot Cleaning Before Painting on the Williamsburg Bridge



Primer Coating on the Williamsburg Bridge

\*Consortium of Civil Engineering Departments of New York City Colleges and Universities. *Preventive Maintenance Management System For New York City Bridges: Update 1998. Technical Report No. 98-1. 1999.* \*\*Descriptions modified in February 2002.

## MAINTENANCE PERSONNEL RESOURCES IN 2001

Preventive maintenance, corrective repair, flag repair, and painting work on the bridges and other structures within the City is performed by mechanics and supervisors in a variety of trades. The bridge operators provide safe and expedient passage to all marine and vehicular traffic under and on movable bridges. A breakdown of this work force by trade is:

	SUPERVISORS	MECHANICS
BRICKLAYERS	2	5
BRIDGE OPERATORS (INCLUDES ASSISTANTS)	18	70
BRIDGE PAINTERS	7	41
BRIDGE REPAIRERS/RIVETERS	4	39
CARPENTERS	2	11
CEMENT MASONS	-	7
DEBRIS REMOVERS	-	1
ELECTRICIANS (INCLUDES HELPERS)	3	20
HIGHWAY REPAIRERS (INCLUDES ASSISTANTS & SEASONAL WORKERS)	25	100
MACHINISTS	-	2
MOTOR GRADER OPERATORS	-	1
OILERS	-	16
STATIONARY ENGINEERS (ELECTRIC)	-	1
TRACTOR OPERATORS	-	1
TRAFFIC DEVICE MAINTAINERS	-	4
<b>TOTALS</b>	<b>61 SUPERVISORS</b>	<b>319 MECHANICS</b>

## MAINTENANCE PERSONNEL RESOURCES IN 1900

A breakdown of the Department of Bridges work force by trade in 1900:

	SUPERVISORS	MECHANICS
AXEMAN		8
BLACKSMITH	1	2
BOILERMAKER		1
BRICK MASON	1	4
BRIDGE TENDER	15	137
CARPENTER	1	23
DOCKBUILDER		1
DRIVER		11
FIREMAN		18
FITTER		3
GATEMAN		7
INSPECTOR (INCLUDING STEEL)		10
LABORER (INCLUDES HELPERS)	7	111
LEVELER		4
LINEMAN		3
MACHINIST (INCLUDING HELPERS)		13
MASONRY INSPECTOR		7
MECHANIC	1	2
PAINTER	1	16
RIGGER		11
RIVETER	1	6
RODMAN		4
SHIP CARPENTER		4
SOUNDER		4
STABLEHAND		3
STEAM ENGINEER (INCLUDES DYNAMO)		15
STONE CUTTER/STONE MASON	1	2
SUPERINTENDENT ELECTRIC LIGHT	1	
SUPERVISOR (INCLUDES ASSTS)	12	
TOOLMAN		2
TRANSITMAN		7
TRIMMER		2
<b>TOTALS</b>	<b>42 SUPERVISORS</b>	<b>441 MECHANICS</b>

## BRIDGE INSPECTION EQUIPMENT LIST\*

Inspector Equipment	Inspection Team Equipment	Inspection Van Equipment
Boots-Knee High Boots-Hip Boots Dust Masks (Disposable) Eye Goggles Hard Hat With Liner Rain Hat & Jacket OSHA Approved Respirator & Filters  Work Gloves Long Cuff Work Gloves Unlined Work Gloves Lined Awl Calipers Chipping Hammer Clip Boards Deceleration Lanyards Drafting Equipment Flashlight (2 "D" Cell) Hacksaw Hacksaw Blades (Extra) Safety Vest Paint Scraper Inspection Mirror Belt With Two Drop Forged D-Rings Level 9" (Magnetic) Level 24" Pliers 8" Plumb Bob Pocket Knife Ruler 25' or 30' (Metal) Ruler 100' (Fiberglass) Scraper Blades (Extra) Snips Tool Bags (24") Wire Brush Folding Ruler 8' Class III Body Harness Lanyards Bridge Inspection Manual (New York State) Technical Advisories For Inspection Manual Emergency Procedure Instructions Rope ½" With 100' Coil	5 Boro Map Binoculars Telephone Directory Broom Camera 35mm Digital Camera Spare Batteries For Cameras, Flashlights & Lanterns  Screwdriver Set (Regular) Screwdriver Set (Phillips) Dye Penetrant Kit Flashlight & Lantern Film 35mm D-Meter With Test Block Marking Paint Spray Retract Survey Rod 25' Sledge Hammer (8 lbs.) Thermometer Spray Penetrating Oil Handheld Radios Scour Probing Rod Vernier Calipers Wrenches 12" Tool Pouch Lumber Crayons	Approved Safety Gasoline Can Bolt Cutters Drop Light Dead Weights For Rope Clip Boards Flashlight (3 "D" Cell) Locks With Chains For Extension Ladder  Extension Ladder 24' First Aid Kit Flags Hand Cleaner  Water Cooler Lantern (Light) Step Ladder 8' Traffic Cones Tool Chest Shovel Vehicle Radio
		<b>Put In Trucks By Highway Repairers When Needed</b>
		Generator Hand Compass Oil For Generator

\*New York City Department of Transportation, Division of Bridges. *Bridge Inspections, Research & Development Section Equipment Checklist*. 2001.

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## 2001 INVENTORY LOCATION MAPS

This year we have added a new feature to the Inventory Location Maps; Community Board borders. With this added feature, the reader will be able to identify within which Community Boards bridges are located.

On these maps, all Community Boards consist of three (3) digits. The first digit is for map plotting purposes. The next two digits identify the Community Board. In cases of certain parks and airports, the Community Board number does not correspond with any Community Board. These exceptions are:

<b>Bronx</b>	26=Van Cortlandt Park	<b>Brooklyn</b>	55=Prospect Park
	27=Bronx Park		56=Gateway Nat'l Rec. Area/Floyd Bennett Field
	28=Pelham Bay Park	<b>Queens</b>	81=Alley Pond Park
<b>Manhattan</b>	64= Central Park		82=Cunningham Park
			83=JFK Airport
			84= Gateway Nat'l Rec. Area/Fort Tilden-Jacob Riis Park

The Community Board listings correspond to those listed in the inventory, which begins on page 102.

As this is still a work in progress, some structures that fall on Community Board dividing lines are shown in only one Community Board. As the plotting of the maps is refined and further research conducted, all Community Boards a structure is in will be identified.

# NEW YORK CITY

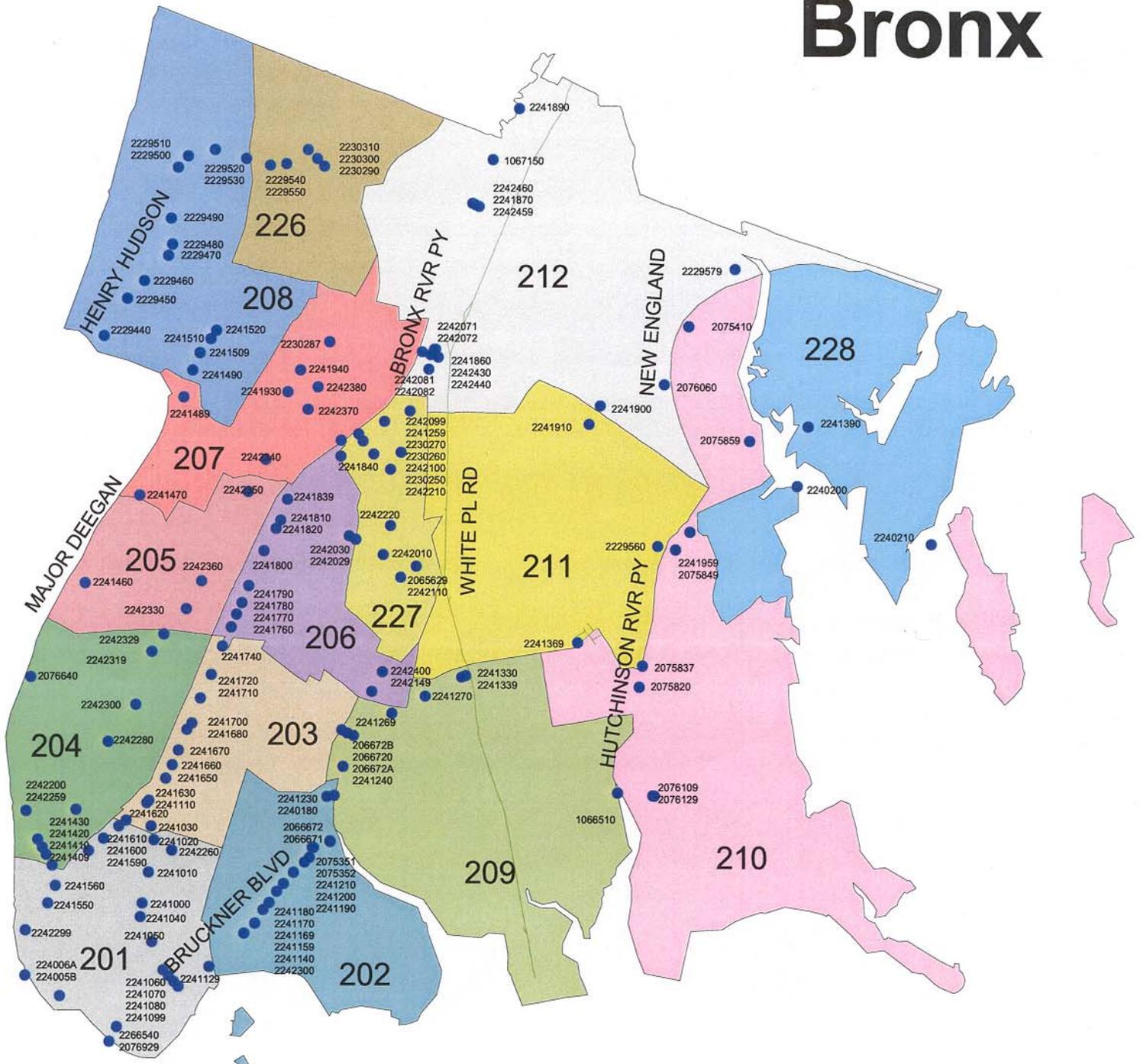


## Legend

- Land Bridge
- Waterway Bridge
- Railroad Bridge



# Bronx



## LEGEND

Community Board

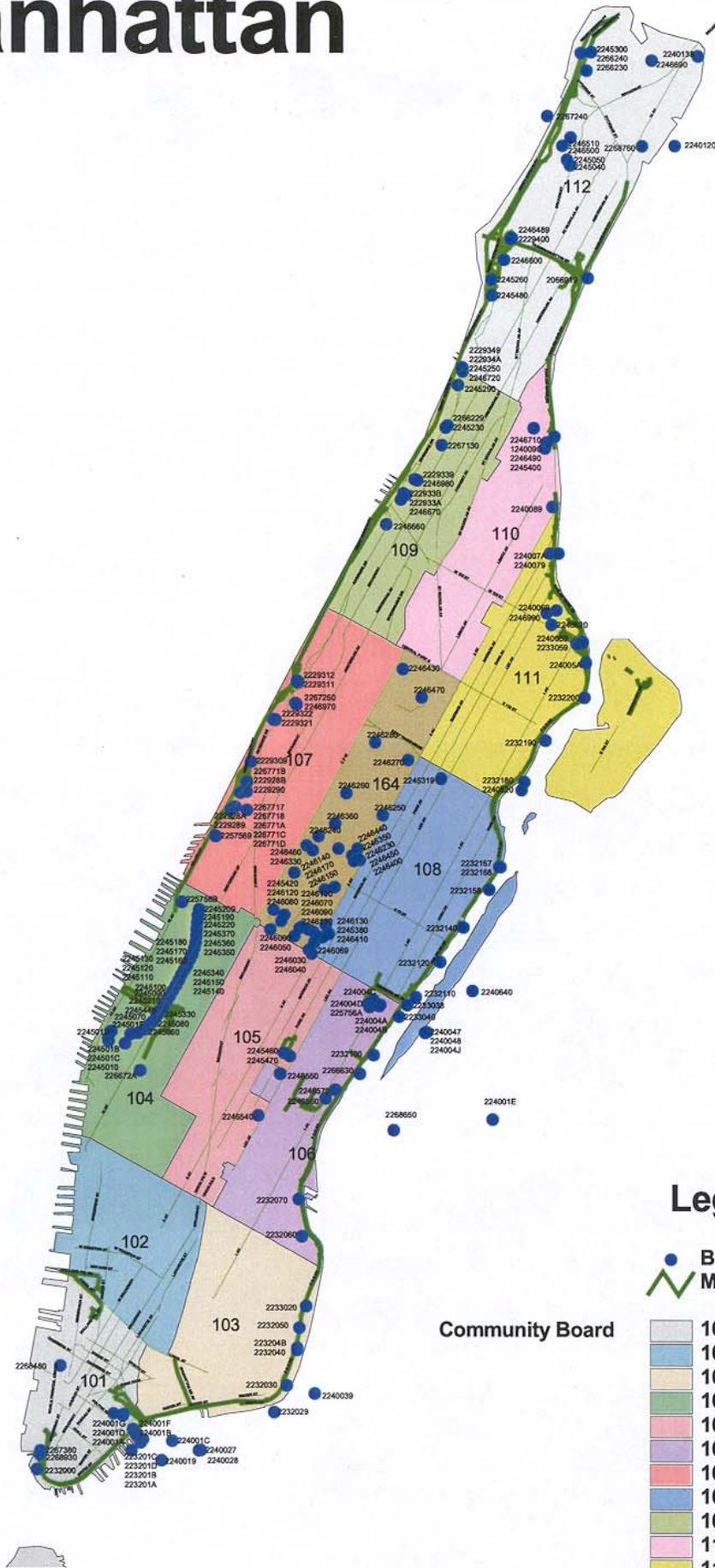
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- 228

- Bridges
- Bronx Local Streets
- Bronx Major Roadway





# Manhattan



## Legend

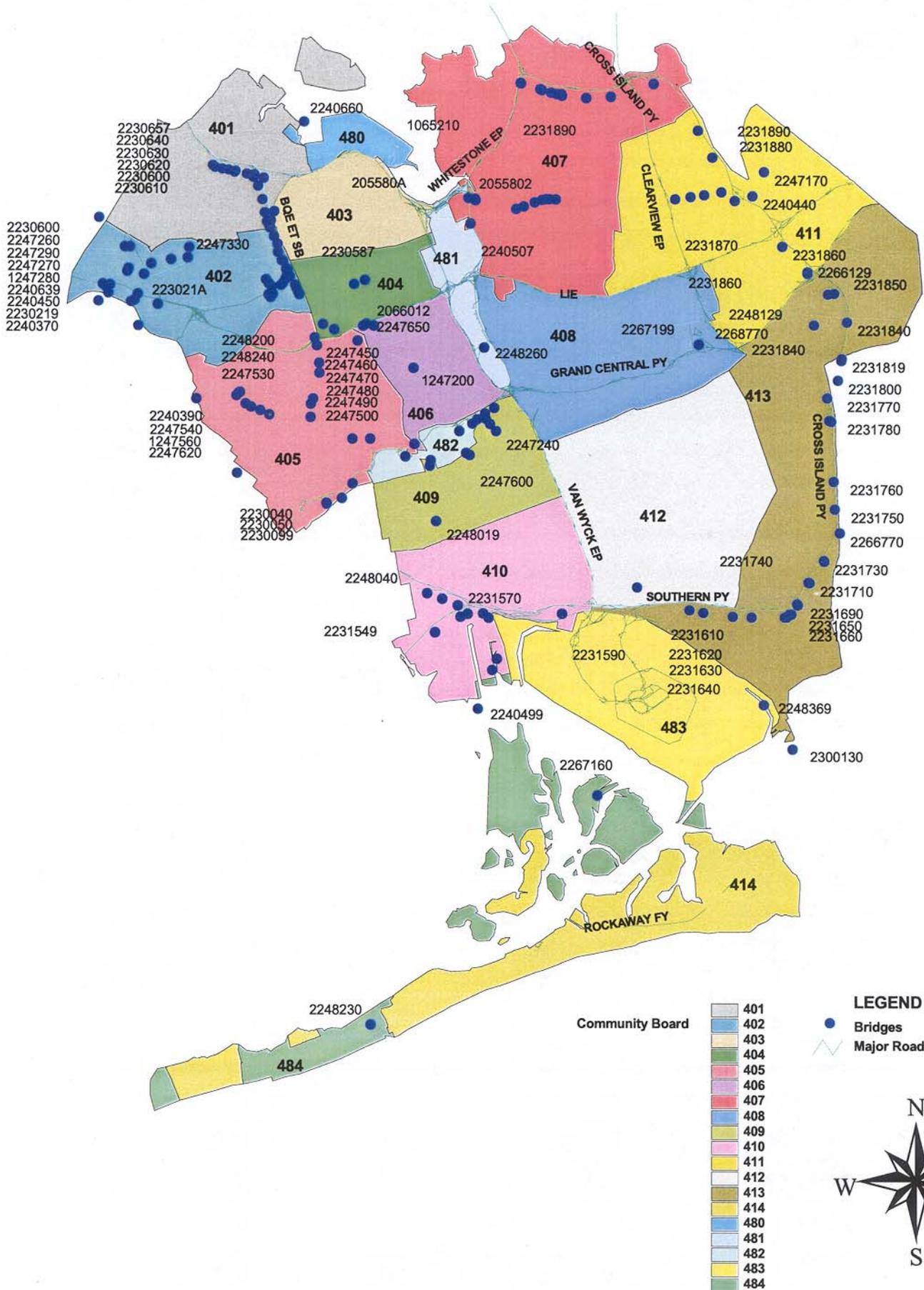
- Bridges
- Major Roads

## Community Board

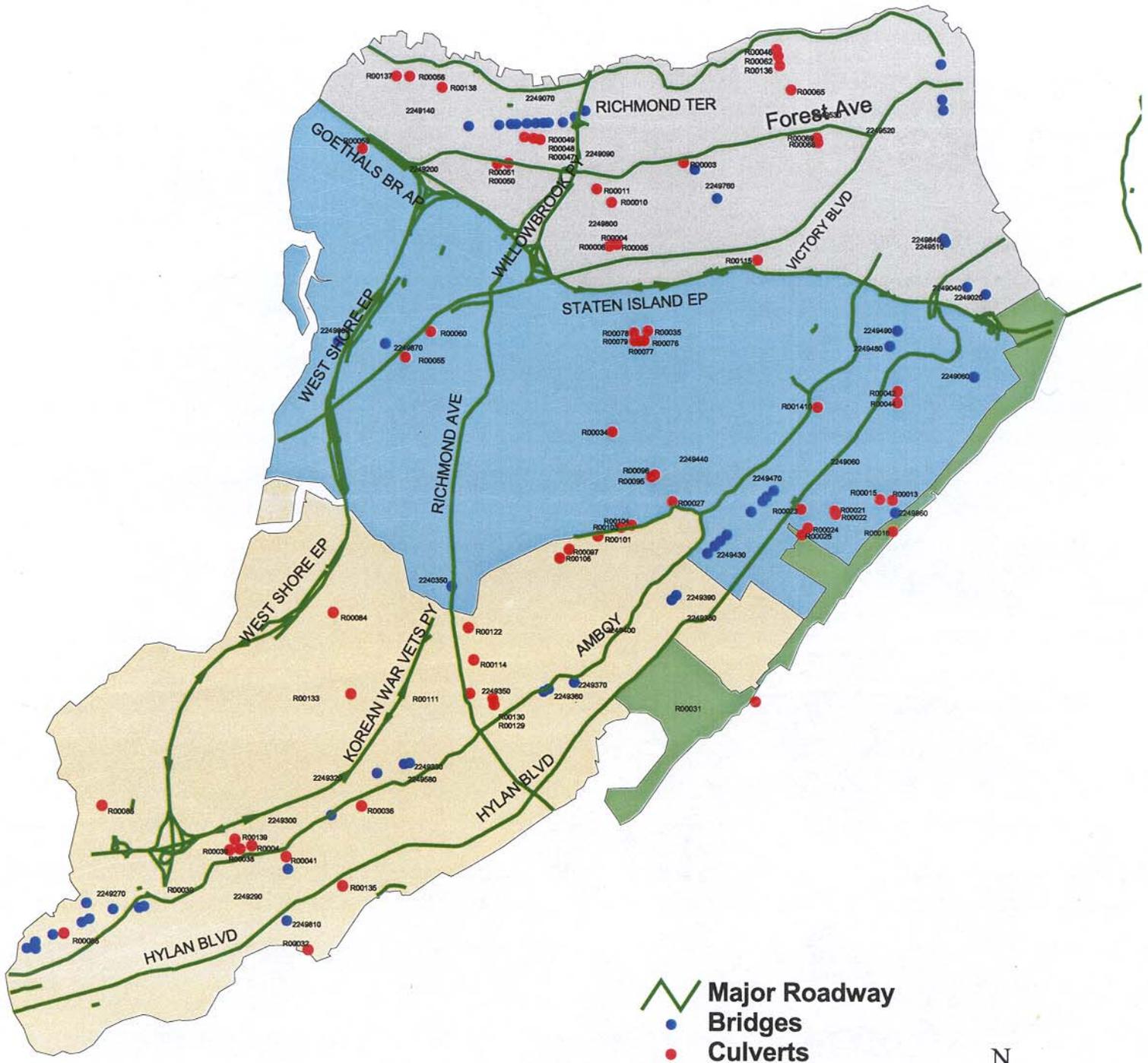
- 101
- 102
- 103
- 104
- 105
- 106
- 107
- 108
- 109
- 110
- 111
- 112
- 164



# Queens



# Staten Island



**Community Board**

501
502
503
595

