

***Generation Interconnection
Feasibility Study Report***

For

***PJM Generation Interconnection Request
Queue Position Y2-063***

Eldred-Frackville #2 230kV

March 2013

Preface

The intent of the feasibility study is to determine a plan, with ballpark cost and construction time estimates, to connect the subject generation to the PJM network at a location specified by the Interconnection Customer. The Interconnection Customer may request the interconnection of generation as a capacity resource or as an energy-only resource. As a requirement for interconnection, the Interconnection Customer may be responsible for the cost of constructing: (1) Direct Connections, which are new facilities and/or facilities upgrades needed to connect the generator to the PJM network, and (2) Network Upgrades, which are facility additions, or upgrades to existing facilities, that are needed to maintain the reliability of the PJM system.

In some instances a generator interconnection may not be responsible for 100% of the identified network upgrade cost because other transmission network uses, e.g. another generation interconnection, may also contribute to the need for the same network reinforcement. The possibility of sharing the reinforcement costs with other projects may be identified in the feasibility study, but the actual allocation will be deferred until the impact study is performed.

The Feasibility Study estimates do not include the feasibility, cost, or time required to obtain property rights and permits for construction of the required facilities. The project developer is responsible for the right of way, real estate, and construction permit issues. For properties currently owned by Transmission Owners, the costs may be included in the study.

General

The Interconnection Customer (IC), has proposed a natural gas generating facility located Schuylkill County, Pennsylvania. The installed facilities will have a total capability of 350 MW with 350 MW of this output being recognized by PJM as capacity. This means that the remaining 350 MW will be curtailable should a system reliability constraint occur. The proposed in-service date for this project is July 4, 2015. **This study does not imply a PPL Electric Utilities (PPL EU) commitment to this in-service date.**

Point of Interconnection

Y2-063 will interconnect with the PPL EU transmission system at one of two options. Option 1 is to connect to the Eldred-Frackville 230kV line. Option 2 is to connect to the Eldred 230kV substation.

This report was prepared under the assumptions that the Y2-015 will be constructed prior to the Y2-063, and that both of these projects will be interconnected to PPL EU's transmission system at the same switchyard facility. If Y2-015 is delayed or withdrawn, this report will be revised.

Cost Summary

The Y2-063 project will be responsible for the following costs:

Description	Total Cost
Attachment Facilities	\$ 0
Direct Connection Network Upgrades	\$ 28,067,033
Non Direct Connection Network Upgrades	\$ 0
Total Costs	\$ 28,067,033

In addition, the Y2-063 project may be responsible for a contribution to the following costs:

Description	Total Cost
New System Upgrades	\$ 130,631,332
Previously Identified Upgrades	\$ 262,043,891
Total Costs	\$ 392,675,223

Cost allocations for these upgrades will be provided in the System Impact Study Report.

Option 1 – Connection to the Eldred-Frackville 230kV line

The Y2-063 project can be connected to a 230 kV switchyard near the Eldred – Frackville 230 kV line. The switchyard, which is assumed to have been previously constructed for the interconnection of IPP Y2-015, will be expanded to its full two bay breaker-and-a-half design. The POI will be the first dead-end structure installed outside the Y2-063 facility.

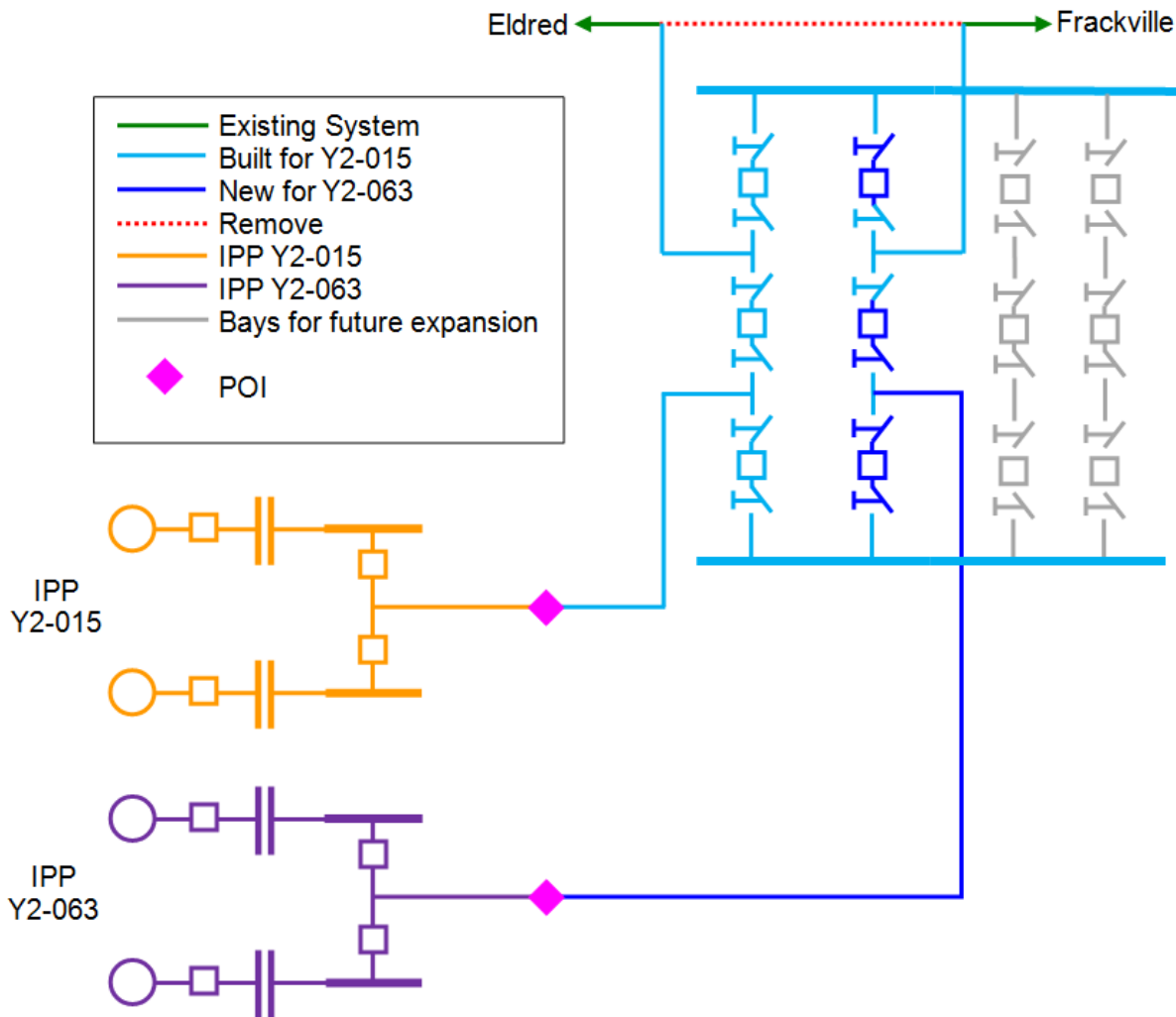


Figure 1: Y2-063 Overhead Connection to Eldred – Frackville 230 kV Yard

Attachment Facilities

No Attachment Facilities are required to support this interconnection.

Direct Connection Cost Estimate

The total magnitude cost of Direct Connection Facilities needed to connect to the proposed 230 kV switchyard is **\$10,491,376** (excluding any applicable state or federal taxes). The connection estimate is based on the assumption that the connection will span approximately 9 miles.

In addition to these costs, Y2-063 will be responsible for a 50% allocation of the Direct-Connection Costs required for Y2-015.

A further breakdown of the direct connection costs for the new 230 kV switchyard connection is as follows:

Description	Total Cost
Transmission work for the direct connection	\$ 8,594,888
Substation work at Eldred – Frackville Switchyard	\$ 1,896,488
50% Allocation for Y2-015 work:	
Transmission work for the direct connection	\$ 13,539,047
Substation work at New Eldred – Frackville Switchyard	\$ 2,675,260
Siting, certification and right of way acquisition	\$ 1,361,350
Total Direct Connection Facilities	\$ 28,067,033

230 kV Transmission Tap Direct Connection Work

\$8,594,888 (230 kV Transmission tap)

The transmission direct connection cost includes construction of one 9 mile 230 kV tap between the developer's site and the 230 kV switchyard. The tap will be double circuit construction, sharing structures with the previously built 230 kV transmission tap from the Y2-015 IPP to the switchyard. It will be designed for initial and future 230 kV operation, and will use a conductor capable of carrying at least 648 MVA (summer normal rating) and will carry an optical ground wire (OPGW) for DTT requirements (See DTT equipment requirements below) The total elapsed time required for the transmission work is expected to be approximately 30 months.

The estimate for the transmission tap includes costs to construct the new tap, as well as the costs of associated work for line terminations.

It is assumed that the PA PUC certification for 230 kV double circuit tap connection will be acquired for IPP Y2-015. Therefore, at this time no new certification will be required for the IPP Y2-063 Transmission Tap work.

230 kV Switchyard Direct Connection Work

\$1,896,488 (230 kV Switchyard)

It is assumed that a 230 kV switchyard was built near the Eldred – Frackville 230 kV line for IPP Y2-015, in a three breaker ring bus arrangement. To interconnect Y2-063, this switchyard will be expanded to its full 2 bay breaker-and-a-half configuration. The required work includes

installation of line terminals, disconnect switches, and three circuit breakers. Control cubicle wiring and device wiring must also be installed for the new equipment at the switchyard. The time required for the substation work is expected to be approximately 30 months and can be done in conjunction with the transmission tap work.

Non-Direct Connection Cost Estimate

No Non-Direct Connection Facilities are required to support this interconnection.

Estimated Schedule

If Option 1 is selected, the total duration of the project will be approximately 30 months.

- Engineering: 14 months
- Construction: 16 months

PPL EU's outage windows for construction are typically available in the spring and the fall of the year. Missing an outage window will cause at least a delay of 6 months.

Option 2 – Connection to the Eldred 230kV substation

The Y2-063 project can be connected to PPL EU's Eldred 230 kV Switchyard via an overhead 230 kV line. This line would be terminated at Eldred in a double breaker-double bus arrangement. The Point of Interconnection (POI) will be the first dead-end structure outside the Y2-063 facility.

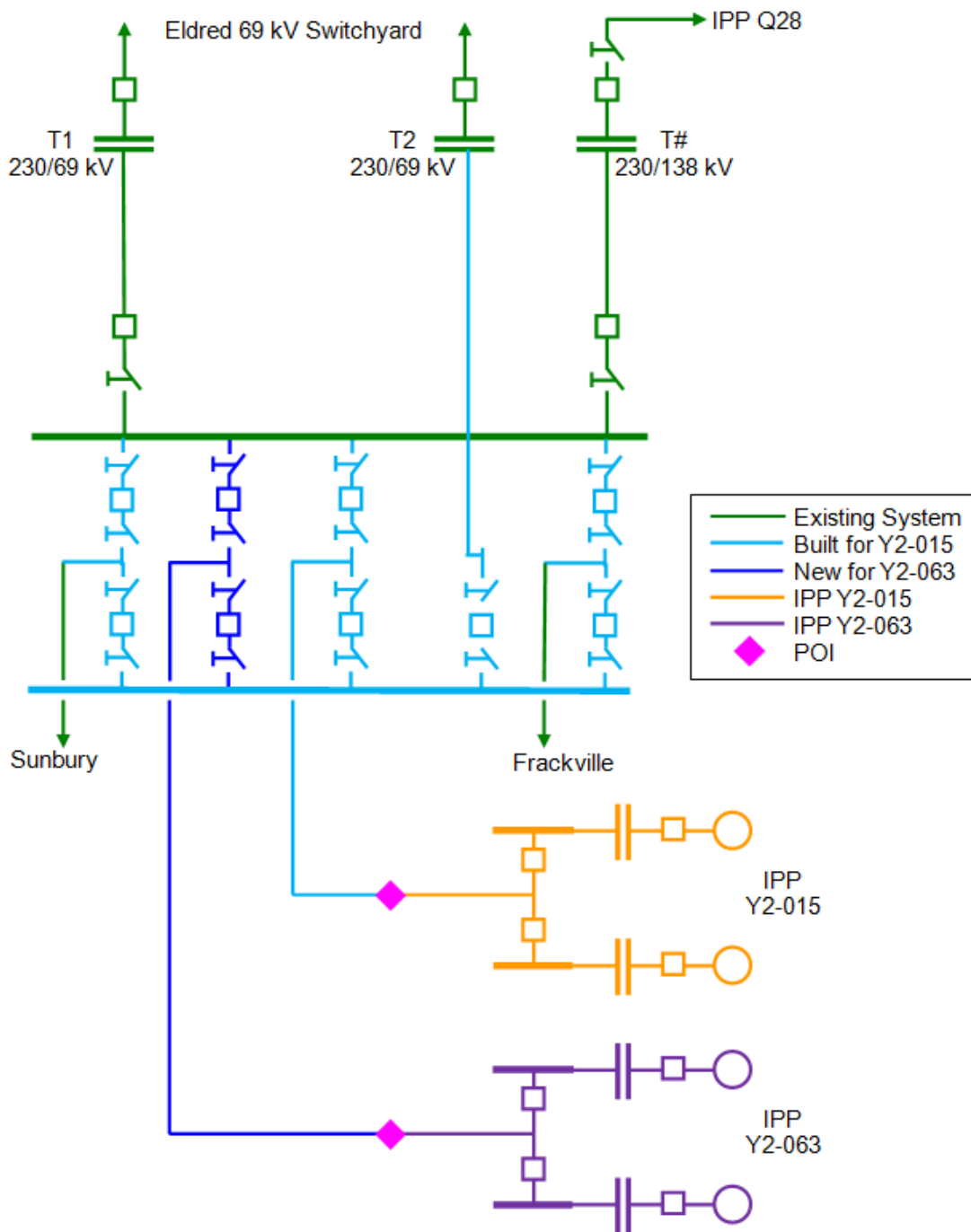


Figure 2: Y2-063 Overhead Connection to Eldred 230kV yard

PJM performs a sensitivity analysis for the secondary Point of Interconnection. Scope and cost estimates are not included.

Interconnection Customer's Scope of Direct Connection Work

Queue Y2-063 Interconnection Customer will be responsible for the construction of all their generating station facilities on the Y2-063 side of the POI (Point of Interconnection).

Intertie and POC Protective Relaying Equipment

The Interconnection Customer will need to install suitable protection and control equipment at its facilities based on PPL EU parallel generation requirements. This includes both Intertie Protective Relaying (IPR) and Point of Contact (POC) relaying. Please refer to the PPL EU web site for the IPR and POC requirements. The website addresses are shown below:

IPR Requirements:

<https://www.pplelectric.com/at-your-service/electric-rates-and-rules/~media/pplelectric/at%20your%20service/docs/customer-owned-generation/parallelgenerationrequirements.pdf>

POC Requirements:

<https://www.pplelectric.com/at-your-service/electric-rates-and-rules/~media/PPLElectric/At%20Your%20Service/Docs/point-of-contact.pdf>

DTT Equipment Requirements

Fiber-based DTT (Direct Transfer Trip) equipment will be used to communicate circuit breaker tripping and status monitoring between the Y2-063 and the PPL EU Frackville-Eldred Substation (Option 1) or Eldred Substation (Option 2). Fiber PRISM nodes exist at both the Frackville and Eldred 230-69 kV Substations. A fiber tap to the IPP Y2-063 customer substation will be required. PPL EU will need a signal from Y2-063 that will indicate that the Y2-063 isolation breaker is open (a breaker 'b' switch).

Synchronizing Breaker Requirement at the Developer's Substation

Per the customer's preliminary sketches, the customer is planning to provide high side circuit breakers at 69 kV with a manually operated 69 kV disconnect switches. Unless otherwise indicated it is assumed that these be will be the "Synchronizing Circuit Breakers" and will be operated by the IPR relay and the DTT signal. It is requested that the customer confirm this.

PA PUC Certification & Environmental Issues

All required land and rights-of-way will be purchased by PPL EU for tap connection. It is assumed here that the transmission tap would be owned by PPL EU.

It is assumed that Y2-015 will be constructed prior to Y2-063 and the PA PUC certification for the 230 kV double circuit tap will be acquired. The Y2-063 will not require new certification for building an additional circuit on the existing towers.

To avoid duplication of costs and efforts, PPL EU recommends that the project Y2-063 obtain all environmental approvals required for construction of their generating station and share pertinent details with PPL EU prior to PPL EU beginning work.

Estimate Assumptions for Interconnection

This estimate has been prepared without extensive research and field review.

- It is assumed that Y2-015 will be constructed prior to Y2-063, and that both IPPs will use the same method of interconnection.
- Estimate is based on the assumption that if PPL EU does not already own sufficient land to modify the existing Eldred 230 kV yard or construct the new Eldred – Frackville 230 kV yard, the developer will provide additional land required with no cost to PPL EU.
- It is assumed here that the transmission tap to the Y2-063 facility will be owned by PPL EU, regardless of which option is selected.
- No environmental, real estate, or permitting issues were reviewed for the estimate of this project.

Notes:

- PPL EU recommends that an Interim ISA/CSA be completed during the Facilities Study stage or earlier to address the critical path items, such as long lead-time purchases and the compressed project schedule.
- Procurement lead-times for metering equipment may extend to 30 weeks. Meter design, procurement and installation schedules must be implemented accordingly.
- Excepting any operational, governmental and/or environmental regulatory delays, the use of additional resources, such as overtime, premiums for expedited material, and/or contractor labor, may enable PPL EU to decrease this construction period for an additional cost. It is also assumed that all rights-of-way, easements, and permits are secured without impact on anticipated construction start dates.
- The ISA/CSA or an Interim Interconnection Service Agreement (IISA) must be signed by the Y2-063 Interconnection Customer, PJM, and PPL EU before any PPL EU design and construction activities may commence.

Revenue Metering and SCADA Requirements:

PJM Requirements

Metering Equipment Installation at the Point of Interconnection

Installation of revenue grade metering equipment will be required at the Y2-063 point of interconnection. PPL EU will design and supply the required metering equipment but all the installation cost would be borne by the developer. All metering equipment must meet applicable PPL EU tariff requirements as well as being compliant with all applicable requirements of the PJM agreements. The equipment must provide bi-directional revenue metering (KWH and KVARH) and real-time data (KW, KVAR, circuit breaker status, and generator bus voltages) for the developer's generating resource.

The metering equipment should be housed in a control cabinet or similar enclosure and must be accessible to PPL EU metering personnel.

The developer is also required to provide revenue metering (KWH and KVARH) and real-time telemetry data (KW, KVAR, and KV) to PJM in compliance with the requirements listed in PJM Manuals M-01 and M-14. Any data from the PPL EU revenue meters can be transferred by fiber optic link to the PJM RTU located at the IPP facility.

PJM SCADA Equipment Requirements

Interconnection Customer is required to provide real-time (instantaneous) values of KW and KVAR data to PJM via the SCADA equipment in compliance with the requirements listed in PJM Manuals M-01 and M-14D available at <http://www.pjm.com>

PPL EU Requirements

SCADA Equipment Requirements

PPL EU will require installation of PPL EU approved SCADA equipment that will connect to its existing SCADA system to provide real time values of KW, KVAR, and kV metering data at the POC. SCADA equipment will also provide capability to trip and the status monitoring of the POC circuit breaker. In addition to that, monitoring of other abnormal conditions at developer's plant will be provided where deemed necessary. This connection will be a 4-wire dedicated FDDA-type phone line. PPL EU will provide detailed specifications and design drawings for this equipment.

Intertie Requirements from the Developer of IPP Y2-063

Y2-063 Generator and GSU Modeling

Per the Y2-063 supplied data the following was used in modeling the generators and the GSUs:

Y2-063 Generators: Two units, MVA base 150, net injected into PPL EU system 350 MW, pf at the Generator 230 kV bus 0.9 lead and 0.9 lag, saturated sub-transient reactance = 9.938% on 150 MVA base.

GSUs (Generator Step Up Transformers): Two transformers, rating 125 MVA each, 230/13.8 kV, Positive Sequence Impedance $R = 0.00147$ pu and $X = 0.089$ pu, all at 75 MVA base.

Y2-063 Generator Regulation or Reactive Support Requirements

The PPL EU preliminary load flow studies have indicated that the Y2-063 generator will maintain the required voltage regulation on the Eldred 230 kV bus within its required range. A voltage schedule will be developed after the Facilities Study stage.

As specified in Part IV, Subpart E at 54.7 of the PJM OATT, the Project Y2-063 generator shall design its "Facility" to maintain a composite power factor delivery at continuous rated power output at the generators terminals at a power factor of at least 0.95 leading (absorbing vars) to 0.90 lagging (supplying vars).

Y2-063 Generator Harmonic and Flicker Requirements

On the PPL EU 230 kV system, the total harmonic distortion to the fundamental voltage wave from a single customer is limited to 1.0% of nominal. In addition, no individual harmonic component can exceed 0.7% of the fundamental system voltage.

If PPL EU discovers that objectionable harmonics in excess of the stated limits are being injected into the system from Y2-063's equipment, the Queue Y2-063 Interconnection Customer will be responsible for taking corrective measures to mitigate harmonic currents.

Concerning voltage flicker, the Y2-063 Project must limit the severity of their voltage variation to within a level which will not cause objectionable flickers to other customers. A voltage drop greater than 5% at the point of interconnection is generally not acceptable. The frequency and severity of the voltage variation will be considered when determining whether a customer's equipment is violating PPL EU flicker guidelines. PPL EU uses the General Electric flicker-irritation curves as a guideline to determine if the system is operating within acceptable limits. PPL EU will require corrective actions by the Y2-063 customer if their operation causes flickers that exceed PPL EU guidelines. One such correction could be the installation of static var compensators (SVC) to hold a constant voltage.

Other Direct Connection Issues Impacting the Interconnection Customer

Distribution Service Requirements

The Interconnection Customer must submit a request for electric service through PPL EU's Industrial and Commercial Services (ICS) group if the Y2-063 interconnection customer requires back-up electric service at a voltage less than 69 kV. The ICS Help Desk can be reached at 1-888-220-9991. Cost for distribution electric service is NOT included in the PPL scope of work transmission or substation estimates.

Network Impacts

Option 1

The Queue Project #Y2-063 was studied as a 350.0MW (Capacity 350.0MW) injection as a tap of the Eldred-Frackville 230 kV line in the PPL area. Project #Y2-063 was evaluated for compliance with reliability criteria for summer peak conditions in 2016. Potential network impacts were as follows:

Contingency Descriptions

The following contingencies resulted in overloads:

Contingency Name	Description
01YUKON _01SOBEND _083	CONTINGENCY '01YUKON _01SOBEND _083' DISCONNECT BRANCH FROM BUS 235116 TO BUS 235118 CKT 1 /* 500/500KV, AREA 201/201. END
AP_C5_19	CONTINGENCY 'AP_C5_19' /BRIGHTON LOOP OPEN BRANCH FROM BUS 200003 TO BUS 235105 CKT 1 OPEN BRANCH FROM BUS 200003 TO BUS 200004 CKT 1 END
C1_PN230-BS-#5A	CONTINGENCY 'C1_PN230-BS-#5A' /* EAST TOWANDA #1 230 KV BUS FAULT DISCONNECT BRANCH FROM BUS 200701 TO BUS 200675 CKT 1 DISCONNECT BRANCH FROM BUS 200675 TO BUS 130763 CKT 1 DISCONNECT BRANCH FROM BUS 200674 TO BUS 200675 CKT 3 END
C2_PN115-SB-46A	CONTINGENCY 'C2_PN115-SB-46A' /* NORTH MESHOPPEN 115 KV STUCK CB - (N MESHOPPEN - BUS TIE CB) DISCONNECT BRANCH FROM BUS 200677 TO BUS 200699 CKT 1 DISCONNECT BRANCH FROM BUS 200677 TO BUS 200678 CKT 1 REDUCE BUS 200677 SHUNT BY 100 PERCENT DISCONNECT BRANCH FROM BUS 200677 TO BUS 200684 CKT 1 DISCONNECT BRANCH FROM BUS 200825 TO BUS 200706 CKT 3 DISCONNECT BRANCH FROM BUS 200677 TO BUS 200825 CKT 3 DISCONNECT BUS 200825 DISCONNECT BRANCH FROM BUS 200677 TO BUS 200698 CKT 2 DISCONNECT BRANCH FROM BUS 200677 TO BUS 200674 CKT 1 DISCONNECT BRANCH FROM BUS 200677 TO BUS 200687 CKT 2 DISCONNECT BRANCH FROM BUS 200677 TO BUS 200706 CKT 4 END
C2_PN230-SB-#3F	CONTINGENCY 'C2_PN230-SB-#3F' /* EAST TOWANDA 230 KV STUCK CB - (#3 XF) DISCONNECT BRANCH FROM BUS 200675 TO BUS 130763 CKT 1 DISCONNECT BRANCH FROM BUS 200701 TO BUS 200675 CKT 1 DISCONNECT BRANCH FROM BUS 200674 TO BUS 200675 CKT 3 END

Contingency Name	Description
MNS_115_4	CONTINGENCY 'MNS_115_4' / MNS - HOME CITY DISCONNECT BRANCH FROM BUS 200769 TO BUS 200930 CKT 1 END
PJM17	CONTINGENCY 'PJM17' DISCONNECT BRANCH FROM BUS 200004 TO BUS 200013 CKT 1 /* CNASTONE PEACHBTM 500 500 END
PJM69	CONTINGENCY 'PJM69' DISCONNECT BRANCH FROM BUS 200021 TO BUS 200009 CKT 1 /* SUNBURY JUNIATA 500 500 DISCONNECT BRANCH FROM BUS 200021 TO BUS 200022 CKT 2 /* SUNBURY SUSQHANA 500 500 / CKT 1 -> 2 DISCONNECT BRANCH FROM BUS 200021 TO BUS 208109 CKT 24 /* SUNBURY SUNBURY 500 230 END
PJM81	CONTINGENCY 'PJM81' /* JUNIATA BREAKER SUN N DISCONNECT BRANCH FROM BUS 200021 TO BUS 200009 CKT 1 /* SUNBURY JUNIATA 500500 DISCONNECT BRANCH FROM BUS 200021 TO BUS 200022 CKT 2 /* SUNBURY SUSQHANA 500500 DISCONNECT BRANCH FROM BUS 200021 TO BUS 208109 CKT 24 /* SUNBURY SUNBURY 500230 DISCONNECT BRANCH FROM BUS 200009 TO BUS 208005 CKT 2 /* JUNIATA JUNIATA 500230 END
PJM82	CONTINGENCY 'PJM82' /* JUNIATA BREAKER SUN S DISCONNECT BRANCH FROM BUS 200021 TO BUS 200009 CKT 1 /* SUNBURY JUNIATA 500500 DISCONNECT BRANCH FROM BUS 200021 TO BUS 200022 CKT 2 /* SUNBURY SUSQHANA 500500 DISCONNECT BRANCH FROM BUS 200021 TO BUS 208109 CKT 24 /* SUNBURY SUNBURY 500230 DISCONNECT BRANCH FROM BUS 200009 TO BUS 208004 CKT 1 /* JUNIATA JUNIATA 500230 END
PL100026	CONTINGENCY 'PL100026' /* SIEGFRIED 230KV EAST CB TO EAST PALMERTON DISCONNECT BRANCH FROM BUS 207959 TO BUS 208077 CKT 1 DISCONNECT BRANCH FROM BUS 207959 TO BUS 210601 CKT 1 DISCONNECT BRANCH FROM BUS 208074 TO BUS 207980 CKT 1 DISCONNECT BRANCH FROM BUS 208074 TO BUS 208076 CKT 1 DISCONNECT BRANCH FROM BUS 208074 TO BUS 211161 CKT 4 DISCONNECT BRANCH FROM BUS 208075 TO BUS 208074 CKT 1 DISCONNECT BRANCH FROM BUS 208077 TO BUS 208074 CKT 1 DISCONNECT BRANCH FROM BUS 208077 TO BUS 211160 CKT 3 END

Contingency Name	Description
PL100027	CONTINGENCY 'PL100027' /* SIEGFRIED 230KV EAST CB TO MARTINS CREEK #2 DISCONNECT BRANCH FROM BUS 208074 TO BUS 207980 CKT 1 DISCONNECT BRANCH FROM BUS 208074 TO BUS 208075 CKT 1 DISCONNECT BRANCH FROM BUS 208074 TO BUS 211161 CKT 4 DISCONNECT BUS 208076 END
PL100029	CONTINGENCY 'PL100029' /*SIEGFRIED 230KV EAST CB TO FRACKVILLE DISCONNECT BRANCH FROM BUS 208074 TO BUS 207973 CKT 1 /* SIEG-FRAC 230KV DISCONNECT BRANCH FROM BUS 208074 TO BUS 207980 CKT 1 /* SIEG-HARW 230KV DISCONNECT BRANCH FROM BUS 208074 TO BUS 208075 CKT 1 /* SIEG BUS TIE CB DISCONNECT BRANCH FROM BUS 208074 TO BUS 211161 CKT 4 /* SIEG T4 DISCONNECT BRANCH FROM BUS 208076 TO BUS 208074 CKT 1 /* MACR-SIEG #2 CB END
PL100031	CONTINGENCY 'PL100031' /* SIEGFRIED 230KV EAST CB TO HARWOOD DISCONNECT BRANCH FROM BUS 208074 TO BUS 208075 CKT 1 /* SIEG BUS TIE CB DISCONNECT BRANCH FROM BUS 208074 TO BUS 211161 CKT 4 /* SIEG T4 DISCONNECT BRANCH FROM BUS 208076 TO BUS 208074 CKT 1 /* MACR-SIEG #2 CB DISCONNECT BUS 207980 /* SIEG-HARW 230KV END
PL100032	CONTINGENCY 'PL100032' /* SIEGFRIED 230KV EAST-WEST TIE CB DISCONNECT BRANCH FROM BUS 207980 TO BUS 208074 CKT 1 DISCONNECT BRANCH FROM BUS 208074 TO BUS 207973 CKT 1 DISCONNECT BRANCH FROM BUS 208074 TO BUS 211161 CKT 4 DISCONNECT BRANCH FROM BUS 208074 TO BUS 211161 CKT 5 DISCONNECT BRANCH FROM BUS 208075 TO BUS 208074 CKT 1 DISCONNECT BRANCH FROM BUS 208076 TO BUS 208074 CKT 1 DISCONNECT BRANCH FROM BUS 208077 TO BUS 208074 CKT 1 END
PL100373_A	CONTINGENCY 'PL100373_A' /* FRAC-ELDR 230KV LINE OUT & FRAC T3 & ELDR T2 OUT DISCONNECT BRANCH FROM BUS 207975 TO BUS 903270 CKT 1 /* FRAC TR3-W3-022 TAP 230KV DISCONNECT BRANCH FROM BUS 207975 TO BUS 207973 CKT 1 /* FRAC T3 CB DISCONNECT BRANCH FROM BUS 212162 TO BUS 207975 CKT 3 /* FRAC T3 END

Contingency Name	Description
PL100374	CONTINGENCY 'PL100374' /* SUNBURY-ELDRED 230KV LINE OUT & ELDRED T1 & SUNBURY T23 OUT DISCONNECT BRANCH FROM BUS 212120 TO BUS 207964 CKT 1 /* ELDR T1 DISCONNECT BUS 208111 /* SUNB-ELDR 230KV & SUNB T23 END
PL100444	CONTINGENCY 'PL100444' /* MONTOUR-SUSQUEHANNA 230KV DISCONNECT BRANCH FROM BUS 208040 TO BUS 208113 CKT 1 END
PL100484	CONTINGENCY 'PL100484' /* D/C MONTOUR-SUSQ 230KV & MONTOUR-SUSQ T10 230KV DISCONNECT BRANCH FROM BUS 208040 TO BUS 208113 CKT 1 DISCONNECT BRANCH FROM BUS 208040 TO BUS 208120 CKT 1 END
PL100925	CONTINGENCY 'PL100925' /*SUSQUEHANNA 230KV TIE CB TO SUSQ T20 DISCONNECT BRANCH FROM BUS 208113 TO BUS 234250 CKT 1 DISCONNECT BUS 208115 DISCONNECT BUS 208116 DISCONNECT BUS 208117 END
PL100995	CONTINGENCY 'PL100995' /* SUNB 230 4N BF-ELDRED 230KV NORTH DISCONNECT BRANCH FROM BUS 208034 TO BUS 208109 CKT 1 /* SUNB 230 - MONT 230 DISCONNECT BUS 207964 /* ELDRED 230 DISCONNECT BUS 208111 /* SUNB 230 - SUNB2 69.0 END
PL101207	CONTINGENCY 'PL101207' /* SUNB 500 3T BF-SUSQUHANNA LINE DISCONNECT BRANCH FROM BUS 200021 TO BUS 200022 CKT 2 /* SUNB SUSQ 500500 DISCONNECT BRANCH FROM BUS 200021 TO BUS 200009 CKT 1 /* SUNB JUNI 500500 END
PP1E_NO EMORYGROVE	CONTINGENCY 'PP1E_NO EMORYGROVE' / NO PATH OPEN BRANCH FROM BUS 200003 TO BUS 200004 CKT 1 / 200003 BRIGHTON 500 200004 CNASTONE 500 1 END

Contingency Name	Description
UGI - MOUNTAIN - SUSQHNA TOWER	CONTINGENCY 'UGI - MOUNTAIN - SUSQHNA TOWER' OPEN BRANCH FROM BUS 208113 TO BUS 234250 CKT 1 / 208113 SUSQ 230 234250 MOUN-TAP 230 1 OPEN BRANCH FROM BUS 208120 TO BUS 234251 CKT 1 / 208120 SU10 230 234251 MOUNT-H1 230 1 OPEN BRANCH FROM BUS 234251 TO BUS 234252 CKT 1 / 234251 MOUNT-H1 230 234252 MOUNTAIN 230 1 OPEN BRANCH FROM BUS 234251 TO BUS 234254 CKT 1 / 234251 MOUNT-H1 230 234254 MNTN TR1 69.0 1 OPEN BRANCH FROM BUS 234257 TO BUS 234254 CKT 1 / 234257 MOUNT 2 69.0 234254 MNTN TR1 69.0 1 OPEN BRANCH FROM BUS 234256 TO BUS 234254 CKT 1 / 234256 MOUNT 1 69.0 234254 MNTN TR1 69.0 1 END
UGI - MOUNTAIN - SUSQHNA TOWER_SPS	CONTINGENCY 'UGI - MOUNTAIN - SUSQHNA TOWER_SPS' /* WITH SPS 8227 TRIP SCHEME OPEN BRANCH FROM BUS 208113 TO BUS 234250 CKT 1 / 208113 SUSQ 230 234250 MOUN-TAP 230 1 OPEN BRANCH FROM BUS 208120 TO BUS 234251 CKT 1 / 208120 SU10 230 234251 MOUNT-H1 230 1 OPEN BRANCH FROM BUS 234251 TO BUS 234252 CKT 1 / 234251 MOUNT-H1 230 234252 MOUNTAIN 230 1 OPEN BRANCH FROM BUS 234251 TO BUS 234254 CKT 1 / 234251 MOUNT-H1 230 234254 MNTN TR1 69.0 1 OPEN BRANCH FROM BUS 234257 TO BUS 234254 CKT 1 / 234257 MOUNT 2 69.0 234254 MNTN TR1 69.0 1 OPEN BRANCH FROM BUS 234256 TO BUS 234254 CKT 1 / 234256 MOUNT 1 69.0 234254 MNTN TR1 69.0 1 DISCONNECT BUS 207999 /* BUS 208000 REPLACED WITH BUS 207999 MAR 3, 2010 DISCONNECT BRANCH FROM BUS 208095 TO BUS 207999 CKT 2 DISCONNECT BRANCH FROM BUS 207999 TO BUS 208001 CKT 1 END

Generator Deliverability

(Single or N-1 contingencies for the Capacity portion only of the interconnection)

#	Contingency		Affected Area	Facility Description	Bus		Circuit	Power Flow	Loading %		Rating		MW Contribution	Ref
	Type	Name			From	To			Initial	Final	Type	MVA		
1	N-1	PL100444	PPL	MONT-SU10 230 kV line	208040	208120	1	DC	93.58	101.36	ER	739	57.49	2
2	Non	Non	PPL	SUNBURY 500/230 kV transformer	208109	200021	24	DC	91.08	106.73	NR	858	134.27	4
3	Non	Non	PPL	FRAC-SIEG 230 kV line	207973	208074	1	DC	94.14	114.05	NR	513	102.16	14
4	Non	Non	PPL	W3-022 TAP-FRAC TR3 230 kV line	903270	207975	1	DC	77.19	138.76	NR	341	209.94	21
5	N-1	PL100374	PPL	FRAC TR3-FRAC 230 kV line	207975	207973	1	DC	80.95	147.12	ER	526	348.07	23
6	N-1	PL100373_A	PPL	W3-022 TAP-ELDR TR2 230 kV line	903270	207965	1	DC	80.94	157.60	ER	457	350.00	27
7	N-1	PL100373_A	PPL	SUNBTR23-SUNB 230 kV line	208111	208109	1	DC	82.77	158.29	ER	455	343.65	28
8	N-1	PL100374	PPL	W3-022 TAP-FRAC TR3 230 kV line	903270	207975	1	DC	85.41	162.03	ER	457	349.77	30
9	N-1	PL100373_A	PPL	ELDR TR1-SUNBTR23 230 kV line	207964	208111	1	DC	85.41	162.03	ER	457	349.77	31
10	N-1	PL100373_A	PPL	ELDR TR2-ELDR TR1 230 kV line	207965	207964	1	DC	86.94	163.65	ER	455	349.00	33

Note: Please see Attachment 1 for projects providing impacts to flowgate violations. The values in the Reference column correspond to the proper table in the Attachment.

Light Load Analysis

Light Load Studies to be conducted during later study phases (applicable to wind, coal, nuclear, and pumped storage projects).

None.

Multiple Facility Contingency

(Double Circuit Tower Line contingencies were studied for the full energy output. The contingencies of Line with Failed Breaker and Bus Fault will be performed for the Impact Study.)

#	Contingency		Affected Area	Facility Description	Bus		Circuit	Power Flow	Loading %		Rating		MW Contribution	Ref
	Type	Name			From	To			Initial	Final	Type	MVA		
11	LFFB	PL100027	PPL	SIEG 230/138 kV transformer	208074	211161	5	DC	96.87	107.24	ER	529	54.85	7
12	LFFB	PL101207	PPL	SUNB-SUNBTR22 230 kV line	208109	208110	1	DC	97.95	108.04	ER	617	62.25	9
13	LFFB	PL100031	PPL	SIEG 230/138 kV transformer	208074	211161	5	DC	97.77	108.05	ER	529	54.38	10
14	LFFB	PL100026	PPL	SIEG 230/138 kV transformer	208074	211161	5	DC	94.61	108.71	ER	529	74.62	11

Note: Please see Attachment 1 for projects providing impacts to flowgate violations. The values in the Reference column correspond to the proper table in the Attachment.

Short Circuit

(Summary of impacted circuit breakers)

None.

Contribution to Previously Identified Overloads

(This project contributes to the following contingency overloads, i.e. "Network Impacts", identified for earlier generation or transmission interconnection projects in the PJM Queue)

#	Contingency		Affected Area	Facility Description	Bus		Circuit	Power Flow	Loading %		Rating		MW Contribution	Ref
	Type	Name			From	To			Initial	Final	Type	MVA		
15	DCTL	PL100484	PPL	MONT-MILT 230 kV line	208040	208034	1	DC	100.09	100.99	ER	739	41.31	1
16	LFFB	PL100032	PPL	SIEG TR3 230/69 kV transformer	208077	211160	3	DC	100.18	101.18	ER	132	8.22	3
17	DCTL	PL100484	PPL	ELIM-ELIM LY2 230 kV line	207968	207970	1	DC	106.16	106.94	ER	531	25.45	5
18	LFFB	C2_PN115-SB-46A	PENELEC	N.MESHPN-CNYO&G 230 kV line	200706	200924	1F	DC	106.51	107.09	ER	617	22.24	6

#	Contingency		Affected Area	Facility Description	Bus			Power Flow	Loading %		Rating		MW Contribution	Ref
	Type	Name			From	To	Circuit		Initial	Final	Type	MVA		
19	N-1	01YUKON_01SOBEND_083	APS	KEYSTONE-CABOT 500 kV line	200011	235104	1	DC	107.78	107.87	ER	2,598	72.94	8
20	DCTL	UGI - MOUNTAIN - SUSQHNA TOWER	PPL	SUSQ-JENK TR2 230 kV line	208113	208001	1	DC	113.73	114.33	ER	624	22.93	12
21	LFFB	PL100925	PPL	SUSQ-JENK TR2 230 kV line	208113	208001	1	DC	114.04	114.79	ER	624	28.85	13
22	DCTL	UGI - MOUNTAIN - SUSQHNA TOWER_SPS	PPL/UGI	BERW-KOONS AB 69 kV line	212060	234263	1	DC	113.92	115.82	ER	51	6.02	15
23	LFFB	C2_PN115-SB-46A	PENELEC	CNYO&G-E.TWANDA 230 kV line	200924	200675	1F	DC	116.67	117.32	ER	549	22.24	16
24	LFFB	PL100029	PPL	SUNBURY 500/230 kV transformer	208109	200021	24	DC	103.18	118.73	ER	1,165	181.17	17
25	LFFB	PL100032	PPL	SUNBURY 500/230 kV transformer	208109	200021	24	DC	107.77	123.54	ER	1,165	183.78	18
26	N-1	MNS_115_4	PENELEC	OXBOW-N.MESHPN 230 kV line	200708	200706	1	DC	124.90	128.76	ER	608	23.49	19
27	N-1	PJM69	PENELEC/ PPL	LACK-OXBOW 230 kV line	208009	200708	1	DC	130.91	131.82	ER	617	34.49	20
28	N-1	PJM69	PPL	FRAC-SIEG 230 kV line	207973	208074	1	DC	121.72	142.74	ER	629	132.10	22
29	LFFB	PJM82	PENELEC/ PPL	LACK-OXBOW 230 kV line	208009	200708	1	DC	149.00	149.40	ER	617	34.51	24
30	LFFB	PJM81	PENELEC/ PPL	LACK-OXBOW 230 kV line	208009	200708	1	DC	149.01	149.41	ER	617	34.51	25
31	N-1	PJM17	PPL/BGE	SAHA34TP-GRACETON 230 kV line	208071	220964	1	DC	151.68	151.74	ER	485	18.83	26
32	Non	Non	PENELEC	OXBOW-N.MESHPN 230 kV line	200708	200706	1	DC	155.94	160.18	NR	478	24.29	29
33	Non	Non	PENELEC/ PPL	LACK-OXBOW 230 kV line	208009	200708	1	DC	158.52	162.78	NR	488	24.71	32
34	DCTL	AP_C5_19	METED	LINCOLN-STRABAN 115 kV line	204544	204538	1	DC	171.32	172.15	ER	153	7.83	34

#	Contingency		Affected Area	Facility Description	Bus		Circuit	Power Flow	Loading %		Rating		MW Contribution	Ref
	Type	Name			From	To			Initial	Final	Type	MVA		
35	N-1	PP1E_NO EMORYGROVE	METED	STRABAN-GERMANTN 115 kV line	204538	204529	1	DC	180.78	182.26	ER	139	7.63	35
36	BUS	C1_PN230-BS-#5A	PENELEC/NYISO	E.SAYRE-N.WAV115 115 kV line	200676	130836	1	DC	185.38	186.25	ER	128	6.85	36
37	LFFB	C2_PN230-SB-#3F	PENELEC/NYISO	E.SAYRE-N.WAV115 115 kV line	200676	130836	1	DC	185.38	186.25	ER	128	6.85	37
38	LFFB	PL100995	PPL	FRAC TR3-FRAC 230 kV line	207975	207973	1	DC	135.89	202.06	ER	526	348.08	38
39	N-1	PP1E_NO EMORYGROVE	METED	GERMANTN 138/115 kV transformer	204529	204530	1	DC	227.62	229.59	ER	104	7.63	39

Note: Please see Attachment 1 for projects providing impacts to flowgate violations. The values in the Reference column correspond to the proper table in the Attachment.

Steady-State Voltage Requirements

(Summary of the VAR requirements based upon the results of the steady-state voltage studies)

Will be confirmed in the System Impact Study phase.

Stability and Reactive Power Requirement for Low Voltage Ride Through

(Summary of the VAR requirements based upon the results of the dynamic studies)

Will be confirmed in the System Impact Study phase.

New System Reinforcements

(Upgrades required to mitigate reliability criteria violations, i.e. Network Impacts, initially caused by the addition of this project generation)

Violation #	Overloaded Facility	Upgrade Description	Network Upgrade Number	Upgrade Cost
1	MONT-SU10 230 kV line	PPL EU proposes to replace the existing wave traps to increase the rating of the line. This work will take 2 years to complete.	Pending	\$ 20,000
2	SUNBURY 500/230 kV transformer	PPL EU proposes to install a new 500/230kV transformer at the Sunbury substation. This work will take 4 years to complete.	Pending	\$ 25,000,000
3	FRAC-SIEG 230 kV line	This overload will be mitigated by the upgrade identified in #28 below.	N/A	\$ 0
4	W3-022 TAP-FRAC TR3 230 kV line	PPL EU proposes to rebuild the 6 mile line with 1590 ACSR to increase the rating of the line. This work will take 5 years to complete.	Pending	\$ 16,140,216
5	FRAC TR3-FRAC 230 kV line	This overload will be mitigated by the upgrade identified in #38 below.	N/A	\$ 0
6	W3-022 TAP-ELDR TR2 230 kV line	PPL EU proposes to rebuild the 6 mile line with 1590 ACSR to increase the rating of the line. This work will take 5 years to complete.	Pending	\$ 16,140,216
7	SUNBTR23-SUNB 230 kV line	PPL EU proposes to replace the existing switch to increase the rating of the line. This work will take 2 years to complete.	Pending	\$ 60,000
8	W3-022 TAP-FRAC TR3 230 kV line	This overload will be mitigated by the upgrade identified in #4 above.	N/A	\$ 0
9	ELDR TR1-SUNBTR23 230 kV line	PPL EU proposes to rebuild the 25 mile line with 1590 ACSR to increase the rating of the line. This work will take 5 years to complete.	Pending	\$ 67,250,900
10	ELDR TR2-ELDR TR1 230 kV line	PPL EU proposes to update the bus and bay conductors with double 1590 conductors and associated equipment (circuit breakers, switches, etc). This work will take 3 years to complete.	Pending	\$ 5,000,000
11	SIEG 230/138 kV transformer	PPL EU proposes to install MODs on either side of the East CB to Martins Creek to isolate the circuit breaker. This work will take 3 years to complete.	Pending	\$ 300,000
12	SUNB-SUNBTR22 230 kV line	PPL EU proposes to replace two existing switches to increase the rating of the line. This work will take 2 years to complete.	Pending	\$ 120,000
13	SIEG 230/138 kV transformer	PPL EU proposes to install MODs on either side of the East CB to Harwood to isolate the circuit breaker. This work will take 3 years to complete.	Pending	\$ 300,000
14	SIEG 230/138 kV transformer	PPL EU proposes to install MODs on either side of the East CB to East Palmerton to isolate the circuit breaker. This work will take 3 years to complete.	Pending	\$ 300,000

Violation #	Overloaded Facility	Upgrade Description	Network Upgrade Number	Upgrade Cost
			Total New Network Upgrades	\$ 130,631,332

Contribution to Previously Identified System Reinforcements

(Overloads initially caused by prior Queue positions with additional contribution to overloading by this project. This project may have a % allocation cost responsibility which will be calculated and reported for the Impact Study)

Violation #	Overloaded Facility	Upgrade Description	Network Upgrade Number	Upgrade Cost
15	MONT-MILT 230 kV line	PPL EU proposes to replace the existing wave traps to increase the rating of the line. This work will take 2 years to complete.	Pending	\$ 20,000
16	SIEG TR3 230/69 kV transformer	PPL EU will be removing a tie circuit breaker in 2013. Y2-015 will not have any cost responsibility for this upgrade.	N/A	\$ 0
17	ELIM-ELIM LY2 230 kV line	PPL EU proposes to update the bus and bay conductors with double 1590 conductors and associated equipment (circuit breakers, switches, etc). This work will take 3 years to complete.	Pending	\$ 5,000,000
18	N.MESHPN-CNYO&G 230 kV line	Penelec proposes to reconductor the line with a high-temperature conductor.	Pending	\$ 5,217,800
19	KEYSTONE-CABOT 500 kV line	APS proposes to replace a wave trap at Keystone.	Pending	\$ 170,900
20	SUSQ-JENK TR2 230 kV line	PPL EU proposes to rebuild the 26 mile line with 1590 ACSR to increase the rating of the line. This work will take 5 years to complete.	Pending	\$ 70,000,000
21	SUSQ-JENK TR2 230 kV line	This overload will be mitigated by the upgrade identified in #20 above.	N/A	\$ 0
22	BERW-KOONS AB 69 kV line	PPL EU proposes to rebuild the 9.73 mile line (7.2 miles owned by PPL EU and 2.23 miles owned by UGI) to increase the rating of the line. This work will take 1 years to complete.	Pending	\$ 7,900,000
23	CNYO&G-E.TWANDA 230 kV line	Penelec proposes to reconducotr the line and upgrade terminal equipment at East Towanda.	Pending	\$ 6,782,300

Violation #	Overloaded Facility	Upgrade Description	Network Upgrade Number	Upgrade Cost
24	SUNBURY 500/230 kV transformer	PPL EU proposes to install MODs on either side of the East CB to Frackville to isolate the circuit breaker. This work will take 3 years to complete.	Pending	\$ 300,000
25	SUNBURY 500/230 kV transformer	PPL EU is removing the tie circuit breaker as part of a baseline project. Y2-015 will not have any cost responsibility for the upgrade.	B1196	\$ 0
26	OXBOW-N.MESHPN 230 kV line	Penelec proposes to rebuild the 10.16 mile line to increase the rating of the line. This work will take 5 years to complete.	Pending	\$ 11,566,615
27	LACK-OXBOW 230 kV line	Penelec proposes to rebuild the 16.33 mile line and replace terminal equipment at Oxbow substation to increase the rating of the line. This work will take 5 years to complete.	Pending	\$ 19,724,800
28	FRAC-SIEG 230 kV line	PPL EU proposes to rebuild the 41 mile line with 1590 ACSR to increase the rating of the line. This work will take 5 years to complete.	Pending	\$ 110,291,476
29	LACK-OXBOW 230 kV line	This overload will be mitigated by the upgrade identified in #27 above.	N/A	\$ 0
30	LACK-OXBOW 230 kV line	This overload will be mitigated by the upgrade identified in #27 above.	N/A	\$ 0
31	SAHA34TP-GRACETON 230 kV line	PPL EU proposes to rebuild the Manor-Graceton line to increase the rating of the line. This work is expected to be completed by November 2013. (\$22,700,000) BGE will remove substation limiting substation elements with an existing baseline upgrade (b0497). Y2-015 will have no cost responsibility for this portion.	Pending	\$ 22,700,000
32	OXBOW-N.MESHPN 230 kV line	This overload will be mitigated by the upgrade identified in #26 above.	N/A	\$ 0
33	LACK-OXBOW 230 kV line	This overload will be mitigated by the upgrade identified in #27 above.	N/A	\$ 0
34	LINCOLN-STRABAN 115 kV line	A preexisting operating procedure requires that the Carroll-Germantown 138kV line be opened to alleviate the overload on this facility. This action will cause an overload on the Carlisle-Gardenrs 115kV line. MetEd is reviewing this overload and will provide any necessary reinforcements in the System Impact Study phase.	N/A	\$ 0
35	STRABAN-GERMANTN 115 kV line	A preexisting operating procedure requires that the Carroll-Germantown 138kV line be opened to alleviate the overload on this facility.	N/A	\$ 0

Violation #	Overloaded Facility	Upgrade Description	Network Upgrade Number	Upgrade Cost
36	E.SAYRE-N.WAV115 115 kV line	This overload is expected to be mitigated through a bilateral operating agreement between PJM and NYISO.	N/A	\$ 0
37	E.SAYRE-N.WAV115 115 kV line	This overload is expected to be mitigated through a bilateral operating agreement between PJM and NYISO.	N/A	\$ 0
38	FRAC TR3-FRAC 230 kV line	PPL EU proposes to replace two existing switches to increase the rating of the line. This work will take 2 years to complete.	Pending	\$ 120,000
39	GERMANTN 138/115 kV transformer	A preexisting operating procedure requires that the Carroll-Germantown 138kV line be opened to alleviate the overload on this facility. This action will cause an overload on the Roxbury-Greene 138kV line. MetEd proposes to mitigate the Roxbury-Greene 138kV overload by replacing the Roxbury 138/115kV transformer and associated terminal equipment. This work will take 2 years to complete.	Pending	\$ 2,250,000
Total Previously Identified Network Upgrades				\$ 262,043,891

Potential Congestion due to Local Energy Deliverability

PJM also studied the delivery of the energy portion of this interconnection request. Any problems identified below are likely to result in operational restrictions to the project under study. The developer can proceed with network upgrades to eliminate the operational restriction at their discretion by submitting a Merchant Transmission Interconnection request.

Note: Only the most severely overloaded conditions are listed below. There is no guarantee of full delivery of energy for this project by fixing only the conditions listed in this section. With a Transmission Interconnection Request, a subsequent analysis will be performed which shall study all overload conditions associated with the overloaded element(s) identified.

None.

Option 2

The Queue Project #Y2-063 was studied as a 350.0MW (Capacity 350.0MW) injection at the ELDR TR1 230 kV substation in the PPL area. Project #Y2-063 was evaluated for compliance with reliability criteria for summer peak conditions in 2016. Potential network impacts were as follows:

Contingency Descriptions

The following contingencies resulted in overloads:

Contingency Name	Description
01YUKON _01SOBEND _083	CONTINGENCY '01YUKON _01SOBEND _083' DISCONNECT BRANCH FROM BUS 235116 TO BUS 235118 CKT 1 /* 500/500KV, AREA 201/201. END
C1_PN230-BS-#5A	CONTINGENCY 'C1_PN230-BS-#5A' /* EAST TOWANDA #1 230 KV BUS FAULT DISCONNECT BRANCH FROM BUS 200701 TO BUS 200675 CKT 1 DISCONNECT BRANCH FROM BUS 200675 TO BUS 130763 CKT 1 DISCONNECT BRANCH FROM BUS 200674 TO BUS 200675 CKT 3 END
C2_PN115-SB-46A	CONTINGENCY 'C2_PN115-SB-46A' /* NORTH MESHOPPEN 115 KV STUCK CB - (N MESHOPPEN - BUS TIE CB) DISCONNECT BRANCH FROM BUS 200677 TO BUS 200699 CKT 1 DISCONNECT BRANCH FROM BUS 200677 TO BUS 200678 CKT 1 REDUCE BUS 200677 SHUNT BY 100 PERCENT DISCONNECT BRANCH FROM BUS 200677 TO BUS 200684 CKT 1 DISCONNECT BRANCH FROM BUS 200825 TO BUS 200706 CKT 3 DISCONNECT BRANCH FROM BUS 200677 TO BUS 200825 CKT 3 DISCONNECT BUS 200825 DISCONNECT BRANCH FROM BUS 200677 TO BUS 200698 CKT 2 DISCONNECT BRANCH FROM BUS 200677 TO BUS 200674 CKT 1 DISCONNECT BRANCH FROM BUS 200677 TO BUS 200687 CKT 2 DISCONNECT BRANCH FROM BUS 200677 TO BUS 200706 CKT 4 END
C2_PN230-SB-#3F	CONTINGENCY 'C2_PN230-SB-#3F' /* EAST TOWANDA 230 KV STUCK CB - (#3 XF) DISCONNECT BRANCH FROM BUS 200675 TO BUS 130763 CKT 1 DISCONNECT BRANCH FROM BUS 200701 TO BUS 200675 CKT 1 DISCONNECT BRANCH FROM BUS 200674 TO BUS 200675 CKT 3 END
CNSTN_J_NOEMOR YGROVE	CONTINGENCY 'CNSTN_J_NOEMORYGROVE' /* CONASTONE J (5011/S-BUS) BREAKER DISCONNECT BRANCH FROM BUS 200004 TO BUS 200003 CKT 1 /* CKT #5011 CONASTONE TO BRIGHTON DISCONNECT BUS 200100 /* CONASTONE 500KV CAP END

Contingency Name	Description
MNS_115_4	CONTINGENCY 'MNS_115_4' / MNS - HOME CITY DISCONNECT BRANCH FROM BUS 200769 TO BUS 200930 CKT 1 END
PJM17	CONTINGENCY 'PJM17' DISCONNECT BRANCH FROM BUS 200004 TO BUS 200013 CKT 1 /* CNASTONE PEACHBTM 500 500 END
PJM69	CONTINGENCY 'PJM69' DISCONNECT BRANCH FROM BUS 200021 TO BUS 200009 CKT 1 /* SUNBURY JUNIATA 500 500 DISCONNECT BRANCH FROM BUS 200021 TO BUS 200022 CKT 2 /* SUNBURY SUSQHANA 500 500 / CKT 1 -> 2 DISCONNECT BRANCH FROM BUS 200021 TO BUS 208109 CKT 24 /* SUNBURY SUNBURY 500 230 END
PJM81	CONTINGENCY 'PJM81' /* JUNIATA BREAKER SUN N DISCONNECT BRANCH FROM BUS 200021 TO BUS 200009 CKT 1 /* SUNBURY JUNIATA 500500 DISCONNECT BRANCH FROM BUS 200021 TO BUS 200022 CKT 2 /* SUNBURY SUSQHANA 500500 DISCONNECT BRANCH FROM BUS 200021 TO BUS 208109 CKT 24 /* SUNBURY SUNBURY 500230 DISCONNECT BRANCH FROM BUS 200009 TO BUS 208005 CKT 2 /* JUNIATA JUNIATA 500230 END
PJM82	CONTINGENCY 'PJM82' /* JUNIATA BREAKER SUN S DISCONNECT BRANCH FROM BUS 200021 TO BUS 200009 CKT 1 /* SUNBURY JUNIATA 500500 DISCONNECT BRANCH FROM BUS 200021 TO BUS 200022 CKT 2 /* SUNBURY SUSQHANA 500500 DISCONNECT BRANCH FROM BUS 200021 TO BUS 208109 CKT 24 /* SUNBURY SUNBURY 500230 DISCONNECT BRANCH FROM BUS 200009 TO BUS 208004 CKT 1 /* JUNIATA JUNIATA 500230 END
PJM8BG	CONTINGENCY 'PJM8BG' /* CONASTONE BREAKER B (TIE BREAKER) DISCONNECT BRANCH FROM BUS 200004 TO BUS 200013 CKT 1 /* CNASTONE PEACHBTM 500500 DISCONNECT BRANCH FROM BUS 200004 TO BUS 220963 CKT 2 /* CNASTONE CONASTNE 500230 END

Contingency Name	Description
PL100026	CONTINGENCY 'PL100026' /* SIEGFRIED 230KV EAST CB TO EAST PALMERTON DISCONNECT BRANCH FROM BUS 207959 TO BUS 208077 CKT 1 DISCONNECT BRANCH FROM BUS 207959 TO BUS 210601 CKT 1 DISCONNECT BRANCH FROM BUS 208074 TO BUS 207980 CKT 1 DISCONNECT BRANCH FROM BUS 208074 TO BUS 208076 CKT 1 DISCONNECT BRANCH FROM BUS 208074 TO BUS 211161 CKT 4 DISCONNECT BRANCH FROM BUS 208075 TO BUS 208074 CKT 1 DISCONNECT BRANCH FROM BUS 208077 TO BUS 208074 CKT 1 DISCONNECT BRANCH FROM BUS 208077 TO BUS 211160 CKT 3 END
PL100027	CONTINGENCY 'PL100027' /* SIEGFRIED 230KV EAST CB TO MARTINS CREEK #2 DISCONNECT BRANCH FROM BUS 208074 TO BUS 207980 CKT 1 DISCONNECT BRANCH FROM BUS 208074 TO BUS 208075 CKT 1 DISCONNECT BRANCH FROM BUS 208074 TO BUS 211161 CKT 4 DISCONNECT BUS 208076 END
PL100029	CONTINGENCY 'PL100029' /*SIEGFRIED 230KV EAST CB TO FRACKVILLE DISCONNECT BRANCH FROM BUS 208074 TO BUS 207973 CKT 1 /* SIEG-FRAC 230KV DISCONNECT BRANCH FROM BUS 208074 TO BUS 207980 CKT 1 /* SIEG-HARW 230KV DISCONNECT BRANCH FROM BUS 208074 TO BUS 208075 CKT 1 /* SIEG BUS TIE CB DISCONNECT BRANCH FROM BUS 208074 TO BUS 211161 CKT 4 /* SIEG T4 DISCONNECT BRANCH FROM BUS 208076 TO BUS 208074 CKT 1 /* MACR-SIEG #2 CB END
PL100031	CONTINGENCY 'PL100031' /* SIEGFRIED 230KV EAST CB TO HARWOOD DISCONNECT BRANCH FROM BUS 208074 TO BUS 208075 CKT 1 /* SIEG BUS TIE CB DISCONNECT BRANCH FROM BUS 208074 TO BUS 211161 CKT 4 /* SIEG T4 DISCONNECT BRANCH FROM BUS 208076 TO BUS 208074 CKT 1 /* MACR-SIEG #2 CB DISCONNECT BUS 207980 /* SIEG-HARW 230KV END

Contingency Name	Description
PL100032	CONTINGENCY 'PL100032' /* SIEGFRIED 230KV EAST-WEST TIE CB DISCONNECT BRANCH FROM BUS 207980 TO BUS 208074 CKT 1 DISCONNECT BRANCH FROM BUS 208074 TO BUS 207973 CKT 1 DISCONNECT BRANCH FROM BUS 208074 TO BUS 211161 CKT 4 DISCONNECT BRANCH FROM BUS 208074 TO BUS 211161 CKT 5 DISCONNECT BRANCH FROM BUS 208075 TO BUS 208074 CKT 1 DISCONNECT BRANCH FROM BUS 208076 TO BUS 208074 CKT 1 DISCONNECT BRANCH FROM BUS 208077 TO BUS 208074 CKT 1 END
PL100142	CONTINGENCY 'PL100142' /* FRAC-SIEG 230KV DISCONNECT BRANCH FROM BUS 207973 TO BUS 208074 CKT 1 /* FRAC-SIEG 230KV END
PL100373_A	CONTINGENCY 'PL100373_A' /* FRAC-ELDR 230KV LINE OUT & FRAC T3 & ELDR T2 OUT DISCONNECT BRANCH FROM BUS 207975 TO BUS 903270 CKT 1 /* FRAC TR3-W3-022 TAP 230KV DISCONNECT BRANCH FROM BUS 207975 TO BUS 207973 CKT 1 /* FRAC T3 CB DISCONNECT BRANCH FROM BUS 212162 TO BUS 207975 CKT 3 /* FRAC T3 END
PL100374	CONTINGENCY 'PL100374' /* SUNBURY-ELDRED 230KV LINE OUT & ELDRED T1 & SUNBURY T23 OUT DISCONNECT BRANCH FROM BUS 212120 TO BUS 207964 CKT 1 /* ELDR T1 DISCONNECT BUS 208111 /* SUNB-ELDR 230KV & SUNB T23 END
PL100456	CONTINGENCY 'PL100456' /*SUNBURY 500-230 TRAN 24 OUT DISCONNECT BRANCH FROM BUS 200021 TO BUS 208109 CKT 24 END
PL100484	CONTINGENCY 'PL100484' /* D/C MONTOUR-SUSQ 230KV & MONTOUR-SUSQ T10 230KV DISCONNECT BRANCH FROM BUS 208040 TO BUS 208113 CKT 1 DISCONNECT BRANCH FROM BUS 208040 TO BUS 208120 CKT 1 END
PL100925	CONTINGENCY 'PL100925' /*SUSQUEHANNA 230KV TIE CB TO SUSQ T20 DISCONNECT BRANCH FROM BUS 208113 TO BUS 234250 CKT 1 DISCONNECT BUS 208115 DISCONNECT BUS 208116 DISCONNECT BUS 208117 END

Contingency Name	Description
PL101207	CONTINGENCY 'PL101207' /* SUNB 500 3T BF-SUSQUHANNA LINE DISCONNECT BRANCH FROM BUS 200021 TO BUS 200022 CKT 2 /* SUNB SUSQ 500500 DISCONNECT BRANCH FROM BUS 200021 TO BUS 200009 CKT 1 /* SUNB JUNI 500500 END
PP1E_NO EMORYGROVE	CONTINGENCY 'PP1E_NO EMORYGROVE' / NO PATH OPEN BRANCH FROM BUS 200003 TO BUS 200004 CKT 1 / 200003 BRIGHTON 500 200004 CNASTONE 500 1 END
UGI - MOUNTAIN - SUSQHNA TOWER	CONTINGENCY 'UGI - MOUNTAIN - SUSQHNA TOWER' OPEN BRANCH FROM BUS 208113 TO BUS 234250 CKT 1 / 208113 SUSQ 230 234250 MOUN-TAP 230 1 OPEN BRANCH FROM BUS 208120 TO BUS 234251 CKT 1 / 208120 SU10 230 234251 MOUNT-H1 230 1 OPEN BRANCH FROM BUS 234251 TO BUS 234252 CKT 1 / 234251 MOUNT-H1 230 234252 MOUNTAIN 230 1 OPEN BRANCH FROM BUS 234251 TO BUS 234254 CKT 1 / 234251 MOUNT-H1 230 234254 MNTN TR1 69.0 1 OPEN BRANCH FROM BUS 234257 TO BUS 234254 CKT 1 / 234257 MOUNT 2 69.0 234254 MNTN TR1 69.0 1 OPEN BRANCH FROM BUS 234256 TO BUS 234254 CKT 1 / 234256 MOUNT 1 69.0 234254 MNTN TR1 69.0 1 END
UGI - MOUNTAIN - SUSQHNA TOWER_SPS	CONTINGENCY 'UGI - MOUNTAIN - SUSQHNA TOWER_SPS' /* WITH SPS 8227 TRIP SCHEME OPEN BRANCH FROM BUS 208113 TO BUS 234250 CKT 1 / 208113 SUSQ 230 234250 MOUN-TAP 230 1 OPEN BRANCH FROM BUS 208120 TO BUS 234251 CKT 1 / 208120 SU10 230 234251 MOUNT-H1 230 1 OPEN BRANCH FROM BUS 234251 TO BUS 234252 CKT 1 / 234251 MOUNT-H1 230 234252 MOUNTAIN 230 1 OPEN BRANCH FROM BUS 234251 TO BUS 234254 CKT 1 / 234251 MOUNT-H1 230 234254 MNTN TR1 69.0 1 OPEN BRANCH FROM BUS 234257 TO BUS 234254 CKT 1 / 234257 MOUNT 2 69.0 234254 MNTN TR1 69.0 1 OPEN BRANCH FROM BUS 234256 TO BUS 234254 CKT 1 / 234256 MOUNT 1 69.0 234254 MNTN TR1 69.0 1 DISCONNECT BUS 207999 /* BUS 208000 REPLACED WITH BUS 207999 MAR 3, 2010 DISCONNECT BRANCH FROM BUS 208095 TO BUS 207999 CKT 2 DISCONNECT BRANCH FROM BUS 207999 TO BUS 208001 CKT 1 END

Generator Deliverability

(Single or N-1 contingencies for the Capacity portion only of the interconnection)

#	Contingency		Affected Area	Facility Description	Bus			Power Flow	Loading %		Rating		MW Contribution	Ref
	Type	Name			From	To	Circuit		Initial	Final	Type	MVA		
1	N-1	PL100142	PPL	SUNBURY 500/230 kV transformer	208109	200021	24	DC	84.74	100.37	ER	1,165	182.03	2
2	Non	Non	PPL	FRAC TR3-FRAC 230 kV line	207975	207973	1	DC	58.11	98.77	NR	425	172.83	4
3	N-1	PL100456	PPL	MONT-SU10 230 kV line	208040	208120	1	DC	91.17	101.28	ER	739	74.70	5
4	Non	Non	PPL	ELDR TR1-SUNBTR23 230 kV line	207964	208111	1	DC	51.72	102.96	NR	341	176.02	7
5	Non	Non	PPL	SUNBURY 500/230 kV transformer	208109	200021	24	DC	92.39	109.35	NR	858	145.57	16
6	Non	Non	PPL	ELDR TR1-ELDR TR2 230 kV line	207964	207965	1	DC	56.39	106.09	NR	349	173.47	17
7	Non	Non	PPL	FRAC-SIEG 230 kV line	207973	208074	1	DC	91.53	108.82	NR	513	88.71	18
8	Non	Non	PPL	ELDR TR2-W3-022 TAP 230 kV line	207965	903270	1	DC	63.14	114.09	NR	341	173.74	23
9	Non	Non	PPL	W3-022 TAP-FRAC TR3 230 kV line	903270	207975	1	DC	66.57	117.52	NR	341	173.74	26
10	N-1	PL100374	PPL	FRAC TR3-FRAC 230 kV line	207975	207973	1	DC	80.97	147.14	ER	526	348.07	31
11	N-1	PL100374	PPL	ELDR TR1-ELDR TR2 230 kV line	207964	207965	1	DC	76.92	153.85	ER	455	350.00	34
12	N-1	PL100374	PPL	ELDR TR2-W3-022 TAP 230 kV line	207965	903270	1	DC	81.16	157.78	ER	457	349.77	38
13	N-1	PL100373_A	PPL	SUNBTR23-SUNB 230 kV line	208111	208109	1	DC	82.78	158.31	ER	455	343.65	39
14	N-1	PL100373_A	PPL	ELDR TR1-SUNBTR23 230 kV line	207964	208111	1	DC	85.41	162.03	ER	457	349.77	41
15	N-1	PL100374	PPL	W3-022 TAP-FRAC TR3 230 kV line	903270	207975	1	DC	85.41	162.03	ER	457	349.77	42

Note: Please see Attachment 2 for projects providing impacts to flowgate violations. The values in the Reference column correspond to the proper table in the Attachment.

Light Load Analysis

Light Load Studies to be conducted during later study phases (applicable to wind, coal, nuclear, and pumped storage projects).

None.

Multiple Facility Contingency

(Double Circuit Tower Line contingencies were studied for the full energy output. The contingencies of Line with Failed Breaker and Bus Fault will be performed for the Impact Study.)

Contingency			Affected Area	Facility Description	Bus		Circuit	Power Flow	Loading %		Rating		MW Contribution	Ref
#	Type	Name			From	To			Initial	Final	Type	MVA		
16	LFFB	PJM8BG	METED	YORKANA-OTCR 230 kV line	204515	208048	1	DC	99.98	100.02	ER	793	18.27	1
17	DCTL	PL100484	PPL	MONT-MILT 230 kV line	208040	208034	1	DC	99.84	100.48	ER	739	29.38	3
18	LFFB	PL101207	PPL	SUNBTR22-SUSQ 230 kV line	208110	208113	1	DC	90.38	101.42	ER	624	68.94	6
19	LFFB	PL100027	PPL	SIEG 230/138 kV transformer	208074	211161	5	DC	95.84	105.17	ER	529	49.33	9
20	LFFB	PL100026	PPL	SIEG 230/138 kV transformer	208074	211161	5	DC	92.87	105.23	ER	529	65.39	10
21	LFFB	PL100031	PPL	SIEG 230/138 kV transformer	208074	211161	5	DC	96.75	106.00	ER	529	48.91	11
22	LFFB	PL101207	PPL	SUNB-SUNBTR22 230 kV line	208109	208110	1	DC	99.45	111.04	ER	617	71.51	19

Note: Please see Attachment 2 for projects providing impacts to flowgate violations. The values in the Reference column correspond to the proper table in the Attachment.

Short Circuit

(Summary of impacted circuit breakers)

None.

Contribution to Previously Identified Overloads

(This project contributes to the following contingency overloads, i.e. "Network Impacts", identified for earlier generation or transmission interconnection projects in the PJM Queue)

#	Contingency		Affected Area	Facility Description	Bus		Circuit	Power Flow	Loading %		Rating		MW Contribution	Ref
	Type	Name			From	To			Initial	Final	Type	MVA		
23	LFFB	PL100032	PPL	SIEG TR3 230/69 kV transformer	208077	211160	3	DC	100.17	101.15	ER	132	8.03	8
24	DCTL	PL100484	PPL	ELIM-ELIM LY2 230 kV line	207968	207970	1	DC	105.95	106.50	ER	531	18.06	12
25	LFFB	C2_PN115-SB-46A	PENELEC	N.MESHPN-CNYO&G 230 kV line	200706	200924	1F	DC	106.45	107.02	ER	617	22.05	13
26	N-1	01YUKON_01SOBEND_083	APS	KEYSTONE-CABOT 500 kV line	200011	235104	1	DC	108.13	108.57	ER	2,598	73.28	14
27	N-1	01YUKON_01SOBEND_083	APS	KEYSTONE-CABOT 500 kV line	200011	235104	1	DC	108.13	108.57	ER	2,598	73.28	15
28	DCTL	UGI - MOUNTAIN - SUSQHNA TOWER	PPL	SUSQ-JENK TR2 230 kV line	208113	208001	1	DC	113.73	114.33	ER	624	23.00	20
29	LFFB	PL100925	PPL	SUSQ-JENK TR2 230 kV line	208113	208001	1	DC	114.04	114.78	ER	624	28.59	21
30	DCTL	UGI - MOUNTAIN - SUSQHNA TOWER_SPS	PPL/UGI	BERW-KOONS AB 69 kV line	212060	234263	1	DC	113.84	115.67	ER	51	5.78	22
31	LFFB	C2_PN115-SB-46A	PENELEC	CNYO&G-E.TWANDA 230 kV line	200924	200675	1F	DC	116.60	117.25	ER	549	22.05	24
33	LFFB	PL100029	PPL	SUNBURY 500/230 kV transformer	208109	200021	24	DC	103.67	119.71	ER	1,165	186.83	25
34	LFFB	PL100032	PPL	SUNBURY 500/230 kV transformer	208109	200021	24	DC	108.25	124.51	ER	1,165	189.37	27
35	N-1	MNS_115_4	PENELEC	OXBOW-N.MESHPN 230 kV line	200708	200706	1	DC	124.80	128.64	ER	608	23.31	28
36	N-1	PJM69	PENELEC/PPL	LACK-OXBOW 230 kV line	208009	200708	1	DC	130.85	131.76	ER	617	34.75	29
37	N-1	PJM69	PPL	FRAC-SIEG 230 kV line	207973	208074	1	DC	119.97	139.22	ER	629	121.01	30

#	Contingency		Affected Area	Facility Description	Bus			Power Flow	Loading %		Rating		MW Contribution	Ref
	Type	Name			From	To	Circuit		Initial	Final	Type	MVA		
38	LFFB	PJM82	PENELEC/ PPL	LACK-OXBOW 230 kV line	208009	200708	1	DC	152.09	153.00	ER	617	34.78	32
39	LFFB	PJM81	PENELEC/ PPL	LACK-OXBOW 230 kV line	208009	200708	1	DC	152.10	153.01	ER	617	34.78	33
40	LFFB	PJM82	PPL	FRAC-SIEG 230 kV line	207973	208074	1	DC	134.93	154.18	ER	629	121.01	35
41	LFFB	PJM81	PPL	FRAC-SIEG 230 kV line	207973	208074	1	DC	134.93	154.18	ER	629	121.01	36
42	N-1	PJM17	PPL/BGE	SAHA34TP-GRACETON 230 kV line	208071	220964	1	DC	154.19	154.25	ER	485	18.75	37
43	Non	Non	PENELEC	OXBOW-N.MESHNP 230 kV line	200708	200706	1	DC	156.96	162.00	NR	478	24.09	40
44	Non	Non	PENELEC/ PPL	LACK-OXBOW 230 kV line	208009	200708	1	DC	159.44	164.46	NR	488	24.51	43
45	N-1	PP1E_NO EMORYGROVE	METED	STRABAN-GERMANTN 115 kV line	204538	204529	1	DC	179.93	180.38	ER	139	7.61	44
46	BUS	C1_PN230-BS- #5A	PENELEC/ NYISO	E.SAYRE-N.WAV115 115 kV line	200676	130836	1	DC	185.29	186.15	ER	128	6.80	45
47	LFFB	C2_PN230-SB- #3F	PENELEC/ NYISO	E.SAYRE-N.WAV115 115 kV line	200676	130836	1	DC	185.29	186.15	ER	128	6.80	46
48	LFFB	CNSTN_J_NO EMORYGROVE	METED	STRABAN-GERMANTN 115 kV line	204538	204529	1	DC	200.13	201.61	ER	139	7.61	47
49	N-1	PP1E_NO EMORYGROVE	METED	GERMANTN 138/115 kV transformer	204529	204530	1	DC	217.97	218.99	ER	104	7.61	48

Note: Please see Attachment 2 for projects providing impacts to flowgate violations. The values in the Reference column correspond to the proper table in the Attachment.

Steady-State Voltage Requirements

(Summary of the VAR requirements based upon the results of the steady-state voltage studies)

Will be confirmed in the System Impact Study phase.

Stability and Reactive Power Requirement for Low Voltage Ride Through

(Summary of the VAR requirements based upon the results of the dynamic studies)

Will be confirmed in the System Impact Study phase.

New System Reinforcements

(Upgrades required to mitigate reliability criteria violations, i.e. Network Impacts, initially caused by the addition of this project generation)

Not defined for Option 2.

Contribution to Previously Identified System Reinforcements

(Overloads initially caused by prior Queue positions with additional contribution to overloading by this project. This project may have a % allocation cost responsibility which will be calculated and reported for the Impact Study)

Not defined for Option 2.

Potential Congestion due to Local Energy Deliverability

PJM also studied the delivery of the energy portion of this interconnection request. Any problems identified below are likely to result in operational restrictions to the project under study. The developer can proceed with network upgrades to eliminate the operational restriction at their discretion by submitting a Merchant Transmission Interconnection request.

Note: Only the most severely overloaded conditions are listed below. There is no guarantee of full delivery of energy for this project by fixing only the conditions listed in this section. With a Transmission Interconnection Request, a subsequent analysis will be performed which shall study all overload conditions associated with the overloaded element(s) identified.

None.

Attachment 1. Option 1 Flowgate Details

Table 1

Bus Number	Bus Name	Full Contribution
212266	LOR1_N14_E	3.28
209027	LOR2_Q27 E	12.19
295230	Q-028 E	11.65
212384	R-043	.61
212386	R-043	2.44
290673	S-042 C	.31
290674	S-042 E	1.22
901432	W1-114 E	.28
901442	W1-115 E	.28
903271	W3-022 C OP1	2.3
903272	W3-022 E OP1	15.4
909021	X2-012 C	286.68
914031	Y2-015 OP1	41.31
914051	Y2-037 C	.17
914052	Y2-037 E	.28
914191	Y2-063 OP1	41.31

Table 2

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.03
208941	FISH CT	.11
208981	FOWH IPP	.16
208982	GLBT IPP	.32
212174	INGE	.03
209004	KOPP IPP	.05
208945	LOHA CT	.08
212265	LOR1_N14_C	.02
209027	LOR2_Q27 E	13.52

Bus Number	Bus Name	Full Contribution
208911	MONT G1	5.53
208912	MONT G2	5.64
295223	Q-028 C	.53
212384	R-043	.68
212386	R-043	2.7
290673	S-042 C	.58
209013	SCEN IPP	.33
212449	SUNB CT	.02
209018	SUNBIPCT	.14
209014	SUNBIPP1	.31
209015	SUNBIPP2	.31
209016	SUNBIPP3	.36
209017	SUNBIPP4	.42
893121	V2-027	.01
209019	VIKI IPP	3.07
901431	W1-114 C	.
901441	W1-115 C	.
903271	W3-022 C OP1	3.2
209021	WEST IPP	.12
209022	WHFR IPP	.17
208948	WILL CT	.18
909021	X2-012 C	233.03
914031	Y2-015 OP1	57.49
914051	Y2-037 C	.19
914191	Y2-063 OP1	57.49

Table 3

Bus Number	Bus Name	Full Contribution
210888	MACRTR10	-.42
889011	U2-015 C	.73
889012	U2-015 E	4.89

Bus Number	Bus Name	Full Contribution
901602	W1-111 E	1.04
909021	X2-012 C	19.87
LTF	X3-021	1.01
912291	X4-048 OP1	13.93
LTF	Y1-004	.83
914031	Y2-015 OP1	8.22
LTF	Y2-040	1.01
LTF	Y2-044	.89
LTF	Y2-049	.83
914191	Y2-063 OP1	8.22

Table 4

Bus Number	Bus Name	Full Contribution
208940	ALLE CT	.1
208972	BECR K09	.01
212099	BRMO IPP	.07
208941	FISH CT	.22
208981	FOWH IPP	.41
208982	GLBT IPP	.66
208943	HARW CT	.11
234304	HUN GEN3	.12
234305	HUN GEN4	.18
234311	HUN GEN5	.17
234312	HUN GEN6	.17
212174	INGE	.08
208944	JENK CT	.08
209004	KOPP IPP	.07
209003	KSTN IPP	.01
292590	L-018 E	2.63
208945	LOHA CT	.13
212265	LOR1_N14_C	.04

Bus Number	Bus Name	Full Contribution
209027	LOR2_Q27 E	28.16
208911	MONT G1	6.36
208912	MONT G2	6.49
209006	NEPC IPP	.21
209007	NOEN IPP	.23
295223	Q-028 C	1.38
212384	R-043	1.41
212386	R-043	5.63
290673	S-042 C	1.49
209013	SCEN IPP	.69
212449	SUNB CT	.07
209018	SUNBIPCT	.41
209014	SUNBIPP1	.91
209015	SUNBIPP2	.91
209016	SUNBIPP3	1.07
209017	SUNBIPP4	1.59
208918	SUSQ 1	5.18
889011	U2-015 C	2.17
291936	U4-014 C	.01
893121	V2-027	.02
296063	V3-040 C	.01
209019	VIKI IPP	7.93
901431	W1-114 C	.01
901441	W1-115 C	.01
903271	W3-022 C OP1	7.48
209029	WAYM IPP	.02
209021	WEST IPP	.31
209022	WHFR IPP	.34
209023	WIENIPP1	.24
209025	WIENIPP3	.24
209026	WIENIPP4	.12
208948	WILL CT	.26
909021	X2-012 C	293.47
912291	X4-048 OP1	73.86
914031	Y2-015 OP1	134.27

Bus Number	Bus Name	Full Contribution
914051	Y2-037 C	.4
914191	Y2-063 OP1	134.27

Table 5

Bus Number	Bus Name	Full Contribution
212266	LOR1_N14_E	2.02
209027	LOR2_Q27 E	7.52
295230	Q-028 E	7.17
212384	R-043	.38
212386	R-043	1.5
290673	S-042 C	.19
290674	S-042 E	.75
901432	W1-114 E	.17
901442	W1-115 E	.17
903271	W3-022 C OP1	1.42
903272	W3-022 E OP1	9.49
909021	X2-012 C	239.61
914031	Y2-015 OP1	25.45
914051	Y2-037 C	.11
914052	Y2-037 E	.17
914191	Y2-063 OP1	25.45

Table 6

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.22
217006	BERGN26A	1.11
217078	ESSEX 12	9.72
206617	EXXON	.36
206331	GG A1&2	2.09
206332	GG A3&4	2.09
206333	GG B5&6	2.09
206334	GG B7&8	2.09
217081	HUDSON 1	18.97

Bus Number	Bus Name	Full Contribution
217083	KEARNY11	6.89
217086	KRNY9&10	1.11
209003	KSTN IPP	.01
292590	L-018 E	1.98
212266	LOR1_N14_E	1.38
209027	LOR2_Q27 E	5.12
206679	M&M S721	.57
210888	MACRTR10	.28
200851	MEHOOP3	.48
294572	P-028 C	.24
294573	P-028 E	42.73
206638	PEAPACK	.21
204652	PORT1GEN	8.88
204653	PORT2GEN	14.04
295230	Q-028 E	8.57
290092	Q-041 E	1.63
212384	R-043	.26
212386	R-043	1.02
290673	S-042 C	.23
290674	S-042 E	.91
218360	SEWAREN1	5.23
218361	SEWAREN2	5.92
218362	SEWAREN3	5.37
218363	SEWAREN4	6.2
218364	SEWAREN6	5.55
889011	U2-015 C	.95
889012	U2-015 E	6.33
293093	U2-077	32.05
299906	U3-032 E	.69
291937	U4-014 E	.37
292095	V1-030 E1	.07
292111	V1-030 E9	.05
292191	V1-030 EC	.24
292092	V1-030 ED	.14
297033	V2-010 E	.34

Bus Number	Bus Name	Full Contribution
297069	V2-025 E	.16
293340	V3-005 E	.34
293413	V3-040 E	.37
293444	V3-065 E	.02
293440	V3-066 E	.01
293434	V3-067 E	.03
293429	V3-068 E	.01
904002	V4-001 E	.1
LTF	V4-050	5.86
209019	VIKI IPP	1.04
900801	W1-001	.76
901262	W1-082 E	.66
901342	W1-101 E	.05
901602	W1-111 E	1.47
901432	W1-114 E	.12
901442	W1-115 E	.12
901512	W1-122 E	.18
901541	W1-127 C	.06
901542	W1-127 E	.1
902251	W2-023	31.52
LTF	W2-033	3.9
902382	W2-052 E	.02
902532	W2-084 E	.35
902572	W2-091 E	.54
903271	W3-022 C OP1	1.24
903272	W3-022 E OP1	8.29
903332	W3-032 E	.27
903391	W3-039 C	.14
903392	W3-039 E	.92
903412	W3-044 E	.67
903562	W3-076 E	.67
903572	W3-077 E	.5
903632	W3-095 E	.5
903672	W3-106 E	.34
903682	W3-110 E	.26

Bus Number	Bus Name	Full Contribution
903742	W3-126 E	.6
903822	W3-139 E	.54
903832	W3-140 E	.28
903842	W3-145 E	.6
903852	W3-146 E	.37
903872	W3-154 E	.05
905091	W4-009 OP1	35.16
905122	W4-014 E	.57
905181	W4-021	35.14
905242	W4-031 E	.13
905291	W4-038 OP1	1.27
905342	W4-046 E	.34
905372	W4-059 E	.02
905402	W4-064 E	.11
905412	W4-065 E	.11
905422	W4-068 E	.27
905442	W4-073 E	.57
905452	W4-080 E	.63
905532	W4-093 E	.23
905542	W4-097 E	.1
209029	WAYM IPP	.02
209031	WAYMART E	6.77
907002	X1-005 E	.33
907012	X1-012 E	.35
907072	X1-034 E	.04
907152	X1-046 E	.28
907272	X1-072 E	.04
907281	X1-073 C OP1	.24
907282	X1-073 E OP1	.39
907332	X1-082 E	.41
907372	X1-088 E	.4
907381	X1-094 C	.35
907382	X1-094 E	.58
907451	X1-108	1.87
907482	X1-114 E	.07

Bus Number	Bus Name	Full Contribution
907492	X1-116 E	.25
909021	X2-012 C	51.37
909171	X2-050	34.88
909302	X2-087 E	.03
909322	X2-089 E	.09
909332	X2-099 E	.34
910522	X3-003 E	7.12
910531	X3-004	1.85
910582	X3-011 E	.17
910612	X3-029 E	.61
910762	X3-052 E	.16
910782	X3-056 E	3.81
910792	X3-057 E	3.23
910922	X3-083 E	.37
910931	X3-085 C	.16
910932	X3-085 E	.27
912062	X4-007 E	3.35
912091	X4-012 C OP1	.13
912092	X4-012 E OP1	.21
912111	X4-016	.53
912261	X4-044 C	.51
912262	X4-044 E	.92
912291	X4-048 OP1	117.88
913131	Y1-020 C	.21
913132	Y1-020 E	.47
913171	Y1-025 C OP1	35.16
913172	Y1-025 E OP1	2.91
913181	Y1-026	8.13
913221	Y1-031 C OP1	.7
913222	Y1-031 E OP1	5.36
913311	Y1-047 OP1	5.48
913481	Y1-072 C	.04
913482	Y1-072 E	.06
913561	Y1-084 C OP1	.04
913562	Y1-084 E OP1	.07

Bus Number	Bus Name	Full Contribution
914021	Y2-013 OP1	40.67
914031	Y2-015 OP1	22.24
914041	Y2-018 C	.04
914042	Y2-018 E	.07
914051	Y2-037 C	.07
914052	Y2-037 E	.12
914061	Y2-042	3.26
914161	Y2-060	1.25
914191	Y2-063 OP1	22.24

Table 7

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.02
208941	FISH CT	.11
208981	FOWH IPP	.14
208982	GLBT IPP	.32
208943	HARW CT	.08
212174	INGE	.03
292590	L-018 E	1.14
212265	LOR1_N14_C	.02
212266	LOR1_N14_E	3.7
209020	LOR2_Q27 C	.08
209027	LOR2_Q27 E	13.75
209006	NEPC IPP	.14
295223	Q-028 C	.47
295230	Q-028 E	19.28
212384	R-043	.69
212386	R-043	2.75
290673	S-042 C	.51
290674	S-042 E	2.04
209013	SCEN IPP	.34
889011	U2-015 C	1.58
889012	U2-015 E	10.58
291936	U4-014 C	.01

Bus Number	Bus Name	Full Contribution
291937	U4-014 E	.72
296063	V3-040 C	.01
293413	V3-040 E	.72
209019	VIKI IPP	1.42
901602	W1-111 E	2.34
901431	W1-114 C	.
901432	W1-114 E	.32
901441	W1-115 C	.
901442	W1-115 E	.32
903271	W3-022 C OP1	3.06
903272	W3-022 E OP1	20.45
209021	WEST IPP	.1
209022	WHFR IPP	.17
209023	WIENIPP1	.16
209025	WIENIPP3	.16
209026	WIENIPP4	.08
909021	X2-012 C	72.77
910782	X3-056 E	4.08
912291	X4-048 OP1	27.45
914031	Y2-015 OP1	54.85
914051	Y2-037 C	.2
914052	Y2-037 E	.32
914191	Y2-063 OP1	54.85

Table 8

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	8.14
217006	BERGN26A	4.07
212099	BRMO IPP	.03
219103	BURLNGT8	3.91
219124	BURLNGT9	34.25
228251	CARLLS#4	.89
228000	CEDR#1CT	8.59
228001	CEDR#2CT	4.14

Bus Number	Bus Name	Full Contribution
200030	CONE G1	6.68
200031	CONE G2	6.76
228301	D/W 1 ST	14.44
228302	D/W 6 ST	14.81
213585	EDDYSTN2	57.02
217078	ESSEX 12	35.64
208981	FOWH IPP	.2
298464	G-030	.88
206331	GG A1&2	7.76
206332	GG A3&4	7.76
206333	GG B5&6	7.76
206334	GG B7&8	7.76
217081	HUDSON 1	69.54
212174	INGE	.04
217083	KEARNY11	25.24
200032	KEYS G1	8.21
200033	KEYS G2	8.11
209004	KOPP IPP	.04
217086	KRNY9&10	4.07
292590	L-018 E	4.14
208945	LOHA CT	.07
209027	LOR2_Q27 E	16.6
219134	MERCER 3	21.57
227807	MO AV B	3.72
219137	NAT PARK	3.9
204652	PORT1GEN	30.92
204653	PORT2GEN	47.6
295223	Q-028 C	.7
228343	QUINTN#1	.37
295952	R-011	84.43
212384	R-043	.83
212386	R-043	3.32
290673	S-042 C	.75
291017	S-107 1CT	24.05
291019	S-107 1ST	48.1

Bus Number	Bus Name	Full Contribution
291018	S-107 2CT	24.05
213941	SCHYLABC	.42
213945	SCHYLKL1	30.58
218360	SEWAREN1	20.05
218361	SEWAREN2	22.74
218362	SEWAREN3	20.62
218363	SEWAREN4	23.89
218364	SEWAREN6	21.37
200833	SEWRDB34	2.73
235619	SOUTH BEND 1	1.48
235620	SOUTH BEND 2	1.48
235621	SOUTH BEND 3	1.49
235622	SOUTH BEND 4	1.48
212449	SUNB CT	.03
209018	SUNBIPCT	.17
209014	SUNBIPP1	.39
209015	SUNBIPP2	.39
209016	SUNBIPP3	.45
209017	SUNBIPP4	.62
292339	T-109	.19
292344	T-110	.19
292512	T-146 C	12.84
885600	T20SOLAR E	.41
204656	TITUS 1G	14.73
204657	TITUS 2G	14.73
204658	TITUS 3G	14.73
292815	U1-056 C	8.45
889011	U2-015 C	2.64
292966	U2-045 C	.48
293062	U2-076	1.86
293093	U2-077	121.62
297005	V2-003 C	.28
893121	V2-027	.01
297082	V2-035 C	.14
900111	V4-020	121.64

Bus Number	Bus Name	Full Contribution
904221	V4-023 C1	1.26
904223	V4-023 C2	.15
904231	V4-024 C1	.7
904233	V4-024 C2	.7
904241	V4-025 C1	.7
904243	V4-025 C2	.43
904245	V4-025 C3	.11
904247	V4-025 C4	.17
904281	V4-029 C	1.41
904361	V4-037 C1	.7
904363	V4-037 C3	.7
904401	V4-041 C	1.41
904411	V4-042 C1	.7
904413	V4-042 C2	.7
LTF	V4-050	32.43
904611	V4-062 C	.21
209019	VIK1 IPP	3.47
228700	VNLD 10	4.25
900801	W1-001	2.9
901051	W1-021 C	1.41
901061	W1-022 C	1.41
901071	W1-023 C	1.41
901141	W1-048 C	.35
901191	W1-068 C	1.41
901241	W1-076 C	.73
901281	W1-085 C	1.41
901291	W1-086 C	1.41
901301	W1-087 C	1.41
901311	W1-088 C	1.41
901321	W1-089 C	1.26
901331	W1-090 C OP1	1.26
901391	W1-108	2.39
901461	W1-117 C	1.41
901471	W1-118 C	1.41
901541	W1-127 C	.22

Bus Number	Bus Name	Full Contribution
901561	W1-130 C	.7
902161	W2-010	.16
902171	W2-011	.16
902211	W2-019 C	.43
902251	W2-023	120.54
902271	W2-028	.94
902281	W2-029	.94
902301	W2-035 C	1.11
902321	W2-039	11.65
902341	W2-047 C	.67
902621	W2-101 C	1.41
903251	W3-009 C	.7
903271	W3-022 C OP1	4.06
903311	W3-028 C	8.47
903381	W3-033	1.39
903391	W3-039 C	.5
903471	W3-048	9.12
903501	W3-058 C	.7
903891	W3-157 C	.12
903951	W3-174	35.72
903961	W3-175	68.48
905091	W4-009 OP1	139.24
905131	W4-015 C	25.16
905141	W4-016	62.9
905161	W4-018 C	.7
905181	W4-021	141.37
905211	W4-025 C	.49
905221	W4-027 C	.56
905291	W4-038 OP1	4.65
905301	W4-040 C	.68
905331	W4-045 C	.64
905391	W4-063 C	.12
209021	WEST IPP	.15
208948	WILL CT	.13
907091	X1-013 OP1	175.11

Bus Number	Bus Name	Full Contribution
907241	X1-068	1.92
907281	X1-073 C OP1	.89
907291	X1-074	5.74
907351	X1-085 C	.36
907381	X1-094 C	1.25
907451	X1-108	6.49
909021	X2-012 C	159.82
909081	X2-025	92.53
909091	X2-027 C OP1	.14
909101	X2-028 C OP1	.21
909171	X2-050	127.85
910531	X3-004	6.78
910551	X3-006 C	20.59
910701	X3-044	2.73
910931	X3-085 C	.58
912071	X4-009 C	1.45
912091	X4-012 C OP1	.44
912101	X4-015 C	.36
912111	X4-016	1.94
912131	X4-019	50.49
912141	X4-020	143.53
912151	X4-021	57.41
912171	X4-027-CT1	2.12
912172	X4-027-CT2	2.12
912173	X4-027-CT3	2.12
912191	X4-032 C	.75
912261	X4-044 C	1.91
912291	X4-048 OP1	193.95
913131	Y1-020 C	.72
913171	Y1-025 C OP1	139.24
913181	Y1-026	30.89
913221	Y1-031 C OP1	2.55
913351	Y1-056	3.45
913361	Y1-057 C	.02
913481	Y1-072 C	.15

Bus Number	Bus Name	Full Contribution
913511	Y1-077	13.54
913561	Y1-084 C OP1	.15
914021	Y2-013 OP1	154.43
914031	Y2-015 OP1	72.94
914041	Y2-018 C	.14
914051	Y2-037 C	.24
914091	Y2-051 C	.36
914101	Y2-052	14.62
914171	Y2-061 C	1.45
914191	Y2-063 OP1	72.94

Table 9

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.03
208941	FISH CT	.1
208981	FOWH IPP	.2
208982	GLBT IPP	.28
212174	INGE	.04
209004	KOPP IPP	.03
212265	LOR1_N14_C	.02
212266	LOR1_N14_E	3.26
209020	LOR2_Q27 C	.07
209027	LOR2_Q27 E	12.14
295223	Q-028 C	.68
295230	Q-028 E	27.6
212384	R-043	.61
212386	R-043	2.43
290673	S-042 C	.73
290674	S-042 E	2.93
209013	SCEN IPP	.3
209017	SUNBIPP4	.91
901431	W1-114 C	.
901432	W1-114 E	.28
901441	W1-115 C	.

Bus Number	Bus Name	Full Contribution
901442	W1-115 E	.28
903271	W3-022 C OP1	3.47
903272	W3-022 E OP1	23.21
209021	WEST IPP	.15
209022	WHFR IPP	.15
208948	WILL CT	.1
909021	X2-012 C	116.75
909081	X2-025	129.48
912131	X4-019	70.66
914031	Y2-015 OP1	62.25
914051	Y2-037 C	.17
914052	Y2-037 E	.28
914191	Y2-063 OP1	62.25

Table 10

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.02
208941	FISH CT	.11
208981	FOWH IPP	.14
208982	GLBT IPP	.32
208943	HARW CT	.08
212174	INGE	.03
292590	L-018 E	1.13
212265	LOR1_N14_C	.02
212266	LOR1_N14_E	3.67
209020	LOR2_Q27 C	.08
209027	LOR2_Q27 E	13.64
209006	NEPC IPP	.14
295223	Q-028 C	.47
295230	Q-028 E	19.11
212384	R-043	.68
212386	R-043	2.73
290673	S-042 C	.5
290674	S-042 E	2.02

Bus Number	Bus Name	Full Contribution
209013	SCEN IPP	.33
889011	U2-015 C	1.57
889012	U2-015 E	10.49
291937	U4-014 E	.55
293413	V3-040 E	.55
209019	VIKI IPP	1.41
901602	W1-111 E	2.32
901431	W1-114 C	.
901432	W1-114 E	.32
901441	W1-115 C	.
901442	W1-115 E	.32
903271	W3-022 C OP1	3.03
903272	W3-022 E OP1	20.28
209021	WEST IPP	.1
209022	WHFR IPP	.17
209023	WIENIPP1	.16
209025	WIENIPP3	.16
209026	WIENIPP4	.08
909021	X2-012 C	72.11
910782	X3-056 E	4.04
912291	X4-048 OP1	27.16
914031	Y2-015 OP1	54.38
914051	Y2-037 C	.19
914052	Y2-037 E	.32
914191	Y2-063 OP1	54.38

Table 11

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.03
208941	FISH CT	.15
208981	FOWH IPP	.18
208982	GLBT IPP	.45
212174	INGE	.03
212265	LOR1_N14_C	.03

Bus Number	Bus Name	Full Contribution
212266	LOR1_N14_E	5.13
209020	LOR2_Q27 C	.11
209027	LOR2_Q27 E	19.08
295223	Q-028 C	.63
295230	Q-028 E	25.59
212384	R-043	.95
212386	R-043	3.82
290673	S-042 C	.68
290674	S-042 E	2.7
209013	SCEN IPP	.47
209019	VIKI IPP	1.49
901602	W1-111 E	1.
901431	W1-114 C	.01
901432	W1-114 E	.44
901441	W1-115 C	.01
901442	W1-115 E	.44
903271	W3-022 C OP1	4.16
903272	W3-022 E OP1	27.82
209021	WEST IPP	.14
209022	WHFR IPP	.23
909021	X2-012 C	72.98
914031	Y2-015 OP1	74.62
914051	Y2-037 C	.27
914052	Y2-037 E	.44
914191	Y2-063 OP1	74.62

Table 12

Bus Number	Bus Name	Full Contribution
212266	LOR1_N14_E	1.41
209027	LOR2_Q27 E	5.23
295230	Q-028 E	8.94
212384	R-043	.26
212386	R-043	1.05
290673	S-042 C	.24

Bus Number	Bus Name	Full Contribution
290674	S-042 E	.95
208918	SUSQ 1	3.93
889011	U2-015 C	1.38
889012	U2-015 E	9.27
209019	VIKI IPP	1.18
901602	W1-111 E	1.69
901432	W1-114 E	.12
901442	W1-115 E	.12
903271	W3-022 C OP1	1.28
903272	W3-022 E OP1	8.55
909021	X2-012 C	68.33
910782	X3-056 E	6.86
914031	Y2-015 OP1	22.93
914051	Y2-037 C	.07
914052	Y2-037 E	.12
914191	Y2-063 OP1	22.93

Table 13

Bus Number	Bus Name	Full Contribution
208943	HARW CT	.08
212266	LOR1_N14_E	1.79
209027	LOR2_Q27 E	6.66
209006	NEPC IPP	.16
295230	Q-028 E	11.11
212384	R-043	.33
212386	R-043	1.33
290673	S-042 C	.29
290674	S-042 E	1.18
208918	SUSQ 1	5.11
889011	U2-015 C	1.85
889012	U2-015 E	12.35
209019	VIKI IPP	1.45
901602	W1-111 E	2.5
901432	W1-114 E	.15

Bus Number	Bus Name	Full Contribution
901442	W1-115 E	.15
903271	W3-022 C OP1	1.61
903272	W3-022 E OP1	10.76
209023	WIENIPP1	.18
209025	WIENIPP3	.18
209026	WIENIPP4	.09
909021	X2-012 C	84.78
910782	X3-056 E	8.92
914031	Y2-015 OP1	28.85
914051	Y2-037 C	.09
914052	Y2-037 E	.15
914191	Y2-063 OP1	28.85

Table 14

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.04
208941	FISH CT	.21
208981	FOWH IPP	.25
208982	GLBT IPP	.61
212174	INGE	.05
209004	KOPP IPP	.02
208945	LOHA CT	.04
212265	LOR1_N14_C	.04
209027	LOR2_Q27 E	26.3
208911	MONT G1	1.99
208912	MONT G2	2.03
295223	Q-028 C	.85
212384	R-043	1.32
212386	R-043	5.26
290673	S-042 C	.92
209013	SCEN IPP	.64
212449	SUNB CT	.01
209018	SUNBIPCT	.09
209014	SUNBIPP1	.2

Bus Number	Bus Name	Full Contribution
209015	SUNBIPP2	.2
209016	SUNBIPP3	.23
209017	SUNBIPP4	.29
893121	V2-027	.
209019	VIKI IPP	1.82
901431	W1-114 C	.01
901441	W1-115 C	.01
903271	W3-022 C OP1	5.69
209021	WEST IPP	.19
209022	WHFR IPP	.32
208948	WILL CT	.07
909021	X2-012 C	87.11
914031	Y2-015 OP1	102.16
914051	Y2-037 C	.37
914191	Y2-063 OP1	102.16

Table 15

Bus Number	Bus Name	Full Contribution
901602	W1-111 E	1.57
903271	W3-022 C OP1	.34
903272	W3-022 E OP1	2.24
909021	X2-012 C	14.35
914031	Y2-015 OP1	6.02
914191	Y2-063 OP1	6.02

Table 16

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.22
217006	BERGN26A	1.11
217078	ESSEX 12	9.72
206617	EXXON	.36
206331	GG A1&2	2.09
206332	GG A3&4	2.09

Bus Number	Bus Name	Full Contribution
206333	GG B5&6	2.09
206334	GG B7&8	2.09
217081	HUDSON 1	18.97
217083	KEARNY11	6.89
217086	KRNY9&10	1.11
209003	KSTN IPP	.01
292590	L-018 E	1.98
212266	LOR1_N14_E	1.38
209027	LOR2_Q27 E	5.12
206679	M&M S721	.57
210888	MACRTR10	.28
200851	MEHOOP3	.48
294572	P-028 C	.24
294573	P-028 E	42.73
206638	PEAPACK	.21
204652	PORT1GEN	8.88
204653	PORT2GEN	14.04
295230	Q-028 E	8.57
290092	Q-041 E	1.63
212384	R-043	.26
212386	R-043	1.02
290673	S-042 C	.23
290674	S-042 E	.91
218360	SEWAREN1	5.23
218361	SEWAREN2	5.92
218362	SEWAREN3	5.37
218363	SEWAREN4	6.2
218364	SEWAREN6	5.55
889011	U2-015 C	.95
889012	U2-015 E	6.33
293093	U2-077	32.05
299906	U3-032 E	.69
291937	U4-014 E	.37
292095	V1-030 E1	.07
292111	V1-030 E9	.05

Bus Number	Bus Name	Full Contribution
292191	V1-030 EC	.24
292092	V1-030 ED	.14
297033	V2-010 E	.34
297069	V2-025 E	.16
293340	V3-005 E	.34
293413	V3-040 E	.37
293444	V3-065 E	.02
293440	V3-066 E	.01
293434	V3-067 E	.03
293429	V3-068 E	.01
904002	V4-001 E	.1
LTF	V4-050	5.86
209019	VIKI IPP	1.04
900801	W1-001	.76
901262	W1-082 E	.66
901342	W1-101 E	.05
901602	W1-111 E	1.47
901432	W1-114 E	.12
901442	W1-115 E	.12
901512	W1-122 E	.18
901541	W1-127 C	.06
901542	W1-127 E	.1
902251	W2-023	31.52
LTF	W2-033	3.9
902382	W2-052 E	.02
902532	W2-084 E	.35
902572	W2-091 E	.54
903271	W3-022 C OP1	1.24
903272	W3-022 E OP1	8.29
903332	W3-032 E	.27
903391	W3-039 C	.14
903392	W3-039 E	.92
903412	W3-044 E	.67
903562	W3-076 E	.67
903572	W3-077 E	.5

Bus Number	Bus Name	Full Contribution
903632	W3-095 E	.5
903672	W3-106 E	.34
903682	W3-110 E	.26
903742	W3-126 E	.6
903822	W3-139 E	.54
903832	W3-140 E	.28
903842	W3-145 E	.6
903852	W3-146 E	.37
903872	W3-154 E	.05
905091	W4-009 OP1	35.16
905122	W4-014 E	.57
905181	W4-021	35.14
905242	W4-031 E	.13
905291	W4-038 OP1	1.27
905342	W4-046 E	.34
905372	W4-059 E	.02
905402	W4-064 E	.11
905412	W4-065 E	.11
905422	W4-068 E	.27
905442	W4-073 E	.57
905452	W4-080 E	.63
905532	W4-093 E	.23
905542	W4-097 E	.1
209029	WAYM IPP	.02
209031	WAYMART E	6.77
907002	X1-005 E	.33
907012	X1-012 E	.35
907091	X1-013 OP1	27.57
907072	X1-034 E	.04
907152	X1-046 E	.28
907272	X1-072 E	.04
907281	X1-073 C OP1	.24
907282	X1-073 E OP1	.39
907332	X1-082 E	.41
907372	X1-088 E	.4

Bus Number	Bus Name	Full Contribution
907381	X1-094 C	.35
907382	X1-094 E	.58
907451	X1-108	1.87
907482	X1-114 E	.07
907492	X1-116 E	.25
909021	X2-012 C	51.37
909171	X2-050	34.88
909302	X2-087 E	.03
909322	X2-089 E	.09
909332	X2-099 E	.34
910522	X3-003 E	7.12
910531	X3-004	1.85
910582	X3-011 E	.17
910612	X3-029 E	.61
910762	X3-052 E	.16
910782	X3-056 E	3.81
910792	X3-057 E	3.23
910922	X3-083 E	.37
910931	X3-085 C	.16
910932	X3-085 E	.27
912062	X4-007 E	3.35
912091	X4-012 C OP1	.13
912092	X4-012 E OP1	.21
912111	X4-016	.53
912261	X4-044 C	.51
912262	X4-044 E	.92
912291	X4-048 OP1	117.88
913131	Y1-020 C	.21
913132	Y1-020 E	.47
913171	Y1-025 C OP1	35.16
913172	Y1-025 E OP1	2.91
913181	Y1-026	8.13
913221	Y1-031 C OP1	.7
913222	Y1-031 E OP1	5.36
913311	Y1-047 OP1	5.48

Bus Number	Bus Name	Full Contribution
913481	Y1-072 C	.04
913482	Y1-072 E	.06
913561	Y1-084 C OP1	.04
913562	Y1-084 E OP1	.07
914021	Y2-013 OP1	40.67
914031	Y2-015 OP1	22.24
914041	Y2-018 C	.04
914042	Y2-018 E	.07
914051	Y2-037 C	.07
914052	Y2-037 E	.12
914061	Y2-042	3.26
914161	Y2-060	1.25
914191	Y2-063 OP1	22.24

Table 17

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.08
208941	FISH CT	.32
208981	FOWH IPP	.52
208982	GLBT IPP	.94
212174	INGE	.1
209004	KOPP IPP	.08
292590	L-018 E	3.04
208945	LOHA CT	.15
212265	LOR1_N14_C	.06
212266	LOR1_N14_E	10.78
209020	LOR2_Q27 C	.23
209027	LOR2_Q27 E	40.12
295223	Q-028 C	1.78
295230	Q-028 E	72.49
212384	R-043	2.01
212386	R-043	8.02
290673	S-042 C	1.92
290674	S-042 E	7.68

Bus Number	Bus Name	Full Contribution
209013	SCEN IPP	.98
212449	SUNB CT	.08
209018	SUNBIPCT	.46
209014	SUNBIPP1	1.02
209015	SUNBIPP2	1.02
209016	SUNBIPP3	1.2
209017	SUNBIPP4	1.74
889011	U2-015 C	2.6
889012	U2-015 E	17.4
893121	V2-027	.02
209019	VIKI IPP	8.9
901602	W1-111 E	4.41
901431	W1-114 C	.01
901432	W1-114 E	.93
901441	W1-115 C	.01
901442	W1-115 E	.93
903271	W3-022 C OP1	10.09
903272	W3-022 E OP1	67.55
209021	WEST IPP	.39
209022	WHFR IPP	.49
208948	WILL CT	.3
909021	X2-012 C	341.14
910782	X3-056 E	10.63
912291	X4-048 OP1	84.6
914031	Y2-015 OP1	181.17
914051	Y2-037 C	.57
914052	Y2-037 E	.93
914191	Y2-063 OP1	181.17

Table 18

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.09
208941	FISH CT	.32
208981	FOWH IPP	.53

Bus Number	Bus Name	Full Contribution
208982	GLBT IPP	.95
212174	INGE	.1
209004	KOPP IPP	.09
292590	L-018 E	3.21
208945	LOHA CT	.16
212265	LOR1_N14_C	.06
212266	LOR1_N14_E	10.95
209020	LOR2_Q27 C	.23
209027	LOR2_Q27 E	40.73
295223	Q-028 C	1.8
295230	Q-028 E	73.48
212384	R-043	2.04
212386	R-043	8.15
290673	S-042 C	1.95
290674	S-042 E	7.79
209013	SCEN IPP	1.
212449	SUNB CT	.08
209018	SUNBIPCT	.46
209014	SUNBIPP1	1.03
209015	SUNBIPP2	1.03
209016	SUNBIPP3	1.21
209017	SUNBIPP4	1.76
889011	U2-015 C	2.85
889012	U2-015 E	19.08
893121	V2-027	.02
209019	VIKI IPP	9.02
901602	W1-111 E	4.76
901431	W1-114 C	.01
901432	W1-114 E	.95
901441	W1-115 C	.01
901442	W1-115 E	.95
903271	W3-022 C OP1	10.24
903272	W3-022 E OP1	68.52
209031	WAYMART E	6.13
209021	WEST IPP	.4

Bus Number	Bus Name	Full Contribution
209022	WHFR IPP	.5
208948	WILL CT	.31
909021	X2-012 C	347.51
910782	X3-056 E	11.2
912291	X4-048 OP1	88.61
914031	Y2-015 OP1	183.78
914051	Y2-037 C	.58
914052	Y2-037 E	.95
914191	Y2-063 OP1	183.78

Table 19

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.35
208972	BECKR K09	.01
217006	BERGN26A	1.18
212099	BRMO IPP	.01
217078	ESSEX 12	10.31
208941	FISH CT	.04
208981	FOWH IPP	.07
206331	GG A1&2	2.21
206332	GG A3&4	2.21
206333	GG B5&6	2.21
206334	GG B7&8	2.21
208982	GLBT IPP	.13
208943	HARW CT	.05
217081	HUDSON 1	20.12
234304	HUN GEN3	.06
234305	HUN GEN4	.09
234311	HUN GEN5	.1
234312	HUN GEN6	.1
212174	INGE	.01
208944	JENK CT	.06
217083	KEARNY11	7.3
209004	KOPP IPP	.01

Bus Number	Bus Name	Full Contribution
217086	KRNY9&10	1.18
209003	KSTN IPP	.01
292590	L-018 E	2.08
208945	LOHA CT	.02
212265	LOR1_N14_C	.01
209027	LOR2_Q27 E	5.41
208911	MONT G1	1.23
208912	MONT G2	1.26
209006	NEPC IPP	.09
209010	PEIP 1	.07
209009	PEIP 2	.12
204652	PORT1GEN	9.41
204653	PORT2GEN	14.85
295223	Q-028 C	.22
295952	R-011	22.57
212384	R-043	.27
212386	R-043	1.08
290673	S-042 C	.24
209013	SCEN IPP	.13
218360	SEWAREN1	5.56
218361	SEWAREN2	6.28
218362	SEWAREN3	5.7
218363	SEWAREN4	6.59
218364	SEWAREN6	5.89
204654	SHAW CT	.03
212449	SUNB CT	.01
209018	SUNBIPCT	.05
209014	SUNBIPP1	.12
209015	SUNBIPP2	.12
209016	SUNBIPP3	.14
208918	SUSQ 1	2.3
200038	SUSQ 2	1.96
889011	U2-015 C	1.
293093	U2-077	34.03
893121	V2-027	.

Bus Number	Bus Name	Full Contribution
LTF	V4-050	6.27
209019	VIK1 IPP	1.1
900801	W1-001	.81
901241	W1-076 C	.2
901431	W1-114 C	.
901441	W1-115 C	.
901541	W1-127 C	.07
902251	W2-023	33.47
LTF	W2-033	4.78
903271	W3-022 C OP1	1.31
903391	W3-039 C	.15
905091	W4-009 OP1	37.37
905181	W4-021	37.37
905291	W4-038 OP1	1.35
209029	WAYM IPP	.02
209021	WEST IPP	.05
209022	WHFR IPP	.07
209023	WIENIPP1	.1
209025	WIENIPP3	.11
209026	WIENIPP4	.05
208948	WILL CT	.04
208920	WLPK	.09
907241	X1-068	.51
907281	X1-073 C OP1	.26
907381	X1-094 C	.37
907451	X1-108	1.98
909021	X2-012 C	54.21
909081	X2-025	21.49
909171	X2-050	36.99
910531	X3-004	1.96
910931	X3-085 C	.17
912091	X4-012 C OP1	.14
912111	X4-016	.56
912131	X4-019	11.72
912261	X4-044 C	.54

Bus Number	Bus Name	Full Contribution
912291	X4-048 OP1	123.19
913131	Y1-020 C	.22
913171	Y1-025 C OP1	37.37
913181	Y1-026	8.64
913221	Y1-031 C OP1	.74
913481	Y1-072 C	.04
913561	Y1-084 C OP1	.05
914021	Y2-013 OP1	43.18
914031	Y2-015 OP1	23.49
914041	Y2-018 C	.04
914051	Y2-037 C	.08
914061	Y2-042	1.36
914191	Y2-063 OP1	23.49

Table 20

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.83
208972	BECK K09	.01
217006	BERGN26A	1.41
219103	BURLNGT8	1.05
219124	BURLNGT9	9.21
228000	CEDR#1CT	2.45
228001	CEDR#2CT	1.18
217078	ESSEX 12	12.4
206331	GG A1&2	2.67
206332	GG A3&4	2.67
206333	GG B5&6	2.67
206334	GG B7&8	2.67
208943	HARW CT	.07
217081	HUDSON 1	24.19
234304	HUN GEN3	.08
234305	HUN GEN4	.12
234311	HUN GEN5	.13
234312	HUN GEN6	.13

Bus Number	Bus Name	Full Contribution
208944	JENK CT	.08
217083	KEARNY11	8.78
209004	KOPP IPP	.02
217086	KRNY9&10	1.41
209003	KSTN IPP	.02
292590	L-018 E	2.61
208945	LOHA CT	.03
209027	LOR2_Q27 E	7.82
227807	MO AV B	1.01
208911	MONT G1	1.79
208912	MONT G2	1.83
209006	NEPC IPP	.12
209010	PEIP 1	.08
209009	PEIP 2	.14
204652	PORT1GEN	11.48
204653	PORT2GEN	18.18
295952	R-011	26.77
212384	R-043	.39
212386	R-043	1.56
290673	S-042 C	.36
218360	SEWAREN1	6.63
218361	SEWAREN2	7.5
218362	SEWAREN3	6.8
218363	SEWAREN4	7.85
218364	SEWAREN6	7.02
212449	SUNB CT	.01
209018	SUNBIPCT	.08
209014	SUNBIPP1	.19
209015	SUNBIPP2	.19
209016	SUNBIPP3	.22
208918	SUSQ 1	3.08
292815	U1-056 C	2.29
889011	U2-015 C	1.32
292966	U2-045 C	.13
293093	U2-077	40.69

Bus Number	Bus Name	Full Contribution
893121	V2-027	.
LTF	V4-050	7.12
209019	VIKI IPP	1.68
900801	W1-001	.97
901241	W1-076 C	.23
901541	W1-127 C	.08
902211	W2-019 C	.13
902251	W2-023	39.97
LTF	W2-033	4.37
903271	W3-022 C OP1	1.92
903311	W3-028 C	2.43
903381	W3-033	.38
903391	W3-039 C	.18
905091	W4-009 OP1	44.36
905181	W4-021	44.23
905211	W4-025 C	.14
905291	W4-038 OP1	1.62
905331	W4-045 C	.19
905391	W4-063 C	.03
209029	WAYM IPP	.03
209023	WIENIPP1	.14
209025	WIENIPP3	.14
209026	WIENIPP4	.07
208948	WILL CT	.07
208920	WLPK	.11
907091	X1-013 OP1	31.41
907241	X1-068	.61
907281	X1-073 C OP1	.31
907351	X1-085 C	.11
907381	X1-094 C	.45
907451	X1-108	2.44
909021	X2-012 C	79.31
909081	X2-025	42.02
909171	X2-050	44.47
910531	X3-004	2.36

Bus Number	Bus Name	Full Contribution
910931	X3-085 C	.21
912091	X4-012 C OP1	.17
912101	X4-015 C	.1
912111	X4-016	.67
912131	X4-019	22.93
912261	X4-044 C	.65
912291	X4-048 OP1	147.93
913131	Y1-020 C	.27
913171	Y1-025 C OP1	44.36
913181	Y1-026	10.32
913221	Y1-031 C OP1	.89
913481	Y1-072 C	.05
913561	Y1-084 C OP1	.06
914021	Y2-013 OP1	51.61
914031	Y2-015 OP1	34.49
914041	Y2-018 C	.05
914051	Y2-037 C	.11
914091	Y2-051 C	.11
914191	Y2-063 OP1	34.49

Table 21

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.08
208981	FOWH IPP	.49
212174	INGE	.09
209027	LOR2_Q27 E	-23.8
295223	Q-028 C	1.67
290673	S-042 C	1.8
212449	SUNB CT	.01
209018	SUNBIPCT	.05
209014	SUNBIPP1	.1
209015	SUNBIPP2	.1
209016	SUNBIPP3	.12
209017	SUNBIPP4	.25

Bus Number	Bus Name	Full Contribution
903271	W3-022 C OP1	11.7
209021	WEST IPP	.37
914031	Y2-015 OP1	209.94
914191	Y2-063 OP1	209.94

Table 22

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.05
208941	FISH CT	.26
208981	FOWH IPP	.34
208982	GLBT IPP	.76
212174	INGE	.06
209004	KOPP IPP	.04
208945	LOHA CT	.07
212265	LOR1_N14_C	.05
209027	LOR2_Q27 E	32.62
295223	Q-028 C	1.16
212384	R-043	1.63
212386	R-043	6.52
290673	S-042 C	1.25
209013	SCEN IPP	.8
212449	SUNB CT	.03
209018	SUNBIPCT	.18
209014	SUNBIPP1	.4
209015	SUNBIPP2	.4
209016	SUNBIPP3	.47
209017	SUNBIPP4	.64
893121	V2-027	.01
209019	VIKI IPP	3.57
901431	W1-114 C	.01
901441	W1-115 C	.01
903271	W3-022 C OP1	7.36
209021	WEST IPP	.26
209022	WHFR IPP	.4

Bus Number	Bus Name	Full Contribution
208948	WILL CT	.13
909021	X2-012 C	152.97
909081	X2-025	91.53
912131	X4-019	49.95
914031	Y2-015 OP1	132.1
914051	Y2-037 C	.46
914191	Y2-063 OP1	132.1

Table 23

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.16
208941	FISH CT	.22
208981	FOWH IPP	.97
208982	GLBT IPP	.64
212174	INGE	.18
212265	LOR1_N14_C	.04
209027	LOR2_Q27 E	27.58
295223	Q-028 C	3.31
212384	R-043	1.38
212386	R-043	5.52
290673	S-042 C	3.58
209013	SCEN IPP	.67
901431	W1-114 C	.01
901441	W1-115 C	.01
903271	W3-022 C OP1	19.39
209021	WEST IPP	.74
209022	WHFR IPP	.34
914031	Y2-015 OP1	348.07
914051	Y2-037 C	.39
914191	Y2-063 OP1	348.07

Table 24

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.83
208972	BECR K09	.01
217006	BERGN26A	1.42
219103	BURLNGT8	.7
219124	BURLNGT9	6.11
228000	CEDR#1CT	2.46
228001	CEDR#2CT	1.18
217078	ESSEX 12	12.41
206617	EXXON	.46
206331	GG A1&2	2.67
206332	GG A3&4	2.67
206333	GG B5&6	2.67
206334	GG B7&8	2.67
217081	HUDSON 1	24.22
234304	HUN GEN3	.08
234305	HUN GEN4	.12
234311	HUN GEN5	.13
234312	HUN GEN6	.13
208944	JENK CT	.08
217083	KEARNY11	8.79
217086	KRNY9&10	1.42
209003	KSTN IPP	.02
292590	L-018 E	2.61
212266	LOR1_N14_E	2.1
209027	LOR2_Q27 E	7.83
206679	M&M S721	.74
210888	MACRTR10	.37
227807	MO AV B	1.01
206638	PEAPACK	.27
209010	PEIP 1	.08
209009	PEIP 2	.14
204652	PORT1GEN	11.49

Bus Number	Bus Name	Full Contribution
204653	PORT2GEN	18.19
295230	Q-028 E	13.51
290092	Q-041 E	2.08
295952	R-011	26.8
212384	R-043	.39
212386	R-043	1.57
290673	S-042 C	.36
290674	S-042 E	1.43
218360	SEWAREN1	6.64
218361	SEWAREN2	7.51
218362	SEWAREN3	6.81
218363	SEWAREN4	7.86
218364	SEWAREN6	7.03
208918	SUSQ 1	3.08
292815	U1-056 C	2.29
292816	U1-056 E	15.33
889011	U2-015 C	1.32
889012	U2-015 E	8.86
292966	U2-045 C	.13
292967	U2-045 E	.88
293093	U2-077	40.74
299906	U3-032 E	.87
291937	U4-014 E	.5
292095	V1-030 E1	.09
292185	V1-030 E2	.24
292099	V1-030 E3	.05
292101	V1-030 E4	.05
292103	V1-030 E5	.14
292107	V1-030 E7	.04
292087	V1-030 E8	.05
292111	V1-030 E9	.06
292189	V1-030 EA	.29
292191	V1-030 EC	.31
292092	V1-030 ED	.18
297021	V2-009 E1	.09

Bus Number	Bus Name	Full Contribution
297023	V2-009 E2	.18
297025	V2-009 E3	.23
297027	V2-009 E4	.13
297033	V2-010 E	.43
297039	V2-013 E	.02
297069	V2-025 E	.21
293340	V3-005 E	.43
293378	V3-024 E	.18
293413	V3-040 E	.5
292666	V3-058 E	.12
292668	V3-059 E	.12
293444	V3-065 E	.02
293440	V3-066 E	.02
293434	V3-067 E	.03
293429	V3-068 E	.02
292681	V3-069 E	.08
292683	V3-070 E	.31
904002	V4-001 E	.13
904042	V4-005 E	.09
LTF	V4-050	7.12
900462	V4-067 E	.08
904682	V4-069 E	.11
904692	V4-070 E	.11
209019	VIKI IPP	1.69
900801	W1-001	.97
901082	W1-024 E	.14
901102	W1-032 E	.11
901241	W1-076 C	.23
901242	W1-076 E	.38
901262	W1-082 E	.85
901342	W1-101 E	.06
901602	W1-111 E	2.06
901422	W1-113 E	.29
901432	W1-114 E	.18
901442	W1-115 E	.18

Bus Number	Bus Name	Full Contribution
901482	W1-119 E	.61
901492	W1-120 E	.68
901502	W1-121 E	.28
901512	W1-122 E	.23
901522	W1-124 E	.62
901541	W1-127 C	.08
901542	W1-127 E	.13
901552	W1-129 E	.17
901572	W1-132 E	.12
902192	W2-016 E	.59
902211	W2-019 C	.13
902212	W2-019 E	.2
902251	W2-023	40.02
902292	W2-030 E	.31
LTF	W2-033	4.37
902312	W2-036 E	.03
902372	W2-050 E	.61
902382	W2-052 E	.03
902392	W2-056 E	.34
902412	W2-060 E	.62
902422	W2-061 E	.11
902452	W2-074 E	.06
902472	W2-076 E	.07
902482	W2-078 E	.33
902522	W2-083 E	.67
902532	W2-084 E	.45
902542	W2-085 E	.38
902552	W2-088 E	.61
902562	W2-090 E	.62
902572	W2-091 E	.7
902632	W2-102 E	.22
903222	W3-003 E	.62
903271	W3-022 C OP1	1.92
903272	W3-022 E OP1	12.87
903292	W3-025 E	.11

Bus Number	Bus Name	Full Contribution
903302	W3-026 E	.16
903311	W3-028 C	2.43
903312	W3-028 E	16.39
903322	W3-029 E	.65
903332	W3-032 E	.35
903381	W3-033	.38
903391	W3-039 C	.18
903392	W3-039 E	1.17
903402	W3-041 E	.31
903412	W3-044 E	.87
903422	W3-045 E	.11
903492	W3-057 E	.63
903562	W3-076 E	.87
903572	W3-077 E	.65
903582	W3-078 E	.47
903592	W3-079 E	.5
903602	W3-080 E	.62
903632	W3-095 E	.65
903672	W3-106 E	.44
903682	W3-110 E	.33
903722	W3-120 E	.58
903732	W3-124 E	.09
903742	W3-126 E	.77
903822	W3-139 E	.7
903832	W3-140 E	.36
903842	W3-145 E	.78
903852	W3-146 E	.47
903862	W3-149 E	.67
903872	W3-154 E	.07
903902	W3-158 E	.27
903912	W3-159 E	.42
905091	W4-009 OP1	44.42
905112	W4-011 E	.53
905122	W4-014 E	.74
905181	W4-021	44.29

Bus Number	Bus Name	Full Contribution
905211	W4-025 C	.14
905212	W4-025 E	.24
905242	W4-031 E	.17
905291	W4-038 OP1	1.62
905331	W4-045 C	.19
905332	W4-045 E	.31
905342	W4-046 E	.43
905352	W4-053 E	.12
905362	W4-058 E	.02
905372	W4-059 E	.03
905391	W4-063 C	.03
905392	W4-063 E	.22
905402	W4-064 E	.14
905412	W4-065 E	.14
905422	W4-068 E	.35
905432	W4-072 E	.58
905442	W4-073 E	.73
905452	W4-080 E	.79
905532	W4-093 E	.29
905542	W4-097 E	.13
905562	W4-103 E	.22
209029	WAYM IPP	.03
209031	WAYMART E	8.59
208920	WLPK	.11
907002	X1-005 E	.43
907012	X1-012 E	.45
907072	X1-034 E	.05
907082	X1-037 E	.61
907132	X1-043 E	.1
907152	X1-046 E	.36
907162	X1-049 E	.12
907202	X1-054 E	.31
907222	X1-066 E	.05
907241	X1-068	.61
907272	X1-072 E	.05

Bus Number	Bus Name	Full Contribution
907281	X1-073 C OP1	.31
907282	X1-073 E OP1	.51
907332	X1-082 E	.52
907351	X1-085 C	.11
907352	X1-085 E	.17
907372	X1-088 E	.51
907381	X1-094 C	.45
907382	X1-094 E	.75
907451	X1-108	2.44
907482	X1-114 E	.09
907492	X1-116 E	.32
909021	X2-012 C	79.37
909081	X2-025	42.05
909122	X2-033 E	.11
909171	X2-050	44.52
909192	X2-054 E	.62
909212	X2-059 E	.35
909252	X2-075 E	.23
909302	X2-087 E	.04
909312	X2-088 E	.09
909322	X2-089 E	.11
909332	X2-099 E	.44
910531	X3-004	2.36
910562	X3-007 E	.11
910582	X3-011 E	.22
910612	X3-029 E	.79
910692	X3-043 E	.37
910762	X3-052 E	.2
910782	X3-056 E	5.38
910792	X3-057 E	4.73
910922	X3-083 E	.47
910931	X3-085 C	.21
910932	X3-085 E	.35
912042	X4-005 E	3.68
912062	X4-007 E	4.3

Bus Number	Bus Name	Full Contribution
912091	X4-012 C OP1	.17
912092	X4-012 E OP1	.27
912101	X4-015 C	.1
912102	X4-015 E	.17
912111	X4-016	.67
912131	X4-019	22.94
912182	X4-031 E	.12
912261	X4-044 C	.65
912262	X4-044 E	1.18
912291	X4-048 OP1	147.99
913131	Y1-020 C	.27
913132	Y1-020 E	.61
913171	Y1-025 C OP1	44.42
913172	Y1-025 E OP1	3.68
913181	Y1-026	10.33
913221	Y1-031 C OP1	.89
913222	Y1-031 E OP1	6.85
913481	Y1-072 C	.05
913482	Y1-072 E	.08
913561	Y1-084 C OP1	.06
913562	Y1-084 E OP1	.09
914021	Y2-013 OP1	51.67
914031	Y2-015 OP1	34.51
914041	Y2-018 C	.05
914042	Y2-018 E	.08
914051	Y2-037 C	.11
914052	Y2-037 E	.18
914091	Y2-051 C	.11
914092	Y2-051 E	.18
914191	Y2-063 OP1	34.51

Table 25

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.83

Bus Number	Bus Name	Full Contribution
208972	BECK K09	.01
217006	BERGN26A	1.42
219103	BURLNGT8	.7
219124	BURLNGT9	6.11
228000	CEDR#1CT	2.46
228001	CEDR#2CT	1.18
217078	ESSEX 12	12.41
206617	EXXON	.46
206331	GG A1&2	2.67
206332	GG A3&4	2.67
206333	GG B5&6	2.67
206334	GG B7&8	2.67
217081	HUDSON 1	24.22
234304	HUN GEN3	.08
234305	HUN GEN4	.12
234311	HUN GEN5	.13
234312	HUN GEN6	.13
208944	JENK CT	.08
217083	KEARNY11	8.79
217086	KRNY9&10	1.42
209003	KSTN IPP	.02
292590	L-018 E	2.61
212266	LOR1_N14_E	2.1
209027	LOR2_Q27 E	7.83
206679	M&M S721	.74
210888	MACRTR10	.37
227807	MO AV B	1.01
206638	PEAPACK	.27
209010	PEIP 1	.08
209009	PEIP 2	.14
204652	PORT1GEN	11.49
204653	PORT2GEN	18.19
295230	Q-028 E	13.51
290092	Q-041 E	2.08
295952	R-011	26.81

Bus Number	Bus Name	Full Contribution
212384	R-043	.39
212386	R-043	1.57
290673	S-042 C	.36
290674	S-042 E	1.43
218360	SEWAREN1	6.64
218361	SEWAREN2	7.51
218362	SEWAREN3	6.81
218363	SEWAREN4	7.86
218364	SEWAREN6	7.03
208918	SUSQ 1	3.08
292815	U1-056 C	2.29
292816	U1-056 E	15.33
889011	U2-015 C	1.32
889012	U2-015 E	8.86
292966	U2-045 C	.13
292967	U2-045 E	.88
293093	U2-077	40.74
299906	U3-032 E	.87
291937	U4-014 E	.5
292095	V1-030 E1	.09
292185	V1-030 E2	.24
292099	V1-030 E3	.05
292101	V1-030 E4	.05
292103	V1-030 E5	.14
292107	V1-030 E7	.04
292087	V1-030 E8	.05
292111	V1-030 E9	.06
292189	V1-030 EA	.29
292191	V1-030 EC	.31
292092	V1-030 ED	.18
297021	V2-009 E1	.09
297023	V2-009 E2	.18
297025	V2-009 E3	.23
297027	V2-009 E4	.13
297033	V2-010 E	.43

Bus Number	Bus Name	Full Contribution
297039	V2-013 E	.02
297069	V2-025 E	.21
293340	V3-005 E	.43
293378	V3-024 E	.18
293413	V3-040 E	.5
292666	V3-058 E	.12
292668	V3-059 E	.12
293444	V3-065 E	.02
293440	V3-066 E	.02
293434	V3-067 E	.03
293429	V3-068 E	.02
292681	V3-069 E	.08
292683	V3-070 E	.31
904002	V4-001 E	.13
904042	V4-005 E	.09
LTF	V4-050	7.12
900462	V4-067 E	.08
904682	V4-069 E	.11
904692	V4-070 E	.11
209019	VIKI IPP	1.69
900801	W1-001	.97
901082	W1-024 E	.14
901102	W1-032 E	.11
901241	W1-076 C	.23
901242	W1-076 E	.38
901262	W1-082 E	.85
901342	W1-101 E	.06
901602	W1-111 E	2.06
901422	W1-113 E	.29
901432	W1-114 E	.18
901442	W1-115 E	.18
901482	W1-119 E	.61
901492	W1-120 E	.68
901502	W1-121 E	.28
901512	W1-122 E	.23

Bus Number	Bus Name	Full Contribution
901522	W1-124 E	.62
901541	W1-127 C	.08
901542	W1-127 E	.13
901552	W1-129 E	.17
901572	W1-132 E	.12
902192	W2-016 E	.59
902211	W2-019 C	.13
902212	W2-019 E	.2
902251	W2-023	40.02
902292	W2-030 E	.31
LTF	W2-033	4.37
902312	W2-036 E	.03
902372	W2-050 E	.61
902382	W2-052 E	.03
902392	W2-056 E	.34
902412	W2-060 E	.62
902422	W2-061 E	.11
902452	W2-074 E	.06
902472	W2-076 E	.07
902482	W2-078 E	.33
902522	W2-083 E	.67
902532	W2-084 E	.45
902542	W2-085 E	.38
902552	W2-088 E	.61
902562	W2-090 E	.62
902572	W2-091 E	.7
902632	W2-102 E	.22
903222	W3-003 E	.62
903271	W3-022 C OP1	1.92
903272	W3-022 E OP1	12.87
903292	W3-025 E	.11
903302	W3-026 E	.16
903311	W3-028 C	2.43
903312	W3-028 E	16.39
903322	W3-029 E	.65

Bus Number	Bus Name	Full Contribution
903332	W3-032 E	.35
903381	W3-033	.38
903391	W3-039 C	.18
903392	W3-039 E	1.17
903402	W3-041 E	.31
903412	W3-044 E	.87
903422	W3-045 E	.11
903492	W3-057 E	.63
903562	W3-076 E	.87
903572	W3-077 E	.65
903582	W3-078 E	.47
903592	W3-079 E	.5
903602	W3-080 E	.62
903632	W3-095 E	.65
903672	W3-106 E	.44
903682	W3-110 E	.33
903722	W3-120 E	.58
903732	W3-124 E	.09
903742	W3-126 E	.77
903822	W3-139 E	.7
903832	W3-140 E	.36
903842	W3-145 E	.78
903852	W3-146 E	.47
903862	W3-149 E	.67
903872	W3-154 E	.07
903902	W3-158 E	.27
903912	W3-159 E	.42
905091	W4-009 OP1	44.42
905112	W4-011 E	.53
905122	W4-014 E	.74
905181	W4-021	44.29
905211	W4-025 C	.14
905212	W4-025 E	.24
905242	W4-031 E	.17
905291	W4-038 OP1	1.62

Bus Number	Bus Name	Full Contribution
905331	W4-045 C	.19
905332	W4-045 E	.31
905342	W4-046 E	.43
905352	W4-053 E	.12
905362	W4-058 E	.02
905372	W4-059 E	.03
905391	W4-063 C	.03
905392	W4-063 E	.22
905402	W4-064 E	.14
905412	W4-065 E	.14
905422	W4-068 E	.35
905432	W4-072 E	.58
905442	W4-073 E	.73
905452	W4-080 E	.79
905532	W4-093 E	.29
905542	W4-097 E	.13
905562	W4-103 E	.22
209029	WAYM IPP	.03
209031	WAYMART E	8.59
208920	WLPK	.11
907002	X1-005 E	.43
907012	X1-012 E	.45
907072	X1-034 E	.05
907082	X1-037 E	.61
907132	X1-043 E	.1
907152	X1-046 E	.36
907162	X1-049 E	.12
907202	X1-054 E	.31
907222	X1-066 E	.05
907241	X1-068	.61
907272	X1-072 E	.05
907281	X1-073 C OP1	.31
907282	X1-073 E OP1	.51
907332	X1-082 E	.52
907351	X1-085 C	.11

Bus Number	Bus Name	Full Contribution
907352	X1-085 E	.17
907372	X1-088 E	.51
907381	X1-094 C	.45
907382	X1-094 E	.75
907451	X1-108	2.44
907482	X1-114 E	.09
907492	X1-116 E	.32
909021	X2-012 C	79.37
909081	X2-025	42.05
909122	X2-033 E	.11
909171	X2-050	44.52
909192	X2-054 E	.62
909212	X2-059 E	.35
909252	X2-075 E	.23
909302	X2-087 E	.04
909312	X2-088 E	.09
909322	X2-089 E	.11
909332	X2-099 E	.44
910531	X3-004	2.36
910562	X3-007 E	.11
910582	X3-011 E	.22
910612	X3-029 E	.79
910692	X3-043 E	.37
910762	X3-052 E	.2
910782	X3-056 E	5.38
910792	X3-057 E	4.73
910922	X3-083 E	.47
910931	X3-085 C	.21
910932	X3-085 E	.35
912042	X4-005 E	3.68
912062	X4-007 E	4.3
912091	X4-012 C OP1	.17
912092	X4-012 E OP1	.27
912101	X4-015 C	.1
912102	X4-015 E	.17

Bus Number	Bus Name	Full Contribution
912111	X4-016	.67
912131	X4-019	22.94
912182	X4-031 E	.12
912261	X4-044 C	.65
912262	X4-044 E	1.18
912291	X4-048 OP1	147.99
913131	Y1-020 C	.27
913132	Y1-020 E	.61
913171	Y1-025 C OP1	44.42
913172	Y1-025 E OP1	3.68
913181	Y1-026	10.34
913221	Y1-031 C OP1	.89
913222	Y1-031 E OP1	6.85
913481	Y1-072 C	.05
913482	Y1-072 E	.08
913561	Y1-084 C OP1	.06
913562	Y1-084 E OP1	.09
914021	Y2-013 OP1	51.68
914031	Y2-015 OP1	34.51
914041	Y2-018 C	.05
914042	Y2-018 E	.08
914051	Y2-037 C	.11
914052	Y2-037 E	.18
914091	Y2-051 C	.11
914092	Y2-051 E	.18
914191	Y2-063 OP1	34.51

Table 26

Bus Number	Bus Name	Full Contribution
204662	AES GEN1	.61
204663	AES GEN2	.61
204664	AES GEN3	.6
216908	BAYONNE	2.33
217006	BERGN26A	1.17

Bus Number	Bus Name	Full Contribution
207922	BRIS	.02
208900	BRIS G1	.93
208901	BRIS G2	1.09
208902	BRIS G3	2.17
204638	CAT TRAC	.08
204670	CAT TRAC	.04
228000	CEDR#1CT	2.37
228001	CEDR#2CT	1.14
217078	ESSEX 12	10.22
209030	FRFA O01	.02
206331	GG A1&2	2.4
206332	GG A3&4	2.4
206333	GG B5&6	2.4
206334	GG B7&8	2.4
204639	GLATFLTR	.07
204646	HAM CT	.04
208942	HARR CT	.14
208985	HMSW IPP	.06
208903	HOLT 695	.28
208904	HOLT 696	.3
208907	HOLT 697	13.87
217081	HUDSON 1	19.94
204647	HUNTR CT	.09
217083	KEARNY11	7.24
217086	KRNY9&10	1.17
292590	L-018 E	1.09
204640	LARA	.08
209027	LOR2_Q27 E	4.32
227807	MO AV B	1.01
204574	MODRN LF	.02
204648	MOUNT CT	.06
204603	N.LEB	.01
204665	ONTELCT1	.42
204666	ONTELCT2	.42
204667	ONTELST1	.3

Bus Number	Bus Name	Full Contribution
204649	ORTAN CT	.03
204641	PANTHER	.18
209008	PAXT IPP	.03
204652	PORT1GEN	9.33
204653	PORT2GEN	14.18
295125	Q-020 2	.33
295130	Q-020 3	.
295133	Q-020 4	.
290201	Q-044	.
204679	Q-059	.02
295671	Q-073 C	.04
204555	QUEEN ST	.61
295952	R-011	23.86
212384	R-043	.22
212386	R-043	.86
296509	R-057 C	.02
204610	ROLLHILL	.01
204655	S.RDG CT	.09
290673	S-042 C	.19
290760	S-064	2.01
208914	SAHA 34	.39
208915	SAHA 567	.64
208917	SAHA1112	.55
208916	SAHA8910	.84
218360	SEWAREN1	5.7
218361	SEWAREN2	6.46
218362	SEWAREN3	5.86
218363	SEWAREN4	6.78
218364	SEWAREN6	6.06
292512	T-146 C	.51
204656	TITUS 1G	9.84
204657	TITUS 2G	9.84
204658	TITUS 3G	9.84
204659	TMI 1GEN	2.01
204650	TOLNA CT	.1

Bus Number	Bus Name	Full Contribution
292815	U1-056 C	2.3
208848	U1-067	.01
887721	U1-068	.03
889011	U2-015 C	.7
292966	U2-045 C	.13
293093	U2-077	34.64
297005	V2-003 C	.08
293450	V3-051 C	.
900111	V4-020	61.56
904261	V4-027 C	.
900361	V4-045	17.03
LTF	V4-050	4.73
904511	V4-052 C	.02
904741	V4-075 C	.
209019	VIKI IPP	.87
900801	W1-001	.82
208850	W1-046 C	.6
901151	W1-054	.04
901241	W1-076 C	.21
901361	W1-105 C	.
901371	W1-106 C	.
901541	W1-127 C	.07
902211	W2-019 C	.12
902251	W2-023	34.27
902271	W2-028	.26
902281	W2-029	.27
902461	W2-075	.
902601	W2-094 C	.06
903271	W3-022 C OP1	1.05
903311	W3-028 C	2.34
903381	W3-033	.38
903391	W3-039 C	.14
905091	W4-009 OP1	39.38
905181	W4-021	39.83
905211	W4-025 C	.14

Bus Number	Bus Name	Full Contribution
905291	W4-038 OP1	1.33
905331	W4-045 C	.18
905391	W4-063 C	.03
208947	WSHO CT	.07
907091	X1-013 OP1	100.63
907241	X1-068	.54
907281	X1-073 C OP1	.28
907351	X1-085 C	.1
907381	X1-094 C	.37
907451	X1-108	1.95
909021	X2-012 C	40.61
909081	X2-025	21.43
909171	X2-050	36.66
910531	X3-004	1.94
910551	X3-006 C	10.42
910701	X3-044	1.64
910931	X3-085 C	.17
912071	X4-009 C	.76
912091	X4-012 C OP1	.13
912101	X4-015 C	.1
912111	X4-016	.56
912131	X4-019	11.69
912141	X4-020	44.55
912151	X4-021	17.82
912191	X4-032 C	.21
912261	X4-044 C	.55
912291	X4-048 OP1	51.09
913131	Y1-020 C	.21
913171	Y1-025 C OP1	39.38
913181	Y1-026	8.79
913221	Y1-031 C OP1	.73
913351	Y1-056	2.08
913401	Y1-065 C	42.21
913481	Y1-072 C	.05
913511	Y1-077	3.69

Bus Number	Bus Name	Full Contribution
913561	Y1-084 C OP1	.04
914021	Y2-013 OP1	43.97
914031	Y2-015 OP1	18.83
914041	Y2-018 C	.04
914051	Y2-037 C	.06
914091	Y2-051 C	.1
914171	Y2-061 C	.76
914191	Y2-063 OP1	18.83
204660	YK H STA	.04
204642	YK SOLID	.08

Table 27

Bus Number	Bus Name	Full Contribution
903271	W3-022 C OP1	19.5
914031	Y2-015 OP1	350.
914191	Y2-063 OP1	350.

Table 28

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.15
208981	FOWH IPP	.96
212174	INGE	.18
208945	LOHA CT	.02
295223	Q-028 C	3.27
290673	S-042 C	3.53
212449	SUNB CT	.05
209018	SUNBIPCT	.28
209014	SUNBIPP1	.62
209015	SUNBIPP2	.63
209016	SUNBIPP3	.73
893121	V2-027	.01
209019	VIKI IPP	3.93
903271	W3-022 C OP1	19.15

Bus Number	Bus Name	Full Contribution
209021	WEST IPP	.73
914031	Y2-015 OP1	343.65
914191	Y2-063 OP1	343.65

Table 29

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.43
208972	BECR K09	.01
217006	BERGN26A	1.21
212099	BRMO IPP	.01
217078	ESSEX 12	10.64
208941	FISH CT	.04
208981	FOWH IPP	.07
206331	GG A1&2	2.29
206332	GG A3&4	2.29
206333	GG B5&6	2.29
206334	GG B7&8	2.29
208982	GLBT IPP	.13
208943	HARW CT	.05
217081	HUDSON 1	20.76
234304	HUN GEN3	.06
234305	HUN GEN4	.1
234311	HUN GEN5	.11
234312	HUN GEN6	.11
212174	INGE	.01
208944	JENK CT	.07
217083	KEARNY11	7.54
209004	KOPP IPP	.01
217086	KRNY9&10	1.21
209003	KSTN IPP	.01
292590	L-018 E	2.16
208945	LOHA CT	.02
212265	LOR1_N14_C	.01
209027	LOR2_Q27 E	5.6

Bus Number	Bus Name	Full Contribution
208911	MONT G1	1.28
208912	MONT G2	1.3
209006	NEPC IPP	.09
209010	PEIP 1	.07
209009	PEIP 2	.12
204652	PORT1GEN	9.72
204653	PORT2GEN	15.35
295223	Q-028 C	.23
295952	R-011	23.26
212384	R-043	.28
212386	R-043	1.12
290673	S-042 C	.25
209013	SCEN IPP	.14
218360	SEWAREN1	5.73
218361	SEWAREN2	6.48
218362	SEWAREN3	5.88
218363	SEWAREN4	6.79
218364	SEWAREN6	6.07
204654	SHAW CT	.03
212449	SUNB CT	.01
209018	SUNBIPCT	.06
209014	SUNBIPP1	.12
209015	SUNBIPP2	.12
209016	SUNBIPP3	.15
208918	SUSQ 1	2.38
200038	SUSQ 2	2.02
889011	U2-015 C	1.03
293093	U2-077	35.1
893121	V2-027	.
900111	V4-020	25.08
LTF	V4-050	6.28
209019	VIKI IPP	1.13
900801	W1-001	.84
901241	W1-076 C	.2
901431	W1-114 C	.

Bus Number	Bus Name	Full Contribution
901441	W1-115 C	.
901541	W1-127 C	.07
902251	W2-023	34.53
LTF	W2-033	4.35
903271	W3-022 C OP1	1.35
903391	W3-039 C	.15
905091	W4-009 OP1	38.53
905181	W4-021	38.51
905291	W4-038 OP1	1.39
209029	WAYM IPP	.02
209021	WEST IPP	.05
209022	WHFR IPP	.07
209023	WIENIPP1	.11
209025	WIENIPP3	.11
209026	WIENIPP4	.05
208948	WILL CT	.05
208920	WLPK	.1
907091	X1-013 OP1	9.48
907241	X1-068	.53
907281	X1-073 C OP1	.26
907381	X1-094 C	.38
907451	X1-108	2.04
909021	X2-012 C	56.08
909081	X2-025	22.12
909171	X2-050	38.17
910531	X3-004	2.02
910931	X3-085 C	.18
912091	X4-012 C OP1	.14
912111	X4-016	.58
912131	X4-019	12.07
912141	X4-020	24.87
912261	X4-044 C	.56
912291	X4-048 OP1	128.1
913131	Y1-020 C	.23
913171	Y1-025 C OP1	38.53

Bus Number	Bus Name	Full Contribution
913181	Y1-026	8.91
913221	Y1-031 C OP1	.76
913401	Y1-065 C	26.32
913481	Y1-072 C	.04
913561	Y1-084 C OP1	.05
914021	Y2-013 OP1	44.54
914031	Y2-015 OP1	24.29
914041	Y2-018 C	.04
914051	Y2-037 C	.08
914061	Y2-042	1.68
914091	Y2-051 C	.1
914191	Y2-063 OP1	24.29

Table 30

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.16
208981	FOWH IPP	.98
212174	INGE	.18
295223	Q-028 C	3.33
290673	S-042 C	3.6
903271	W3-022 C OP1	19.49
209021	WEST IPP	.74
914031	Y2-015 OP1	349.77
914191	Y2-063 OP1	349.77

Table 31

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.16
208981	FOWH IPP	.98
212174	INGE	.18
295223	Q-028 C	3.33
290673	S-042 C	3.6
903271	W3-022 C OP1	19.49

Bus Number	Bus Name	Full Contribution
209021	WEST IPP	.74
914031	Y2-015 OP1	349.77
914191	Y2-063 OP1	349.77

Table 32

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.47
208972	BECR K09	.01
217006	BERGN26A	1.24
212099	BRMO IPP	.01
217078	ESSEX 12	10.83
208941	FISH CT	.05
208981	FOWH IPP	.07
206331	GG A1&2	2.33
206332	GG A3&4	2.33
206333	GG B5&6	2.33
206334	GG B7&8	2.33
208982	GLBT IPP	.13
208943	HARW CT	.05
217081	HUDSON 1	21.13
234304	HUN GEN3	.07
234305	HUN GEN4	.1
234311	HUN GEN5	.11
234312	HUN GEN6	.11
212174	INGE	.01
208944	JENK CT	.07
217083	KEARNY11	7.67
209004	KOPP IPP	.01
217086	KRNY9&10	1.24
209003	KSTN IPP	.01
292590	L-018 E	2.2
208945	LOHA CT	.02
212265	LOR1_N14_C	.01
209027	LOR2_Q27 E	5.69

Bus Number	Bus Name	Full Contribution
208911	MONT G1	1.3
208912	MONT G2	1.33
209006	NEPC IPP	.1
209010	PEIP 1	.07
209009	PEIP 2	.12
204652	PORT1GEN	9.88
204653	PORT2GEN	15.61
295223	Q-028 C	.23
295952	R-011	23.67
212384	R-043	.28
212386	R-043	1.14
290673	S-042 C	.25
209013	SCEN IPP	.14
218360	SEWAREN1	5.83
218361	SEWAREN2	6.59
218362	SEWAREN3	5.98
218363	SEWAREN4	6.91
218364	SEWAREN6	6.18
204654	SHAW CT	.03
212449	SUNB CT	.01
209018	SUNBIPCT	.06
209014	SUNBIPP1	.13
209015	SUNBIPP2	.13
209016	SUNBIPP3	.15
208918	SUSQ 1	2.42
200038	SUSQ 2	2.06
889011	U2-015 C	1.05
293093	U2-077	35.71
893121	V2-027	.
900111	V4-020	25.52
LTF	V4-050	6.39
209019	VIKI IPP	1.15
900801	W1-001	.85
901241	W1-076 C	.21
901431	W1-114 C	.

Bus Number	Bus Name	Full Contribution
901441	W1-115 C	.
901541	W1-127 C	.07
902251	W2-023	35.13
LTF	W2-033	4.43
903271	W3-022 C OP1	1.38
903391	W3-039 C	.15
905091	W4-009 OP1	39.19
905181	W4-021	39.18
905291	W4-038 OP1	1.41
209029	WAYM IPP	.02
209021	WEST IPP	.05
209022	WHFR IPP	.07
209023	WIENIPP1	.11
209025	WIENIPP3	.11
209026	WIENIPP4	.05
208948	WILL CT	.05
208920	WLPK	.1
907091	X1-013 OP1	11.03
907241	X1-068	.54
907281	X1-073 C OP1	.27
907351	X1-085 C	.1
907381	X1-094 C	.39
907451	X1-108	2.08
909021	X2-012 C	57.05
909081	X2-025	22.5
909171	X2-050	38.84
910531	X3-004	2.06
910931	X3-085 C	.18
912091	X4-012 C OP1	.14
912111	X4-016	.59
912131	X4-019	12.28
912141	X4-020	25.3
912261	X4-044 C	.57
912291	X4-048 OP1	130.29
913131	Y1-020 C	.23

Bus Number	Bus Name	Full Contribution
913171	Y1-025 C OP1	39.19
913181	Y1-026	9.06
913221	Y1-031 C OP1	.78
913401	Y1-065 C	26.78
913481	Y1-072 C	.04
913561	Y1-084 C OP1	.05
914021	Y2-013 OP1	45.3
914031	Y2-015 OP1	24.71
914041	Y2-018 C	.04
914051	Y2-037 C	.08
914091	Y2-051 C	.1
914191	Y2-063 OP1	24.71

Table 33

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.08
208981	FOWH IPP	.49
212174	INGE	.09
295223	Q-028 C	3.32
290673	S-042 C	1.79
903271	W3-022 C OP1	19.44
209021	WEST IPP	.37
914031	Y2-015 OP1	349.
914191	Y2-063 OP1	349.

Table 34

Bus Number	Bus Name	Full Contribution
204646	HAM CT	.05
217081	HUDSON 1	8.48
204647	HUNTR CT	.21
204649	ORTAN CT	.08
315446	Q-065	-28.93
204555	QUEEN ST	.28

Bus Number	Bus Name	Full Contribution
295952	R-011	10.41
290760	S-064	1.14
291017	S-107 1CT	3.08
291019	S-107 1ST	6.17
291018	S-107 2CT	3.08
218360	SEWAREN1	2.46
218361	SEWAREN2	2.79
218362	SEWAREN3	2.53
218363	SEWAREN4	2.93
218364	SEWAREN6	2.62
292512	T-146 C	1.64
292513	T-146 E	6.57
292815	U1-056 C	1.08
292816	U1-056 E	7.22
293093	U2-077	14.89
LTF	U4-022	1.29
LTF	U4-023	1.29
900111	V4-020	19.73
LTF	V4-050	2.57
902251	W2-023	14.77
903311	W3-028 C	1.07
903312	W3-028 E	7.18
903961	W3-175	8.8
905091	W4-009 OP1	17.16
905141	W4-016	8.07
905181	W4-021	17.48
907091	X1-013 OP1	32.59
907461	X1-109 C	9.47
909021	X2-012 C	16.96
909081	X2-025	9.04
909171	X2-050	15.59
910831	X3-068 OP1	11.78
912141	X4-020	18.89
912291	X4-048 OP1	21.47
913171	Y1-025 C OP1	17.16

Bus Number	Bus Name	Full Contribution
913172	Y1-025 E OP1	1.42
913401	Y1-065 C	19.18
913402	Y1-065 E	1.12
914021	Y2-013 OP1	18.9
914031	Y2-015 OP1	7.83
LTF	Y2-044	1.19
914191	Y2-063 OP1	7.83

Table 35

Bus Number	Bus Name	Full Contribution
204638	CAT TRAC	.04
204670	CAT TRAC	.02
213585	EDDYSTN2	7.12
204639	GLATFLTR	.07
204646	HAM CT	.05
217081	HUDSON 1	8.24
204647	HUNTR CT	.21
204574	MODRN LF	.01
204648	MOUNT CT	.09
204649	ORTAN CT	.08
315446	Q-065	-20.78
204555	QUEEN ST	.28
295952	R-011	10.11
290760	S-064	1.13
291017	S-107 1CT	2.99
291019	S-107 1ST	5.97
291018	S-107 2CT	2.99
218360	SEWAREN1	2.39
218361	SEWAREN2	2.71
218362	SEWAREN3	2.46
218363	SEWAREN4	2.85
218364	SEWAREN6	2.55
204656	TITUS 1G	2.41
204657	TITUS 2G	2.41

Bus Number	Bus Name	Full Contribution
204658	TITUS 3G	2.41
204650	TOLNA CT	.06
887721	U1-068	.01
293093	U2-077	14.46
LTF	U4-022	1.23
LTF	U4-023	1.23
900111	V4-020	19.26
900361	V4-045	7.38
LTF	V4-050	2.43
902251	W2-023	14.34
902461	W2-075	.
902601	W2-094 C	.26
903341	W3-032A 1	3.53
903351	W3-032A 2	3.53
903961	W3-175	8.52
905091	W4-009 OP1	16.65
905141	W4-016	7.81
905181	W4-021	16.96
907091	X1-013 OP1	31.89
909021	X2-012 C	16.52
909081	X2-025	8.82
909171	X2-050	15.14
909231	X2-066	7.06
909241	X2-067	7.07
912141	X4-020	18.34
912151	X4-021	7.34
912291	X4-048 OP1	20.91
913171	Y1-025 C OP1	16.65
913401	Y1-065 C	18.53
914021	Y2-013 OP1	18.36
914031	Y2-015 OP1	7.63
LTF	Y2-044	1.21
914191	Y2-063 OP1	7.63
204660	YK H STA	.03
204642	YK SOLID	.04

Table 36

Bus Number	Bus Name	Full Contribution
203283	MANOR	.01
200851	MEHOOP3	.17
294572	P-028 C	.09
294573	P-028 E	14.98
295952	R-011	6.66
291017	S-107 1CT	1.64
291019	S-107 1ST	3.29
291018	S-107 2CT	1.64
218360	SEWAREN1	1.64
218361	SEWAREN2	1.85
218362	SEWAREN3	1.68
218363	SEWAREN4	1.94
218364	SEWAREN6	1.74
293093	U2-077	10.02
LTF	U4-022	.76
LTF	U4-023	.76
900111	V4-020	7.49
LTF	V4-050	2.02
902251	W2-023	9.86
LTF	W2-033	1.75
905091	W4-009 OP1	11.03
905181	W4-021	11.04
907091	X1-013 OP1	9.44
907461	X1-109 C	117.09
909021	X2-012 C	15.75
909171	X2-050	10.86
910522	X3-003 E	2.5
912141	X4-020	7.46
912291	X4-048 OP1	34.98
913171	Y1-025 C OP1	11.03
913172	Y1-025 E OP1	.91
913311	Y1-047 OP1	1.92
913401	Y1-065 C	7.82
913402	Y1-065 E	.46

Bus Number	Bus Name	Full Contribution
914021	Y2-013 OP1	12.71
914031	Y2-015 OP1	6.85
914061	Y2-042	1.98
914161	Y2-060	.44
914191	Y2-063 OP1	6.85

Table 37

Bus Number	Bus Name	Full Contribution
203283	MANOR	.01
200851	MEHOOP3	.17
294572	P-028 C	.09
294573	P-028 E	14.98
295952	R-011	6.66
291017	S-107 1CT	1.64
291019	S-107 1ST	3.29
291018	S-107 2CT	1.64
218360	SEWAREN1	1.64
218361	SEWAREN2	1.85
218362	SEWAREN3	1.68
218363	SEWAREN4	1.94
218364	SEWAREN6	1.74
293093	U2-077	10.02
LTF	U4-022	.76
LTF	U4-023	.76
900111	V4-020	7.49
LTF	V4-050	2.02
902251	W2-023	9.86
LTF	W2-033	1.75
905091	W4-009 OP1	11.03
905181	W4-021	11.04
907091	X1-013 OP1	9.44
907461	X1-109 C	117.09
909021	X2-012 C	15.75
909171	X2-050	10.86

Bus Number	Bus Name	Full Contribution
910522	X3-003 E	2.5
912141	X4-020	7.46
912291	X4-048 OP1	34.98
913171	Y1-025 C OP1	11.03
913172	Y1-025 E OP1	.91
913311	Y1-047 OP1	1.92
913401	Y1-065 C	7.82
913402	Y1-065 E	.46
914021	Y2-013 OP1	12.71
914031	Y2-015 OP1	6.85
914061	Y2-042	1.98
914161	Y2-060	.44
914191	Y2-063 OP1	6.85

Table 38

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.16
208941	FISH CT	.22
208981	FOWH IPP	.97
208982	GLBT IPP	.64
212174	INGE	.18
212265	LOR1_N14_C	.04
212266	LOR1_N14_E	7.41
209020	LOR2_Q27 C	.16
209027	LOR2_Q27 E	27.58
295223	Q-028 C	3.31
295230	Q-028 E	135.25
212384	R-043	1.38
212386	R-043	5.52
290673	S-042 C	3.58
290674	S-042 E	14.32
209013	SCEN IPP	.67
901431	W1-114 C	.01
901432	W1-114 E	.64

Bus Number	Bus Name	Full Contribution
901441	W1-115 C	.01
901442	W1-115 E	.64
903271	W3-022 C OP1	19.39
903272	W3-022 E OP1	129.78
209021	WEST IPP	.74
209022	WHFR IPP	.34
914031	Y2-015 OP1	348.08
914051	Y2-037 C	.39
914052	Y2-037 E	.64
914191	Y2-063 OP1	348.08

Table 39

Bus Number	Bus Name	Full Contribution
204638	CAT TRAC	.04
204670	CAT TRAC	.02
213585	EDDYSTN2	7.12
204639	GLATFLTR	.07
204646	HAM CT	.05
217081	HUDSON 1	8.24
204647	HUNTR CT	.21
204574	MODRN LF	.01
204648	MOUNT CT	.09
204649	ORTAN CT	.08
204653	PORT2GEN	5.6
315446	Q-065	-13.72
204555	QUEEN ST	.28
295952	R-011	10.11
290760	S-064	1.13
291017	S-107 1CT	2.99
291019	S-107 1ST	5.97
291018	S-107 2CT	2.99
218360	SEWAREN1	2.39
218361	SEWAREN2	2.71
218362	SEWAREN3	2.46

Bus Number	Bus Name	Full Contribution
218363	SEWAREN4	2.85
218364	SEWAREN6	2.55
204656	TITUS 1G	2.41
204657	TITUS 2G	2.41
204658	TITUS 3G	2.41
204650	TOLNA CT	.06
887721	U1-068	.01
293093	U2-077	14.46
LTF	U4-022	1.23
LTF	U4-023	1.23
900111	V4-020	19.26
900361	V4-045	7.38
LTF	V4-050	2.43
902251	W2-023	14.34
902461	W2-075	.
902601	W2-094 C	.26
903341	W3-032A 1	3.53
903351	W3-032A 2	3.53
903961	W3-175	8.52
905091	W4-009 OP1	16.65
905141	W4-016	7.81
905181	W4-021	16.96
907091	X1-013 OP1	31.89
907291	X1-074	6.66
909021	X2-012 C	16.52
909081	X2-025	8.82
909171	X2-050	15.14
909231	X2-066	7.06
909241	X2-067	7.07
LTF	X3-050	.75
912141	X4-020	18.34
912151	X4-021	7.34
912291	X4-048 OP1	20.91
913171	Y1-025 C OP1	16.65
913401	Y1-065 C	18.53

Bus Number	Bus Name	Full Contribution
914021	Y2-013 OP1	18.36
914031	Y2-015 OP1	7.63
LTF	Y2-044	1.21
914191	Y2-063 OP1	7.63
204660	YK H STA	.03
204642	YK SOLID	.04

Attachment 2. Option 2 Flowgate Details

Table 1

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.2
217006	BERGN26A	1.1
207922	BRIS	.03
208900	BRIS G1	1.03
208901	BRIS G2	1.21
208902	BRIS G3	2.41
204638	CAT TRAC	.2
204670	CAT TRAC	.09
217078	ESSEX 12	9.65
206617	EXXON	.37
206331	GG A1&2	2.14
206332	GG A3&4	2.14
206333	GG B5&6	2.14
206334	GG B7&8	2.14
204639	GLATFLTR	.16
204646	HAM CT	.08
208942	HARR CT	.15
208985	HMSW IPP	.06
217081	HUDSON 1	18.83
204647	HUNTR CT	.2
217083	KEARNY11	6.83
217086	KRNY9&10	1.1
204640	LARA	.08
212266	LOR1_N14_E	1.12
209027	LOR2_Q27 E	4.18
206679	M&M S721	.55
210888	MACRTR10	.27
204574	MODRN LF	.05
204648	MOUNT CT	.13

Bus Number	Bus Name	Full Contribution
204603	N.LEB	.01
204649	ORTAN CT	.07
209008	PAXT IPP	.03
206638	PEAPACK	.21
204652	PORT1GEN	8.44
204653	PORT2GEN	12.93
295230	Q-028 E	7.1
290092	Q-041 E	1.59
290201	Q-044	.
204555	QUEEN ST	1.54
295952	R-011	22.88
212384	R-043	.21
212386	R-043	.84
290673	S-042 C	.19
290674	S-042 E	.75
290760	S-064	4.64
218360	SEWAREN1	5.43
218361	SEWAREN2	6.16
218362	SEWAREN3	5.59
218363	SEWAREN4	6.47
218364	SEWAREN6	5.79
208769	SISO	-.36
204659	TMI 1GEN	2.39
204650	TOLNA CT	.24
887721	U1-068	.07
889011	U2-015 C	.68
889012	U2-015 E	4.52
293093	U2-077	32.95
299906	U3-032 E	.71
291937	U4-014 E	.33
292095	V1-030 E1	.07
292185	V1-030 E2	.2

Bus Number	Bus Name	Full Contribution
292101	V1-030 E4	.05
292103	V1-030 E5	.12
292107	V1-030 E7	.04
292087	V1-030 E8	.05
292111	V1-030 E9	.05
292189	V1-030 EA	.25
292191	V1-030 EC	.24
292092	V1-030 ED	.14
297021	V2-009 E1	.08
297023	V2-009 E2	.16
297025	V2-009 E3	.2
297027	V2-009 E4	.12
297033	V2-010 E	.33
297039	V2-013 E	.02
297069	V2-025 E	.16
293340	V3-005 E	.33
293378	V3-024 E	.16
293413	V3-040 E	.33
292666	V3-058 E	.1
292668	V3-059 E	.1
293444	V3-065 E	.02
293440	V3-066 E	.01
293434	V3-067 E	.03
293429	V3-068 E	.01
292681	V3-069 E	.06
292683	V3-070 E	.26
904002	V4-001 E	.11
900111	V4-020	49.06
900361	V4-045	17.74
904512	V4-052 E	.21
904682	V4-069 E	.1
904692	V4-070 E	.1

Bus Number	Bus Name	Full Contribution
904752	V4-076 E	.24
209019	VIK1 IPP	.85
900801	W1-001	.78
901082	W1-024 E	.13
901102	W1-032 E	.1
901131	W1-045 C	.27
901132	W1-045 E	.44
901241	W1-076 C	.2
901242	W1-076 E	.32
901262	W1-082 E	.67
901342	W1-101 E	.05
901371	W1-106 C	.
901372	W1-106 E	.34
901602	W1-111 E	1.04
901422	W1-113 E	.26
901432	W1-114 E	.1
901442	W1-115 E	.1
901512	W1-122 E	.17
901522	W1-124 E	.54
901541	W1-127 C	.06
901542	W1-127 E	.1
901572	W1-132 E	.1
902192	W2-016 E	.49
902251	W2-023	32.66
902281	W2-029	.26
902312	W2-036 E	.03
902372	W2-050 E	.52
902382	W2-052 E	.02
902422	W2-061 E	.1
902452	W2-074 E	.05
902461	W2-075	.01
902472	W2-076 E	.06
902482	W2-078 E	.29
902522	W2-083 E	.56
902532	W2-084 E	.33

Bus Number	Bus Name	Full Contribution
902542	W2-085 E	.32
902552	W2-088 E	.54
902572	W2-091 E	.54
902601	W2-094 C	.15
902602	W2-094 E	.25
903222	W3-003 E	.52
903271	W3-022 C OP1	1.02
903272	W3-022 E OP1	6.82
903292	W3-025 E	.1
903311	W3-028 C	1.35
903312	W3-028 E	9.1
903322	W3-029 E	.55
903332	W3-032 E	.27
903391	W3-039 C	.14
903392	W3-039 E	.91
903412	W3-044 E	.66
903422	W3-045 E	.1
903562	W3-076 E	.67
903572	W3-077 E	.5
903582	W3-078 E	.42
903592	W3-079 E	.45
903632	W3-095 E	.5
903672	W3-106 E	.33
903682	W3-110 E	.25
903722	W3-120 E	.53
903742	W3-126 E	.56
903822	W3-139 E	.54
903832	W3-140 E	.26
903842	W3-145 E	.56
903852	W3-146 E	.33
903862	W3-149 E	.56
903872	W3-154 E	.05
903882	W3-155 E	-.05
903902	W3-158 E	.25
903912	W3-159 E	.38

Bus Number	Bus Name	Full Contribution
905091	W4-009 OP1	37.74
905102	W4-010 E	-1.78
905112	W4-011 E	.48
905122	W4-014 E	.57
905181	W4-021	38.32
905242	W4-031 E	.14
905291	W4-038 OP1	1.26
905331	W4-045 C	.17
905332	W4-045 E	.29
905342	W4-046 E	.33
905352	W4-053 E	.1
905362	W4-058 E	.02
905372	W4-059 E	.02
905402	W4-064 E	.1
905412	W4-065 E	.1
905422	W4-068 E	.27
905432	W4-072 E	.52
905442	W4-073 E	.57
905452	W4-080 E	.65
905532	W4-093 E	.24
905542	W4-097 E	.1
208947	WSHO CT	.08
907002	X1-005 E	.33
907012	X1-012 E	.33
907091	X1-013 OP1	95.49
907072	X1-034 E	.04
907082	X1-037 E	.54
907152	X1-046 E	.26
907162	X1-049 E	.1
907241	X1-068	.52
907272	X1-072 E	.04
907281	X1-073 C OP1	.25
907282	X1-073 E OP1	.4
907332	X1-082 E	.4
907351	X1-085 C	.1

Bus Number	Bus Name	Full Contribution
907352	X1-085 E	.16
907372	X1-088 E	.42
907381	X1-094 C	.34
907382	X1-094 E	.56
907451	X1-108	1.77
907482	X1-114 E	.07
907492	X1-116 E	.23
909021	X2-012 C	39.74
909081	X2-025	21.73
909122	X2-033 E	.1
909171	X2-050	34.62
909192	X2-054 E	.52
909212	X2-059 E	.32
909252	X2-075 E	.19
909302	X2-087 E	.03
909312	X2-088 E	.08
909322	X2-089 E	.09
909332	X2-099 E	.33
910531	X3-004	1.84
910551	X3-006 C	8.3
910552	X3-006 E	3.02
910582	X3-011 E	.17
910612	X3-029 E	.6
910701	X3-044	1.97
910762	X3-052 E	.16
910782	X3-056 E	2.58
910792	X3-057 E	2.61
910922	X3-083 E	.33
910931	X3-085 C	.16
910932	X3-085 E	.26
912042	X4-005 E	3.12
912062	X4-007 E	3.17
912071	X4-009 C	.84
912072	X4-009 E	1.38
912091	X4-012 C OP1	.12

Bus Number	Bus Name	Full Contribution
912092	X4-012 E OP1	.2
912111	X4-016	.52
912131	X4-019	11.86
912141	X4-020	47.47
912151	X4-021	18.99
912182	X4-031 E	.1
912261	X4-044 C	.52
912262	X4-044 E	.94
912282	X4-046 E	-.84
913131	Y1-020 C	.2
913132	Y1-020 E	.45
913171	Y1-025 C OP1	37.74
913172	Y1-025 E OP1	3.12
913181	Y1-026	8.37
913221	Y1-031 C OP1	.69
913222	Y1-031 E OP1	5.32
913351	Y1-056	2.49
913401	Y1-065 C	43.83
913402	Y1-065 E	2.56
913481	Y1-072 C	.04
913482	Y1-072 E	.07
913561	Y1-084 C OP1	.04
913562	Y1-084 E OP1	.07
914021	Y2-013 OP2	41.83
914031	Y2-015 OP2	18.27
914041	Y2-018 C	.04
914042	Y2-018 E	.06
914051	Y2-037 C	.06
914052	Y2-037 E	.1
914091	Y2-051 C	.1
914092	Y2-051 E	.16
914171	Y2-061 C	.84
914172	Y2-061 E	1.38
914191	Y2-063 OP2	18.27
204660	YK H STA	.08

Bus Number	Bus Name	Full Contribution
204642	YK SOLID	.18

Table 2

Bus Number	Bus Name	Full Contribution
208972	BECR K09	.01
212099	BRMO IPP	.08
208941	FISH CT	.31
208981	FOWH IPP	.51
208982	GLBT IPP	.9
208943	HARW CT	.11
234304	HUN GEN3	.13
234305	HUN GEN4	.19
234311	HUN GEN5	.18
234312	HUN GEN6	.18
212174	INGE	.09
208944	JENK CT	.08
209004	KOPP IPP	.08
209003	KSTN IPP	.01
292590	L-018 E	2.75
208945	LOHA CT	.15
212265	LOR1_N14_C	.06
209027	LOR2_Q27 E	38.97
208911	MONT G1	7.14
208912	MONT G2	7.29
209006	NEPC IPP	.21
295223	Q-028 C	1.73
212384	R-043	1.95
212386	R-043	7.79
290673	S-042 C	1.87
209013	SCEN IPP	.95
212449	SUNB CT	.07
209018	SUNBIPCT	.44
209014	SUNBIPP1	.99
209015	SUNBIPP2	.99

Bus Number	Bus Name	Full Contribution
209016	SUNBIPP3	1.16
209017	SUNBIPP4	1.7
208918	SUSQ 1	5.48
889011	U2-015 C	2.15
893121	V2-027	.02
209019	VIKI IPP	8.68
901431	W1-114 C	.01
901441	W1-115 C	.01
903271	W3-022 C OP1	9.82
209029	WAYM IPP	.02
209021	WEST IPP	.38
209022	WHFR IPP	.47
209023	WIENIPP1	.24
209025	WIENIPP3	.24
209026	WIENIPP4	.12
208948	WILL CT	.29
909021	X2-012 C	329.27
912291	X4-048 OP1	76.93
914031	Y2-015 OP2	182.04
914051	Y2-037 C	.56
914191	Y2-063 OP2	182.04

Table 3

Bus Number	Bus Name	Full Contribution
212266	LOR1_N14_E	3.28
209027	LOR2_Q27 E	12.19
295230	Q-028 E	11.65
212384	R-043	.61
212386	R-043	2.44
290673	S-042 C	.31
290674	S-042 E	1.22
901432	W1-114 E	.28
901442	W1-115 E	.28
903271	W3-022 C OP1	2.3

Bus Number	Bus Name	Full Contribution
903272	W3-022 E OP1	15.4
909021	X2-012 C	286.68
914031	Y2-015 OP2	29.38
914051	Y2-037 C	.17
914052	Y2-037 E	.28
914191	Y2-063 OP2	29.38

Table 4

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.08
208981	FOWH IPP	.48
212174	INGE	.09
295223	Q-028 C	1.66
290673	S-042 C	1.79
212449	SUNB CT	.01
209018	SUNBIPCT	.05
209014	SUNBIPP1	.1
209015	SUNBIPP2	.1
209016	SUNBIPP3	.12
209017	SUNBIPP4	.25
903271	W3-022 C OP1	11.64
209021	WEST IPP	.37
914031	Y2-015 OP2	172.83
914191	Y2-063 OP2	172.83

Table 5

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.03
208941	FISH CT	.13
208981	FOWH IPP	.21
208982	GLBT IPP	.38
212174	INGE	.04
209004	KOPP IPP	.05

Bus Number	Bus Name	Full Contribution
208945	LOHA CT	.09
212265	LOR1_N14_C	.03
209027	LOR2_Q27 E	16.37
208911	MONT G1	5.42
208912	MONT G2	5.54
295223	Q-028 C	.71
212384	R-043	.82
212386	R-043	3.27
290673	S-042 C	.77
209013	SCEN IPP	.4
212449	SUNB CT	.03
209018	SUNBIPCT	.2
209014	SUNBIPP1	.44
209015	SUNBIPP2	.44
209016	SUNBIPP3	.51
209017	SUNBIPP4	.67
893121	V2-027	.01
209019	VIKI IPP	4.08
901431	W1-114 C	.01
901441	W1-115 C	.01
903271	W3-022 C OP1	4.07
209021	WEST IPP	.16
209022	WHFR IPP	.2
208948	WILL CT	.19
909021	X2-012 C	235.9
914031	Y2-015 OP2	74.7
914051	Y2-037 C	.23
914191	Y2-063 OP2	74.7

Table 6

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.03
208981	FOWH IPP	.19
212174	INGE	.04

Bus Number	Bus Name	Full Contribution
209004	KOPP IPP	.03
208945	LOHA CT	.06
212266	LOR1_N14_E	3.26
209027	LOR2_Q27 E	12.14
295223	Q-028 C	.65
295230	Q-028 E	26.63
212384	R-043	.61
212386	R-043	2.43
290673	S-042 C	.71
290674	S-042 E	2.83
212449	SUNB CT	.03
209018	SUNBIPCT	.21
209014	SUNBIPP1	.46
209015	SUNBIPP2	.46
209016	SUNBIPP3	.54
209017	SUNBIPP4	.83
893121	V2-027	.01
209019	VIKI IPP	3.95
901432	W1-114 E	.28
901442	W1-115 E	.28
903271	W3-022 C OP1	3.4
903272	W3-022 E OP1	22.73
209021	WEST IPP	.14
208948	WILL CT	.11
909021	X2-012 C	119.07
909081	X2-025	119.67
912131	X4-019	65.3
914031	Y2-015 OP2	68.94
914051	Y2-037 C	.17
914052	Y2-037 E	.28
914191	Y2-063 OP2	68.94

Table 7

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.08
208941	FISH CT	.19
208981	FOWH IPP	.49
208982	GLBT IPP	.55
212174	INGE	.09
212265	LOR1_N14_C	.04
209027	LOR2_Q27 E	23.75
295223	Q-028 C	1.66
212384	R-043	1.19
212386	R-043	4.75
290673	S-042 C	1.8
209013	SCEN IPP	.58
901431	W1-114 C	.01
901441	W1-115 C	.01
903271	W3-022 C OP1	7.79
209021	WEST IPP	.37
209022	WHFR IPP	.29
914031	Y2-015 OP2	176.02
914051	Y2-037 C	.34
914191	Y2-063 OP2	176.02

Table 8

Bus Number	Bus Name	Full Contribution
210888	MACRTR10	-.42
889011	U2-015 C	.73
889012	U2-015 E	4.89
901602	W1-111 E	1.04
909021	X2-012 C	19.87
LTF	X3-021	1.01
912291	X4-048 OP1	13.93
LTF	Y1-004	.83

Bus Number	Bus Name	Full Contribution
914031	Y2-015 OP2	8.03
LTF	Y2-040	1.01
LTF	Y2-044	.89
LTF	Y2-049	.83
914191	Y2-063 OP2	8.03

Table 9

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.02
208941	FISH CT	.11
208981	FOWH IPP	.14
208982	GLBT IPP	.32
208943	HARW CT	.08
212174	INGE	.03
292590	L-018 E	1.14
212265	LOR1_N14_C	.02
212266	LOR1_N14_E	3.7
209020	LOR2_Q27 C	.08
209027	LOR2_Q27 E	13.75
209006	NEPC IPP	.14
295223	Q-028 C	.47
295230	Q-028 E	19.28
212384	R-043	.69
212386	R-043	2.75
290673	S-042 C	.51
290674	S-042 E	2.04
209013	SCEN IPP	.33
889011	U2-015 C	1.58
889012	U2-015 E	10.58
291936	U4-014 C	.01
291937	U4-014 E	.72
296063	V3-040 C	.01
293413	V3-040 E	.72
209019	VIKI IPP	1.42

Bus Number	Bus Name	Full Contribution
901602	W1-111 E	2.34
901431	W1-114 C	.
901432	W1-114 E	.32
901441	W1-115 C	.
901442	W1-115 E	.32
903271	W3-022 C OP1	3.06
903272	W3-022 E OP1	20.45
209021	WEST IPP	.1
209022	WHFR IPP	.17
209023	WIENIPP1	.16
209025	WIENIPP3	.16
209026	WIENIPP4	.08
909021	X2-012 C	72.77
910782	X3-056 E	4.08
912291	X4-048 OP1	27.45
914031	Y2-015 OP2	49.33
914051	Y2-037 C	.2
914052	Y2-037 E	.32
914191	Y2-063 OP2	49.33

Table 10

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.03
208941	FISH CT	.15
208981	FOWH IPP	.18
208982	GLBT IPP	.44
212174	INGE	.03
212265	LOR1_N14_C	.03
212266	LOR1_N14_E	5.13
209020	LOR2_Q27 C	.11
209027	LOR2_Q27 E	19.08
295223	Q-028 C	.63
295230	Q-028 E	25.59
212384	R-043	.95

Bus Number	Bus Name	Full Contribution
212386	R-043	3.82
290673	S-042 C	.68
290674	S-042 E	2.7
209013	SCEN IPP	.46
209019	VIKI IPP	1.49
901602	W1-111 E	1.
901431	W1-114 C	.01
901432	W1-114 E	.44
901441	W1-115 C	.01
901442	W1-115 E	.44
903271	W3-022 C OP1	4.16
903272	W3-022 E OP1	27.82
209021	WEST IPP	.14
209022	WHFR IPP	.23
909021	X2-012 C	72.98
914031	Y2-015 OP2	65.39
914051	Y2-037 C	.27
914052	Y2-037 E	.44
914191	Y2-063 OP2	65.39

Table 11

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.02
208941	FISH CT	.11
208981	FOWH IPP	.14
208982	GLBT IPP	.32
208943	HARW CT	.08
212174	INGE	.03
292590	L-018 E	1.13
212265	LOR1_N14_C	.02
212266	LOR1_N14_E	3.67
209020	LOR2_Q27 C	.08
209027	LOR2_Q27 E	13.64
209006	NEPC IPP	.14

Bus Number	Bus Name	Full Contribution
295223	Q-028 C	.47
295230	Q-028 E	19.11
212384	R-043	.68
212386	R-043	2.73
290673	S-042 C	.5
290674	S-042 E	2.02
209013	SCEN IPP	.33
889011	U2-015 C	1.57
889012	U2-015 E	10.49
291937	U4-014 E	.55
293413	V3-040 E	.55
209019	VIKI IPP	1.41
901602	W1-111 E	2.32
901431	W1-114 C	.
901432	W1-114 E	.32
901441	W1-115 C	.
901442	W1-115 E	.32
903271	W3-022 C OP1	3.03
903272	W3-022 E OP1	20.28
209021	WEST IPP	.1
209022	WHFR IPP	.17
209023	WIENIPP1	.16
209025	WIENIPP3	.16
209026	WIENIPP4	.08
909021	X2-012 C	72.11
910782	X3-056 E	4.04
912291	X4-048 OP1	27.16
914031	Y2-015 OP2	48.91
914051	Y2-037 C	.19
914052	Y2-037 E	.32
914191	Y2-063 OP2	48.91

Table 12

Bus Number	Bus Name	Full Contribution
212266	LOR1_N14_E	2.02
209027	LOR2_Q27 E	7.52
295230	Q-028 E	7.17
212384	R-043	.38
212386	R-043	1.5
290673	S-042 C	.19
290674	S-042 E	.75
901432	W1-114 E	.17
901442	W1-115 E	.17
903271	W3-022 C OP1	1.42
903272	W3-022 E OP1	9.49
909021	X2-012 C	239.61
914031	Y2-015 OP2	18.06
914051	Y2-037 C	.11
914052	Y2-037 E	.17
914191	Y2-063 OP2	18.06

Table 13

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.22
217006	BERGN26A	1.11
217078	ESSEX 12	9.72
206617	EXXON	.36
206331	GG A1&2	2.09
206332	GG A3&4	2.09
206333	GG B5&6	2.09
206334	GG B7&8	2.09
217081	HUDSON 1	18.97
217083	KEARNY11	6.89
217086	KRNY9&10	1.11
209003	KSTN IPP	.01

Bus Number	Bus Name	Full Contribution
292590	L-018 E	1.98
212266	LOR1_N14_E	1.38
209027	LOR2_Q27 E	5.12
206679	M&M S721	.57
210888	MACRTR10	.28
200851	MEHOOP3	.48
294572	P-028 C	.24
294573	P-028 E	42.73
206638	PEAPACK	.21
204652	PORT1GEN	8.88
204653	PORT2GEN	14.04
295230	Q-028 E	8.57
290092	Q-041 E	1.63
212384	R-043	.26
212386	R-043	1.02
290673	S-042 C	.23
290674	S-042 E	.91
218360	SEWAREN1	5.23
218361	SEWAREN2	5.92
218362	SEWAREN3	5.37
218363	SEWAREN4	6.2
218364	SEWAREN6	5.55
889011	U2-015 C	.95
889012	U2-015 E	6.33
293093	U2-077	32.05
299906	U3-032 E	.69
291937	U4-014 E	.37
292095	V1-030 E1	.07
292111	V1-030 E9	.05
292191	V1-030 EC	.24
292092	V1-030 ED	.14
297033	V2-010 E	.34
297069	V2-025 E	.16
293340	V3-005 E	.34
293413	V3-040 E	.37

Bus Number	Bus Name	Full Contribution
293444	V3-065 E	.02
293440	V3-066 E	.01
293434	V3-067 E	.03
293429	V3-068 E	.01
904002	V4-001 E	.1
LTF	V4-050	5.86
209019	VIKI IPP	1.04
900801	W1-001	.76
901262	W1-082 E	.66
901342	W1-101 E	.05
901602	W1-111 E	1.47
901432	W1-114 E	.12
901442	W1-115 E	.12
901512	W1-122 E	.18
901541	W1-127 C	.06
901542	W1-127 E	.1
902251	W2-023	31.52
LTF	W2-033	3.9
902382	W2-052 E	.02
902532	W2-084 E	.35
902572	W2-091 E	.54
903271	W3-022 C OP1	1.24
903272	W3-022 E OP1	8.29
903332	W3-032 E	.27
903391	W3-039 C	.14
903392	W3-039 E	.92
903412	W3-044 E	.67
903562	W3-076 E	.67
903572	W3-077 E	.5
903632	W3-095 E	.5
903672	W3-106 E	.34
903682	W3-110 E	.26
903742	W3-126 E	.6
903822	W3-139 E	.54
903832	W3-140 E	.28

Bus Number	Bus Name	Full Contribution
903842	W3-145 E	.6
903852	W3-146 E	.37
903872	W3-154 E	.05
905091	W4-009 OP1	35.16
905122	W4-014 E	.57
905181	W4-021	35.14
905242	W4-031 E	.13
905291	W4-038 OP1	1.27
905342	W4-046 E	.34
905372	W4-059 E	.02
905402	W4-064 E	.11
905412	W4-065 E	.11
905422	W4-068 E	.27
905442	W4-073 E	.57
905452	W4-080 E	.63
905532	W4-093 E	.23
905542	W4-097 E	.1
209029	WAYM IPP	.02
209031	WAYMART E	6.77
907002	X1-005 E	.33
907012	X1-012 E	.35
907072	X1-034 E	.04
907152	X1-046 E	.28
907272	X1-072 E	.04
907281	X1-073 C OP1	.24
907282	X1-073 E OP1	.39
907332	X1-082 E	.41
907372	X1-088 E	.4
907381	X1-094 C	.35
907382	X1-094 E	.58
907451	X1-108	1.87
907482	X1-114 E	.07
907492	X1-116 E	.25
909021	X2-012 C	51.37
909171	X2-050	34.88

Bus Number	Bus Name	Full Contribution
909302	X2-087 E	.03
909322	X2-089 E	.09
909332	X2-099 E	.34
910522	X3-003 E	7.12
910531	X3-004	1.85
910582	X3-011 E	.17
910612	X3-029 E	.61
910762	X3-052 E	.16
910782	X3-056 E	3.81
910792	X3-057 E	3.23
910922	X3-083 E	.37
910931	X3-085 C	.16
910932	X3-085 E	.27
912062	X4-007 E	3.35
912091	X4-012 C OP1	.13
912092	X4-012 E OP1	.21
912111	X4-016	.53
912261	X4-044 C	.51
912262	X4-044 E	.92
912291	X4-048 OP1	117.88
913131	Y1-020 C	.21
913132	Y1-020 E	.47
913171	Y1-025 C OP1	35.16
913172	Y1-025 E OP1	2.91
913181	Y1-026	8.13
913221	Y1-031 C OP1	.7
913222	Y1-031 E OP1	5.36
913311	Y1-047 OP1	5.48
913481	Y1-072 C	.04
913482	Y1-072 E	.06
913561	Y1-084 C OP1	.04
913562	Y1-084 E OP1	.07
914021	Y2-013 OP2	40.57
914031	Y2-015 OP2	22.05
914041	Y2-018 C	.04

Bus Number	Bus Name	Full Contribution
914042	Y2-018 E	.07
914051	Y2-037 C	.07
914052	Y2-037 E	.12
914061	Y2-042	3.26
914161	Y2-060	1.25
914191	Y2-063 OP2	22.05

Table 14

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	8.14
217006	BERGN26A	4.07
212099	BRMO IPP	.03
219103	BURLNGT8	3.91
219124	BURLNGT9	34.25
228251	CARLLS#4	.89
228000	CEDR#1CT	8.59
228001	CEDR#2CT	4.14
200030	CONE G1	6.65
200031	CONE G2	6.73
228301	D/W 1 ST	14.44
228302	D/W 6 ST	14.81
217078	ESSEX 12	35.64
208981	FOWH IPP	.2
298464	G-030	.87
206331	GG A1&2	7.76
206332	GG A3&4	7.76
206333	GG B5&6	7.76
206334	GG B7&8	7.76
217081	HUDSON 1	69.54
212174	INGE	.04
217083	KEARNY11	25.24
200032	KEYS G1	8.17
200033	KEYS G2	8.07
209004	KOPP IPP	.04

Bus Number	Bus Name	Full Contribution
217086	KRNY9&10	4.07
292590	L-018 E	4.14
208945	LOHA CT	.07
209027	LOR2_Q27 E	16.6
219134	MERCER 3	21.57
227807	MO AV B	3.72
219137	NAT PARK	3.9
204652	PORT1GEN	30.92
204653	PORT2GEN	47.6
295223	Q-028 C	.7
228343	QUINTN#1	.37
295952	R-011	84.43
212384	R-043	.83
212386	R-043	3.32
290673	S-042 C	.75
291017	S-107 1CT	24.05
291019	S-107 1ST	48.1
291018	S-107 2CT	24.05
213941	SCHYLABC	.42
213945	SCHYLKL1	30.58
218360	SEWAREN1	20.05
218361	SEWAREN2	22.74
218362	SEWAREN3	20.62
218363	SEWAREN4	23.89
218364	SEWAREN6	21.37
200833	SEWRDB34	2.72
235619	SOUTH BEND 1	1.47
235620	SOUTH BEND 2	1.47
235621	SOUTH BEND 3	1.49
235622	SOUTH BEND 4	1.47
212449	SUNB CT	.03
209018	SUNBIPCT	.17
209014	SUNBIPP1	.38
209015	SUNBIPP2	.38
209016	SUNBIPP3	.45

Bus Number	Bus Name	Full Contribution
209017	SUNBIPP4	.62
292339	T-109	.19
292344	T-110	.19
292512	T-146 C	12.84
885600	T20SOLAR E	.41
292815	U1-056 C	8.45
889011	U2-015 C	2.64
292966	U2-045 C	.48
293062	U2-076	1.86
293093	U2-077	121.62
297005	V2-003 C	.28
893121	V2-027	.01
297082	V2-035 C	.14
900111	V4-020	121.64
904221	V4-023 C1	1.26
904223	V4-023 C2	.15
904231	V4-024 C1	.7
904233	V4-024 C2	.7
904241	V4-025 C1	.7
904243	V4-025 C2	.43
904245	V4-025 C3	.11
904247	V4-025 C4	.17
904281	V4-029 C	1.41
904361	V4-037 C1	.7
904363	V4-037 C3	.7
904401	V4-041 C	1.41
904411	V4-042 C1	.7
904413	V4-042 C2	.7
LTF	V4-050	32.43
904611	V4-062 C	.21
209019	VIKI IPP	3.47
228700	VNLD 10	4.25
900801	W1-001	2.9
901051	W1-021 C	1.41
901061	W1-022 C	1.41

Bus Number	Bus Name	Full Contribution
901071	W1-023 C	1.41
901141	W1-048 C	.35
901191	W1-068 C	1.41
901241	W1-076 C	.73
901281	W1-085 C	1.41
901291	W1-086 C	1.41
901301	W1-087 C	1.41
901311	W1-088 C	1.41
901321	W1-089 C	1.26
901331	W1-090 C OP1	1.26
901461	W1-117 C	1.41
901471	W1-118 C	1.41
901541	W1-127 C	.22
901561	W1-130 C	.7
902161	W2-010	.16
902171	W2-011	.16
902211	W2-019 C	.43
902251	W2-023	120.54
902271	W2-028	.94
902281	W2-029	.94
902301	W2-035 C	1.11
902321	W2-039	11.65
902341	W2-047 C	.67
902621	W2-101 C	1.41
903251	W3-009 C	.7
903271	W3-022 C OP1	4.06
903311	W3-028 C	8.47
903381	W3-033	1.39
903391	W3-039 C	.5
903501	W3-058 C	.7
903891	W3-157 C	.12
903951	W3-174	35.72
903961	W3-175	68.48
905091	W4-009 OP1	139.24
905131	W4-015 C	25.16

Bus Number	Bus Name	Full Contribution
905141	W4-016	62.9
905161	W4-018 C	.7
905181	W4-021	141.37
905211	W4-025 C	.49
905221	W4-027 C	.56
905291	W4-038 OP1	4.65
905301	W4-040 C	.68
905331	W4-045 C	.64
905391	W4-063 C	.12
209021	WEST IPP	.15
208948	WILL CT	.13
907091	X1-013 OP1	173.34
907241	X1-068	1.92
907281	X1-073 C OP1	.89
907351	X1-085 C	.36
907381	X1-094 C	1.25
907451	X1-108	6.49
909021	X2-012 C	159.82
909081	X2-025	92.53
909091	X2-027 C OP1	.14
909101	X2-028 C OP1	.21
909171	X2-050	127.85
910531	X3-004	6.78
910551	X3-006 C	20.59
910931	X3-085 C	.58
912071	X4-009 C	1.45
912091	X4-012 C OP1	.44
912101	X4-015 C	.36
912111	X4-016	1.94
912131	X4-019	50.49
912141	X4-020	143.53
912151	X4-021	57.41
912191	X4-032 C	.75
912261	X4-044 C	1.91
912291	X4-048 OP1	193.95

Bus Number	Bus Name	Full Contribution
913131	Y1-020 C	.72
913171	Y1-025 C OP1	139.24
913181	Y1-026	30.89
913221	Y1-031 C OP1	2.55
913361	Y1-057 C	.02
913481	Y1-072 C	.15
913511	Y1-077	13.54
913561	Y1-084 C OP1	.15
914021	Y2-013 OP2	154.39
914031	Y2-015 OP2	73.28
914041	Y2-018 C	.14
914051	Y2-037 C	.24
914091	Y2-051 C	.36
914101	Y2-052	14.62
914171	Y2-061 C	1.45
914191	Y2-063 OP2	73.28

Table 15

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	8.14
217006	BERGN26A	4.07
212099	BRMO IPP	.03
219103	BURLNGT8	3.91
219124	BURLNGT9	34.25
228251	CARLLS#4	.89
228000	CEDR#1CT	8.59
228001	CEDR#2CT	4.14
200030	CONE G1	6.65
200031	CONE G2	6.73
228301	D/W 1 ST	14.44
228302	D/W 6 ST	14.81
217078	ESSEX 12	35.64
208981	FOWH IPP	.2
298464	G-030	.87

Bus Number	Bus Name	Full Contribution
206331	GG A1&2	7.76
206332	GG A3&4	7.76
206333	GG B5&6	7.76
206334	GG B7&8	7.76
217081	HUDSON 1	69.54
212174	INGE	.04
217083	KEARNY11	25.24
200032	KEYS G1	8.17
200033	KEYS G2	8.07
209004	KOPP IPP	.04
217086	KRNY9&10	4.07
292590	L-018 E	4.14
208945	LOHA CT	.07
209027	LOR2_Q27 E	16.6
219134	MERCER 3	21.57
227807	MO AV B	3.72
219137	NAT PARK	3.9
204652	PORT1GEN	30.92
204653	PORT2GEN	47.6
295223	Q-028 C	.7
228343	QUINTN#1	.37
295952	R-011	84.43
212384	R-043	.83
212386	R-043	3.32
290673	S-042 C	.75
291017	S-107 1CT	24.05
291019	S-107 1ST	48.1
291018	S-107 2CT	24.05
213941	SCHYLABC	.42
213945	SCHYLKL1	30.58
218360	SEWAREN1	20.05
218361	SEWAREN2	22.74
218362	SEWAREN3	20.62
218363	SEWAREN4	23.89
218364	SEWAREN6	21.37

Bus Number	Bus Name	Full Contribution
200833	SEWRDB34	2.72
235619	SOUTH BEND 1	1.47
235620	SOUTH BEND 2	1.47
235621	SOUTH BEND 3	1.49
235622	SOUTH BEND 4	1.47
212449	SUNB CT	.03
209018	SUNBIPCT	.17
209014	SUNBIPP1	.38
209015	SUNBIPP2	.38
209016	SUNBIPP3	.45
209017	SUNBIPP4	.62
292339	T-109	.19
292344	T-110	.19
292512	T-146 C	12.84
885600	T20SOLAR E	.41
292815	U1-056 C	8.45
889011	U2-015 C	2.64
292966	U2-045 C	.48
293062	U2-076	1.86
293093	U2-077	121.62
297005	V2-003 C	.28
893121	V2-027	.01
297082	V2-035 C	.14
900111	V4-020	121.64
904221	V4-023 C1	1.26
904223	V4-023 C2	.15
904231	V4-024 C1	.7
904233	V4-024 C2	.7
904241	V4-025 C1	.7
904243	V4-025 C2	.43
904245	V4-025 C3	.11
904247	V4-025 C4	.17
904281	V4-029 C	1.41
904361	V4-037 C1	.7
904363	V4-037 C3	.7

Bus Number	Bus Name	Full Contribution
904401	V4-041 C	1.41
904411	V4-042 C1	.7
904413	V4-042 C2	.7
LTF	V4-050	32.43
904611	V4-062 C	.21
209019	VIKI IPP	3.47
228700	VNLD 10	4.25
900801	W1-001	2.9
901051	W1-021 C	1.41
901061	W1-022 C	1.41
901071	W1-023 C	1.41
901141	W1-048 C	.35
901191	W1-068 C	1.41
901241	W1-076 C	.73
901281	W1-085 C	1.41
901291	W1-086 C	1.41
901301	W1-087 C	1.41
901311	W1-088 C	1.41
901321	W1-089 C	1.26
901331	W1-090 C OP1	1.26
901461	W1-117 C	1.41
901471	W1-118 C	1.41
901541	W1-127 C	.22
901561	W1-130 C	.7
902161	W2-010	.16
902171	W2-011	.16
902211	W2-019 C	.43
902251	W2-023	120.54
902271	W2-028	.94
902281	W2-029	.94
902301	W2-035 C	1.11
902321	W2-039	11.65
902341	W2-047 C	.67
902621	W2-101 C	1.41
903251	W3-009 C	.7

Bus Number	Bus Name	Full Contribution
903271	W3-022 C OP1	4.06
903311	W3-028 C	8.47
903381	W3-033	1.39
903391	W3-039 C	.5
903501	W3-058 C	.7
903891	W3-157 C	.12
903951	W3-174	35.72
903961	W3-175	68.48
905091	W4-009 OP1	139.24
905131	W4-015 C	25.16
905141	W4-016	62.9
905161	W4-018 C	.7
905181	W4-021	141.37
905211	W4-025 C	.49
905221	W4-027 C	.56
905291	W4-038 OP1	4.65
905301	W4-040 C	.68
905331	W4-045 C	.64
905391	W4-063 C	.12
209021	WEST IPP	.15
208948	WILL CT	.13
907091	X1-013 OP1	173.34
907241	X1-068	1.92
907281	X1-073 C OP1	.89
907351	X1-085 C	.36
907381	X1-094 C	1.25
907451	X1-108	6.49
909021	X2-012 C	159.82
909081	X2-025	92.53
909091	X2-027 C OP1	.14
909101	X2-028 C OP1	.21
909171	X2-050	127.85
910531	X3-004	6.78
910551	X3-006 C	20.59
910931	X3-085 C	.58

Bus Number	Bus Name	Full Contribution
912071	X4-009 C	1.45
912091	X4-012 C OP1	.44
912101	X4-015 C	.36
912111	X4-016	1.94
912131	X4-019	50.49
912141	X4-020	143.53
912151	X4-021	57.41
912191	X4-032 C	.75
912261	X4-044 C	1.91
912291	X4-048 OP1	193.95
913131	Y1-020 C	.72
913171	Y1-025 C OP1	139.24
913181	Y1-026	30.89
913221	Y1-031 C OP1	2.55
913361	Y1-057 C	.02
913481	Y1-072 C	.15
913511	Y1-077	13.54
913561	Y1-084 C OP1	.15
914021	Y2-013 OP2	154.39
914031	Y2-015 OP2	73.28
914041	Y2-018 C	.14
914051	Y2-037 C	.24
914091	Y2-051 C	.36
914101	Y2-052	14.62
914171	Y2-061 C	1.45
914191	Y2-063 OP2	73.28

Table 16

Bus Number	Bus Name	Full Contribution
208940	ALLE CT	.1
208972	BECR K09	.01
212099	BRMO IPP	.07
208941	FISH CT	.22
208981	FOWH IPP	.4

Bus Number	Bus Name	Full Contribution
208982	GLBT IPP	.65
208943	HARW CT	.11
234304	HUN GEN3	.12
234305	HUN GEN4	.18
234311	HUN GEN5	.17
234312	HUN GEN6	.17
212174	INGE	.08
208944	JENK CT	.08
209004	KOPP IPP	.07
209003	KSTN IPP	.01
292590	L-018 E	2.63
208945	LOHA CT	.13
212265	LOR1_N14_C	.04
209027	LOR2_Q27 E	28.16
208911	MONT G1	6.33
208912	MONT G2	6.46
209006	NEPC IPP	.21
209007	NOEN IPP	.23
295223	Q-028 C	1.38
212384	R-043	1.41
212386	R-043	5.63
290673	S-042 C	1.49
209013	SCEN IPP	.69
212449	SUNB CT	.07
209018	SUNBIPCT	.41
209014	SUNBIPP1	.91
209015	SUNBIPP2	.91
209016	SUNBIPP3	1.07
209017	SUNBIPP4	1.58
208918	SUSQ 1	5.16
889011	U2-015 C	2.17
291936	U4-014 C	.01
893121	V2-027	.02
296063	V3-040 C	.01
209019	VIKI IPP	7.93

Bus Number	Bus Name	Full Contribution
901431	W1-114 C	.01
901441	W1-115 C	.01
903271	W3-022 C OP1	7.48
209029	WAYM IPP	.02
209021	WEST IPP	.31
209022	WHFR IPP	.34
209023	WIENIPP1	.24
209025	WIENIPP3	.24
209026	WIENIPP4	.12
208948	WILL CT	.26
909021	X2-012 C	293.47
912291	X4-048 OP1	73.86
914031	Y2-015 OP2	145.57
914051	Y2-037 C	.4
914191	Y2-063 OP2	145.57

Table 17

Bus Number	Bus Name	Full Contribution
209027	LOR2_Q27 E	-23.71
212449	SUNB CT	.01
209018	SUNBIPCT	.05
209014	SUNBIPP1	.1
209015	SUNBIPP2	.1
209016	SUNBIPP3	.12
209017	SUNBIPP4	.25
LTF	X2-042	2.06
LTF	X3-021	2.16
LTF	Y1-004	2.39
914031	Y2-015 OP2	173.47
LTF	Y2-040	2.16
914191	Y2-063 OP2	173.47

Table 18

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.04
208941	FISH CT	.21
208981	FOWH IPP	.25
208982	GLBT IPP	.61
212174	INGE	.05
209004	KOPP IPP	.02
208945	LOHA CT	.04
212265	LOR1_N14_C	.04
209027	LOR2_Q27 E	26.3
208911	MONT G1	1.98
208912	MONT G2	2.02
295223	Q-028 C	.85
212384	R-043	1.32
212386	R-043	5.26
290673	S-042 C	.92
209013	SCEN IPP	.64
212449	SUNB CT	.01
209018	SUNBIPPCT	.09
209014	SUNBIPP1	.2
209015	SUNBIPP2	.2
209016	SUNBIPP3	.23
209017	SUNBIPP4	.29
893121	V2-027	.
209019	VIKI IPP	1.82
901431	W1-114 C	.01
901441	W1-115 C	.01
903271	W3-022 C OP1	5.69
209021	WEST IPP	.19
209022	WHFR IPP	.32
208948	WILL CT	.07
909021	X2-012 C	87.11
914031	Y2-015 OP2	88.71
914051	Y2-037 C	.37
914191	Y2-063 OP2	88.71

Table 19

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.03
208941	FISH CT	.1
208981	FOWH IPP	.2
208982	GLBT IPP	.28
212174	INGE	.04
209004	KOPP IPP	.03
212265	LOR1_N14_C	.02
212266	LOR1_N14_E	3.26
209020	LOR2_Q27 C	.07
209027	LOR2_Q27 E	12.14
295223	Q-028 C	.68
295230	Q-028 E	27.6
212384	R-043	.61
212386	R-043	2.43
290673	S-042 C	.73
290674	S-042 E	2.93
209013	SCEN IPP	.3
209017	SUNBIPP4	.9
901431	W1-114 C	.
901432	W1-114 E	.28
901441	W1-115 C	.
901442	W1-115 E	.28
903271	W3-022 C OP1	3.47
903272	W3-022 E OP1	23.21
209021	WEST IPP	.15
209022	WHFR IPP	.15
208948	WILL CT	.1
909021	X2-012 C	116.75
909081	X2-025	129.48
912131	X4-019	70.66
914031	Y2-015 OP2	71.51
914051	Y2-037 C	.17
914052	Y2-037 E	.28
914191	Y2-063 OP2	71.51

Table 20

Bus Number	Bus Name	Full Contribution
212266	LOR1_N14_E	1.41
209027	LOR2_Q27 E	5.23
295230	Q-028 E	8.94
212384	R-043	.26
212386	R-043	1.05
290673	S-042 C	.24
290674	S-042 E	.95
208918	SUSQ 1	3.91
889011	U2-015 C	1.38
889012	U2-015 E	9.27
209019	VIKI IPP	1.18
901602	W1-111 E	1.69
901432	W1-114 E	.12
901442	W1-115 E	.12
903271	W3-022 C OP1	1.28
903272	W3-022 E OP1	8.55
909021	X2-012 C	68.33
910782	X3-056 E	6.86
914031	Y2-015 OP2	23.
914051	Y2-037 C	.07
914052	Y2-037 E	.12
914191	Y2-063 OP2	23.

Table 21

Bus Number	Bus Name	Full Contribution
208943	HARW CT	.08
212266	LOR1_N14_E	1.79
209027	LOR2_Q27 E	6.66
209006	NEPC IPP	.16
295230	Q-028 E	11.11
212384	R-043	.33
212386	R-043	1.33
290673	S-042 C	.29

Bus Number	Bus Name	Full Contribution
290674	S-042 E	1.18
208918	SUSQ 1	5.09
889011	U2-015 C	1.85
889012	U2-015 E	12.35
209019	VIKI IPP	1.45
901602	W1-111 E	2.5
901432	W1-114 E	.15
901442	W1-115 E	.15
903271	W3-022 C OP1	1.61
903272	W3-022 E OP1	10.76
209023	WIENIPP1	.18
209025	WIENIPP3	.18
209026	WIENIPP4	.09
909021	X2-012 C	84.78
910782	X3-056 E	8.92
914031	Y2-015 OP2	28.59
914051	Y2-037 C	.09
914052	Y2-037 E	.15
914191	Y2-063 OP2	28.59

Table 22

Bus Number	Bus Name	Full Contribution
901602	W1-111 E	1.57
903271	W3-022 C OP1	.34
903272	W3-022 E OP1	2.24
909021	X2-012 C	14.35
914031	Y2-015 OP2	5.78
914191	Y2-063 OP2	5.78

Table 23

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.08
208981	FOWH IPP	.49

Bus Number	Bus Name	Full Contribution
212174	INGE	.09
209027	LOR2_Q27 E	-23.8
295223	Q-028 C	1.67
290673	S-042 C	1.8
212449	SUNB CT	.01
209018	SUNBIPCT	.05
209014	SUNBIPP1	.1
209015	SUNBIPP2	.1
209016	SUNBIPP3	.12
209017	SUNBIPP4	.25
209021	WEST IPP	.37
914031	Y2-015 OP2	173.74
914191	Y2-063 OP2	173.74

Table 24

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.22
217006	BERGN26A	1.11
217078	ESSEX 12	9.72
206617	EXXON	.36
206331	GG A1&2	2.09
206332	GG A3&4	2.09
206333	GG B5&6	2.09
206334	GG B7&8	2.09
217081	HUDSON 1	18.97
217083	KEARNY11	6.89
217086	KRNY9&10	1.11
209003	KSTN IPP	.01
292590	L-018 E	1.98
212266	LOR1_N14_E	1.38
209027	LOR2_Q27 E	5.12
206679	M&M S721	.57
210888	MACRTR10	.28
200851	MEHOOP3	.48

Bus Number	Bus Name	Full Contribution
294572	P-028 C	.24
294573	P-028 E	42.73
206638	PEAPACK	.21
204652	PORT1GEN	8.88
204653	PORT2GEN	14.04
295230	Q-028 E	8.57
290092	Q-041 E	1.63
212384	R-043	.26
212386	R-043	1.02
290673	S-042 C	.23
290674	S-042 E	.91
218360	SEWAREN1	5.23
218361	SEWAREN2	5.92
218362	SEWAREN3	5.37
218363	SEWAREN4	6.2
218364	SEWAREN6	5.55
889011	U2-015 C	.95
889012	U2-015 E	6.33
293093	U2-077	32.05
299906	U3-032 E	.69
291937	U4-014 E	.37
292095	V1-030 E1	.07
292111	V1-030 E9	.05
292191	V1-030 EC	.24
292092	V1-030 ED	.14
297033	V2-010 E	.34
297069	V2-025 E	.16
293340	V3-005 E	.34
293413	V3-040 E	.37
293444	V3-065 E	.02
293440	V3-066 E	.01
293434	V3-067 E	.03
293429	V3-068 E	.01
904002	V4-001 E	.1
LTF	V4-050	5.86

Bus Number	Bus Name	Full Contribution
209019	VIKI IPP	1.04
900801	W1-001	.76
901262	W1-082 E	.66
901342	W1-101 E	.05
901602	W1-111 E	1.47
901432	W1-114 E	.12
901442	W1-115 E	.12
901512	W1-122 E	.18
901541	W1-127 C	.06
901542	W1-127 E	.1
902251	W2-023	31.52
LTF	W2-033	3.9
902382	W2-052 E	.02
902532	W2-084 E	.35
902572	W2-091 E	.54
903271	W3-022 C OP1	1.24
903272	W3-022 E OP1	8.29
903332	W3-032 E	.27
903391	W3-039 C	.14
903392	W3-039 E	.92
903412	W3-044 E	.67
903562	W3-076 E	.67
903572	W3-077 E	.5
903632	W3-095 E	.5
903672	W3-106 E	.34
903682	W3-110 E	.26
903742	W3-126 E	.6
903822	W3-139 E	.54
903832	W3-140 E	.28
903842	W3-145 E	.6
903852	W3-146 E	.37
903872	W3-154 E	.05
905091	W4-009 OP1	35.16
905122	W4-014 E	.57
905181	W4-021	35.14

Bus Number	Bus Name	Full Contribution
905242	W4-031 E	.13
905291	W4-038 OP1	1.27
905342	W4-046 E	.34
905372	W4-059 E	.02
905402	W4-064 E	.11
905412	W4-065 E	.11
905422	W4-068 E	.27
905442	W4-073 E	.57
905452	W4-080 E	.63
905532	W4-093 E	.23
905542	W4-097 E	.1
209029	WAYM IPP	.02
209031	WAYMART E	6.77
907002	X1-005 E	.33
907012	X1-012 E	.35
907091	X1-013 OP1	27.57
907072	X1-034 E	.04
907152	X1-046 E	.28
907272	X1-072 E	.04
907281	X1-073 C OP1	.24
907282	X1-073 E OP1	.39
907332	X1-082 E	.41
907372	X1-088 E	.4
907381	X1-094 C	.35
907382	X1-094 E	.58
907451	X1-108	1.87
907482	X1-114 E	.07
907492	X1-116 E	.25
909021	X2-012 C	51.37
909171	X2-050	34.88
909302	X2-087 E	.03
909322	X2-089 E	.09
909332	X2-099 E	.34
910522	X3-003 E	7.12
910531	X3-004	1.85

Bus Number	Bus Name	Full Contribution
910582	X3-011 E	.17
910612	X3-029 E	.61
910762	X3-052 E	.16
910782	X3-056 E	3.81
910792	X3-057 E	3.23
910922	X3-083 E	.37
910931	X3-085 C	.16
910932	X3-085 E	.27
912062	X4-007 E	3.35
912091	X4-012 C OP1	.13
912092	X4-012 E OP1	.21
912111	X4-016	.53
912261	X4-044 C	.51
912262	X4-044 E	.92
912291	X4-048 OP1	117.88
913131	Y1-020 C	.21
913132	Y1-020 E	.47
913171	Y1-025 C OP1	35.16
913172	Y1-025 E OP1	2.91
913181	Y1-026	8.13
913221	Y1-031 C OP1	.7
913222	Y1-031 E OP1	5.36
913311	Y1-047 OP1	5.48
913481	Y1-072 C	.04
913482	Y1-072 E	.06
913561	Y1-084 C OP1	.04
913562	Y1-084 E OP1	.07
914021	Y2-013 OP2	40.57
914031	Y2-015 OP2	22.05
914041	Y2-018 C	.04
914042	Y2-018 E	.07
914051	Y2-037 C	.07
914052	Y2-037 E	.12
914061	Y2-042	3.26
914161	Y2-060	1.25

Bus Number	Bus Name	Full Contribution
914191	Y2-063 OP2	22.05

Table 25

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.08
208941	FISH CT	.32
208981	FOWH IPP	.52
208982	GLBT IPP	.93
212174	INGE	.1
209004	KOPP IPP	.08
292590	L-018 E	3.04
208945	LOHA CT	.15
212265	LOR1_N14_C	.06
212266	LOR1_N14_E	10.78
209020	LOR2_Q27 C	.23
209027	LOR2_Q27 E	40.12
295223	Q-028 C	1.77
295230	Q-028 E	72.49
212384	R-043	2.01
212386	R-043	8.02
290673	S-042 C	1.92
290674	S-042 E	7.68
209013	SCEN IPP	.98
212449	SUNB CT	.08
209018	SUNBIPCT	.46
209014	SUNBIPP1	1.01
209015	SUNBIPP2	1.01
209016	SUNBIPP3	1.19
209017	SUNBIPP4	1.73
889011	U2-015 C	2.6
889012	U2-015 E	17.4
893121	V2-027	.02
209019	VIKI IPP	8.9
901602	W1-111 E	4.41

Bus Number	Bus Name	Full Contribution
901431	W1-114 C	.01
901432	W1-114 E	.93
901441	W1-115 C	.01
901442	W1-115 E	.93
903271	W3-022 C OP1	10.09
903272	W3-022 E OP1	67.55
209021	WEST IPP	.39
209022	WHFR IPP	.49
208948	WILL CT	.3
909021	X2-012 C	341.14
910782	X3-056 E	10.63
912291	X4-048 OP1	84.6
914031	Y2-015 OP2	186.83
914051	Y2-037 C	.57
914052	Y2-037 E	.93
914191	Y2-063 OP2	186.83

Table 26

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.08
208981	FOWH IPP	.49
212174	INGE	.09
209027	LOR2_Q27 E	-23.8
295223	Q-028 C	1.67
290673	S-042 C	1.8
212449	SUNB CT	.01
209018	SUNBIPCT	.05
209014	SUNBIPP1	.1
209015	SUNBIPP2	.1
209016	SUNBIPP3	.12
209017	SUNBIPP4	.25
903271	W3-022 C OP1	11.7
209021	WEST IPP	.37
914031	Y2-015 OP2	173.74

Bus Number	Bus Name	Full Contribution
914191	Y2-063 OP2	173.74

Table 27

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.08
208941	FISH CT	.32
208981	FOWH IPP	.53
208982	GLBT IPP	.95
212174	INGE	.1
209004	KOPP IPP	.09
292590	L-018 E	3.21
208945	LOHA CT	.16
212265	LOR1_N14_C	.06
212266	LOR1_N14_E	10.95
209020	LOR2_Q27 C	.23
209027	LOR2_Q27 E	40.73
295223	Q-028 C	1.8
295230	Q-028 E	73.48
212384	R-043	2.04
212386	R-043	8.15
290673	S-042 C	1.95
290674	S-042 E	7.79
209013	SCEN IPP	.99
212449	SUNB CT	.08
209018	SUNBIPCT	.46
209014	SUNBIPP1	1.03
209015	SUNBIPP2	1.03
209016	SUNBIPP3	1.21
209017	SUNBIPP4	1.75
889011	U2-015 C	2.85
889012	U2-015 E	19.08
893121	V2-027	.02
209019	VIKI IPP	9.02
901602	W1-111 E	4.76

Bus Number	Bus Name	Full Contribution
901431	W1-114 C	.01
901432	W1-114 E	.95
901441	W1-115 C	.01
901442	W1-115 E	.95
903271	W3-022 C OP1	10.24
903272	W3-022 E OP1	68.52
209031	WAYMART E	6.13
209021	WEST IPP	.4
209022	WHFR IPP	.5
208948	WILL CT	.3
909021	X2-012 C	347.51
910782	X3-056 E	11.2
912291	X4-048 OP1	88.61
914031	Y2-015 OP2	189.37
914051	Y2-037 C	.58
914052	Y2-037 E	.95
914191	Y2-063 OP2	189.37

Table 28

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.35
208972	BECR K09	.01
217006	BERGN26A	1.18
212099	BRMO IPP	.01
217078	ESSEX 12	10.31
208941	FISH CT	.04
208981	FOWH IPP	.06
206331	GG A1&2	2.21
206332	GG A3&4	2.21
206333	GG B5&6	2.21
206334	GG B7&8	2.21
208982	GLBT IPP	.13
208943	HARW CT	.05
217081	HUDSON 1	20.12

Bus Number	Bus Name	Full Contribution
234304	HUN GEN3	.06
234305	HUN GEN4	.09
234311	HUN GEN5	.1
234312	HUN GEN6	.1
212174	INGE	.01
208944	JENK CT	.06
217083	KEARNY11	7.3
209004	KOPP IPP	.01
217086	KRNY9&10	1.18
209003	KSTN IPP	.01
292590	L-018 E	2.08
208945	LOHA CT	.02
212265	LOR1_N14_C	.01
209027	LOR2_Q27 E	5.41
208911	MONT G1	1.23
208912	MONT G2	1.25
209006	NEPC IPP	.09
209010	PEIP 1	.07
209009	PEIP 2	.12
204652	PORT1GEN	9.41
204653	PORT2GEN	14.85
295223	Q-028 C	.22
295952	R-011	22.57
212384	R-043	.27
212386	R-043	1.08
290673	S-042 C	.24
209013	SCEN IPP	.13
218360	SEWAREN1	5.56
218361	SEWAREN2	6.28
218362	SEWAREN3	5.7
218363	SEWAREN4	6.59
218364	SEWAREN6	5.89
204654	SHAW CT	.03
212449	SUNB CT	.01
209018	SUNBIPCT	.05

Bus Number	Bus Name	Full Contribution
209014	SUNBIPP1	.12
209015	SUNBIPP2	.12
209016	SUNBIPP3	.14
208918	SUSQ 1	2.29
200038	SUSQ 2	1.95
889011	U2-015 C	1.
293093	U2-077	34.03
893121	V2-027	.
LTF	V4-050	6.27
209019	VIKI IPP	1.1
900801	W1-001	.81
901241	W1-076 C	.2
901431	W1-114 C	.
901441	W1-115 C	.
901541	W1-127 C	.07
902251	W2-023	33.47
LTF	W2-033	4.78
903271	W3-022 C OP1	1.31
903391	W3-039 C	.15
905091	W4-009 OP1	37.37
905181	W4-021	37.37
905291	W4-038 OP1	1.35
209029	WAYM IPP	.02
209021	WEST IPP	.05
209022	WHFR IPP	.07
209023	WIENIPP1	.1
209025	WIENIPP3	.1
209026	WIENIPP4	.05
208948	WILL CT	.04
208920	WLPK	.09
907241	X1-068	.51
907281	X1-073 C OP1	.26
907381	X1-094 C	.37
907451	X1-108	1.98
909021	X2-012 C	54.21

Bus Number	Bus Name	Full Contribution
909081	X2-025	21.49
909171	X2-050	36.99
910531	X3-004	1.96
910931	X3-085 C	.17
912091	X4-012 C OP1	.14
912111	X4-016	.56
912131	X4-019	11.72
912261	X4-044 C	.54
912291	X4-048 OP1	123.19
913131	Y1-020 C	.22
913171	Y1-025 C OP1	37.37
913181	Y1-026	8.64
913221	Y1-031 C OP1	.74
913481	Y1-072 C	.04
913561	Y1-084 C OP1	.05
914021	Y2-013 OP2	43.07
914031	Y2-015 OP2	23.31
914041	Y2-018 C	.04
914051	Y2-037 C	.08
914061	Y2-042	1.36
914191	Y2-063 OP2	23.31

Table 29

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.83
208972	BECK K09	.01
217006	BERGN26A	1.41
219103	BURLNGT8	1.05
219124	BURLNGT9	9.21
228000	CEDR#1CT	2.45
228001	CEDR#2CT	1.18
217078	ESSEX 12	12.4
206331	GG A1&2	2.67
206332	GG A3&4	2.67

Bus Number	Bus Name	Full Contribution
206333	GG B5&6	2.67
206334	GG B7&8	2.67
208943	HARW CT	.07
217081	HUDSON 1	24.19
234304	HUN GEN3	.08
234305	HUN GEN4	.12
234311	HUN GEN5	.13
234312	HUN GEN6	.13
208944	JENK CT	.08
217083	KEARNY11	8.78
209004	KOPP IPP	.02
217086	KRNY9&10	1.41
209003	KSTN IPP	.02
292590	L-018 E	2.61
208945	LOHA CT	.03
209027	LOR2_Q27 E	7.82
227807	MO AV B	1.01
208911	MONT G1	1.78
208912	MONT G2	1.82
209006	NEPC IPP	.12
209010	PEIP 1	.08
209009	PEIP 2	.14
204652	PORT1GEN	11.48
204653	PORT2GEN	18.18
295952	R-011	26.77
212384	R-043	.39
212386	R-043	1.56
290673	S-042 C	.36
218360	SEWAREN1	6.63
218361	SEWAREN2	7.5
218362	SEWAREN3	6.8
218363	SEWAREN4	7.85
218364	SEWAREN6	7.02
212449	SUNB CT	.01
209018	SUNBIPCT	.08

Bus Number	Bus Name	Full Contribution
209014	SUNBIPP1	.19
209015	SUNBIPP2	.19
209016	SUNBIPP3	.22
208918	SUSQ 1	3.07
292815	U1-056 C	2.29
889011	U2-015 C	1.32
292966	U2-045 C	.13
293093	U2-077	40.69
893121	V2-027	.
LTF	V4-050	7.12
209019	VIKI IPP	1.68
900801	W1-001	.97
901241	W1-076 C	.23
901541	W1-127 C	.08
902211	W2-019 C	.13
902251	W2-023	39.97
LTF	W2-033	4.37
903271	W3-022 C OP1	1.92
903311	W3-028 C	2.43
903381	W3-033	.38
903391	W3-039 C	.18
905091	W4-009 OP1	44.36
905181	W4-021	44.23
905211	W4-025 C	.14
905291	W4-038 OP1	1.62
905331	W4-045 C	.19
905391	W4-063 C	.03
209029	WAYM IPP	.03
209023	WIENIPP1	.14
209025	WIENIPP3	.14
209026	WIENIPP4	.07
208948	WILL CT	.07
208920	WLPK	.11
907091	X1-013 OP1	31.41
907241	X1-068	.61

Bus Number	Bus Name	Full Contribution
907281	X1-073 C OP1	.31
907351	X1-085 C	.11
907381	X1-094 C	.45
907451	X1-108	2.44
909021	X2-012 C	79.31
909081	X2-025	42.02
909171	X2-050	44.47
910531	X3-004	2.36
910931	X3-085 C	.21
912091	X4-012 C OP1	.17
912101	X4-015 C	.1
912111	X4-016	.67
912131	X4-019	22.93
912261	X4-044 C	.65
912291	X4-048 OP1	147.93
913131	Y1-020 C	.27
913171	Y1-025 C OP1	44.36
913181	Y1-026	10.32
913221	Y1-031 C OP1	.89
913481	Y1-072 C	.05
913561	Y1-084 C OP1	.06
914021	Y2-013 OP2	51.46
914031	Y2-015 OP2	34.75
914041	Y2-018 C	.05
914051	Y2-037 C	.11
914091	Y2-051 C	.11
914191	Y2-063 OP2	34.75

Table 30

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.05
208941	FISH CT	.26
208981	FOWH IPP	.34
208982	GLBT IPP	.76

Bus Number	Bus Name	Full Contribution
212174	INGE	.06
209004	KOPP IPP	.04
208945	LOHA CT	.07
212265	LOR1_N14_C	.05
209027	LOR2_Q27 E	32.62
295223	Q-028 C	1.16
212384	R-043	1.63
212386	R-043	6.52
290673	S-042 C	1.25
209013	SCEN IPP	.79
212449	SUNB CT	.03
209018	SUNBIPCT	.18
209014	SUNBIPP1	.4
209015	SUNBIPP2	.4
209016	SUNBIPP3	.47
209017	SUNBIPP4	.64
893121	V2-027	.01
209019	VIKI IPP	3.57
901431	W1-114 C	.01
901441	W1-115 C	.01
903271	W3-022 C OP1	7.36
209021	WEST IPP	.26
209022	WHFR IPP	.4
208948	WILL CT	.13
909021	X2-012 C	152.97
909081	X2-025	91.53
912131	X4-019	49.95
914031	Y2-015 OP2	121.01
914051	Y2-037 C	.46
914191	Y2-063 OP2	121.01

Table 31

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.16

Bus Number	Bus Name	Full Contribution
208941	FISH CT	.22
208981	FOWH IPP	.97
208982	GLBT IPP	.64
212174	INGE	.18
212265	LOR1_N14_C	.04
209027	LOR2_Q27 E	27.58
295223	Q-028 C	3.31
212384	R-043	1.38
212386	R-043	5.52
290673	S-042 C	3.58
209013	SCEN IPP	.67
901431	W1-114 C	.01
901441	W1-115 C	.01
903271	W3-022 C OP1	19.39
209021	WEST IPP	.73
209022	WHFR IPP	.34
914031	Y2-015 OP2	348.07
914051	Y2-037 C	.39
914191	Y2-063 OP2	348.07

Table 32

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.83
208972	BECR K09	.01
217006	BERGN26A	1.42
219103	BURLNGT8	1.05
219124	BURLNGT9	9.22
228000	CEDR#1CT	2.46
228001	CEDR#2CT	1.18
217078	ESSEX 12	12.41
206617	EXXON	.46
206331	GG A1&2	2.67
206332	GG A3&4	2.67
206333	GG B5&6	2.67

Bus Number	Bus Name	Full Contribution
206334	GG B7&8	2.67
217081	HUDSON 1	24.22
234304	HUN GEN3	.08
234305	HUN GEN4	.12
234311	HUN GEN5	.13
234312	HUN GEN6	.13
208944	JENK CT	.08
217083	KEARNY11	8.79
217086	KRNY9&10	1.42
209003	KSTN IPP	.02
292590	L-018 E	2.61
212266	LOR1_N14_E	2.1
209027	LOR2_Q27 E	7.83
206679	M&M S721	.74
210888	MACRTR10	.37
219134	MERCER 3	5.8
227807	MO AV B	1.01
206638	PEAPACK	.27
209010	PEIP 1	.08
209009	PEIP 2	.14
204652	PORT1GEN	11.49
204653	PORT2GEN	18.19
295230	Q-028 E	13.51
290092	Q-041 E	2.08
295952	R-011	26.8
212384	R-043	.39
212386	R-043	1.57
290673	S-042 C	.36
290674	S-042 E	1.43
218360	SEWAREN1	6.64
218361	SEWAREN2	7.51
218362	SEWAREN3	6.81
218363	SEWAREN4	7.86
218364	SEWAREN6	7.03
208918	SUSQ 1	3.07

Bus Number	Bus Name	Full Contribution
885600	T20SOLAR E	.11
292815	U1-056 C	2.29
292816	U1-056 E	15.33
889011	U2-015 C	1.32
889012	U2-015 E	8.86
292966	U2-045 C	.13
292967	U2-045 E	.88
293062	U2-076	.5
293093	U2-077	40.74
299906	U3-032 E	.87
291937	U4-014 E	.5
292095	V1-030 E1	.09
292185	V1-030 E2	.24
292099	V1-030 E3	.05
292101	V1-030 E4	.05
292103	V1-030 E5	.14
292107	V1-030 E7	.04
292087	V1-030 E8	.05
292111	V1-030 E9	.06
292189	V1-030 EA	.29
292191	V1-030 EC	.31
292092	V1-030 ED	.18
297021	V2-009 E1	.09
297023	V2-009 E2	.18
297025	V2-009 E3	.23
297027	V2-009 E4	.13
297033	V2-010 E	.43
297039	V2-013 E	.02
297069	V2-025 E	.21
293340	V3-005 E	.43
293378	V3-024 E	.18
293413	V3-040 E	.5
292666	V3-058 E	.12
292668	V3-059 E	.12
293444	V3-065 E	.02

Bus Number	Bus Name	Full Contribution
293440	V3-066 E	.02
293434	V3-067 E	.03
293429	V3-068 E	.02
292681	V3-069 E	.08
292683	V3-070 E	.31
904002	V4-001 E	.13
904042	V4-005 E	.09
LTF	V4-050	7.12
900462	V4-067 E	.08
904682	V4-069 E	.11
904692	V4-070 E	.11
209019	VIKI IPP	1.69
900801	W1-001	.97
901082	W1-024 E	.14
901102	W1-032 E	.11
901241	W1-076 C	.23
901242	W1-076 E	.38
901262	W1-082 E	.85
901342	W1-101 E	.06
901602	W1-111 E	2.06
901422	W1-113 E	.29
901432	W1-114 E	.18
901442	W1-115 E	.18
901482	W1-119 E	.61
901492	W1-120 E	.68
901502	W1-121 E	.28
901512	W1-122 E	.23
901522	W1-124 E	.62
901541	W1-127 C	.08
901542	W1-127 E	.13
901552	W1-129 E	.17
901572	W1-132 E	.12
902192	W2-016 E	.59
902211	W2-019 C	.13
902212	W2-019 E	.2

Bus Number	Bus Name	Full Contribution
902251	W2-023	40.02
902292	W2-030 E	.31
LTF	W2-033	4.37
902312	W2-036 E	.03
902372	W2-050 E	.61
902382	W2-052 E	.03
902392	W2-056 E	.34
902412	W2-060 E	.62
902422	W2-061 E	.11
902432	W2-071 E	.09
902452	W2-074 E	.06
902472	W2-076 E	.07
902482	W2-078 E	.33
902522	W2-083 E	.67
902532	W2-084 E	.45
902542	W2-085 E	.38
902552	W2-088 E	.61
902562	W2-090 E	.62
902572	W2-091 E	.7
902632	W2-102 E	.22
903222	W3-003 E	.62
903271	W3-022 C OP1	1.92
903272	W3-022 E OP1	12.87
903292	W3-025 E	.11
903302	W3-026 E	.16
903311	W3-028 C	2.43
903312	W3-028 E	16.39
903322	W3-029 E	.65
903332	W3-032 E	.35
903381	W3-033	.38
903391	W3-039 C	.18
903392	W3-039 E	1.17
903402	W3-041 E	.31
903412	W3-044 E	.87
903422	W3-045 E	.11

Bus Number	Bus Name	Full Contribution
903492	W3-057 E	.63
903562	W3-076 E	.87
903572	W3-077 E	.65
903582	W3-078 E	.47
903592	W3-079 E	.5
903602	W3-080 E	.62
903632	W3-095 E	.65
903672	W3-106 E	.44
903682	W3-110 E	.33
903722	W3-120 E	.58
903732	W3-124 E	.09
903742	W3-126 E	.77
903822	W3-139 E	.7
903832	W3-140 E	.36
903842	W3-145 E	.78
903852	W3-146 E	.47
903862	W3-149 E	.67
903872	W3-154 E	.07
903902	W3-158 E	.27
903912	W3-159 E	.42
905091	W4-009 OP1	44.42
905112	W4-011 E	.53
905122	W4-014 E	.74
905181	W4-021	44.29
905211	W4-025 C	.14
905212	W4-025 E	.24
905232	W4-029 E	.09
905242	W4-031 E	.17
905291	W4-038 OP1	1.62
905331	W4-045 C	.19
905332	W4-045 E	.31
905342	W4-046 E	.43
905352	W4-053 E	.12
905362	W4-058 E	.02
905372	W4-059 E	.03

Bus Number	Bus Name	Full Contribution
905391	W4-063 C	.03
905392	W4-063 E	.22
905402	W4-064 E	.14
905412	W4-065 E	.14
905422	W4-068 E	.35
905432	W4-072 E	.58
905442	W4-073 E	.73
905452	W4-080 E	.79
905532	W4-093 E	.29
905542	W4-097 E	.13
905562	W4-103 E	.22
209029	WAYM IPP	.03
209031	WAYMART E	8.59
208920	WLPK	.11
907002	X1-005 E	.43
907012	X1-012 E	.45
907091	X1-013 OP1	30.92
907072	X1-034 E	.05
907082	X1-037 E	.61
907132	X1-043 E	.1
907152	X1-046 E	.36
907162	X1-049 E	.12
907202	X1-054 E	.31
907222	X1-066 E	.05
907241	X1-068	.61
907272	X1-072 E	.05
907281	X1-073 C OP1	.31
907282	X1-073 E OP1	.51
907332	X1-082 E	.52
907351	X1-085 C	.11
907352	X1-085 E	.17
907372	X1-088 E	.51
907381	X1-094 C	.45
907382	X1-094 E	.75
907451	X1-108	2.44

Bus Number	Bus Name	Full Contribution
907482	X1-114 E	.09
907492	X1-116 E	.32
909021	X2-012 C	79.37
909081	X2-025	42.05
909122	X2-033 E	.11
909171	X2-050	44.52
909192	X2-054 E	.62
909212	X2-059 E	.35
909252	X2-075 E	.23
909302	X2-087 E	.04
909312	X2-088 E	.09
909322	X2-089 E	.11
909332	X2-099 E	.44
910531	X3-004	2.36
910562	X3-007 E	.11
910582	X3-011 E	.22
910612	X3-029 E	.79
910692	X3-043 E	.37
910762	X3-052 E	.2
910782	X3-056 E	5.38
910792	X3-057 E	4.73
910922	X3-083 E	.47
910931	X3-085 C	.21
910932	X3-085 E	.35
912042	X4-005 E	3.68
912062	X4-007 E	4.3
912091	X4-012 C OP1	.17
912092	X4-012 E OP1	.27
912101	X4-015 C	.1
912102	X4-015 E	.17
912111	X4-016	.67
912131	X4-019	22.94
912182	X4-031 E	.12
912261	X4-044 C	.65
912262	X4-044 E	1.18

Bus Number	Bus Name	Full Contribution
912291	X4-048 OP1	147.99
913131	Y1-020 C	.27
913132	Y1-020 E	.61
913171	Y1-025 C OP1	44.42
913172	Y1-025 E OP1	3.68
913181	Y1-026	10.33
913221	Y1-031 C OP1	.89
913222	Y1-031 E OP1	6.85
913481	Y1-072 C	.05
913482	Y1-072 E	.08
913502	Y1-075 E	.09
913561	Y1-084 C OP1	.06
913562	Y1-084 E OP1	.09
914021	Y2-013 OP2	51.53
914031	Y2-015 OP2	34.78
914041	Y2-018 C	.05
914042	Y2-018 E	.08
914051	Y2-037 C	.11
914052	Y2-037 E	.18
914091	Y2-051 C	.11
914092	Y2-051 E	.18
914191	Y2-063 OP2	34.78

Table 33

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.83
208972	BEGR K09	.01
217006	BERGN26A	1.42
219103	BURLNGT8	1.05
219124	BURLNGT9	9.22
228000	CEDR#1CT	2.46
228001	CEDR#2CT	1.18
217078	ESSEX 12	12.41
206617	EXXON	.46

Bus Number	Bus Name	Full Contribution
206331	GG A1&2	2.67
206332	GG A3&4	2.67
206333	GG B5&6	2.67
206334	GG B7&8	2.67
217081	HUDSON 1	24.22
234304	HUN GEN3	.08
234305	HUN GEN4	.12
234311	HUN GEN5	.13
234312	HUN GEN6	.13
208944	JENK CT	.08
217083	KEARNY11	8.79
217086	KRNY9&10	1.42
209003	KSTN IPP	.02
292590	L-018 E	2.61
212266	LOR1_N14_E	2.1
209027	LOR2_Q27 E	7.83
206679	M&M S721	.74
210888	MACRTR10	.37
219134	MERCER 3	5.8
227807	MO AV B	1.01
206638	PEAPACK	.27
209010	PEIP 1	.08
209009	PEIP 2	.14
204652	PORT1GEN	11.49
204653	PORT2GEN	18.19
295230	Q-028 E	13.51
290092	Q-041 E	2.08
295952	R-011	26.81
212384	R-043	.39
212386	R-043	1.57
290673	S-042 C	.36
290674	S-042 E	1.43
218360	SEWAREN1	6.64
218361	SEWAREN2	7.51
218362	SEWAREN3	6.81

Bus Number	Bus Name	Full Contribution
218363	SEWAREN4	7.86
218364	SEWAREN6	7.03
208918	SUSQ 1	3.07
885600	T20SOLAR E	.11
292815	U1-056 C	2.29
292816	U1-056 E	15.33
889011	U2-015 C	1.32
889012	U2-015 E	8.86
292966	U2-045 C	.13
292967	U2-045 E	.88
293062	U2-076	.5
293093	U2-077	40.74
299906	U3-032 E	.87
291937	U4-014 E	.5
292095	V1-030 E1	.09
292185	V1-030 E2	.24
292099	V1-030 E3	.05
292101	V1-030 E4	.05
292103	V1-030 E5	.14
292107	V1-030 E7	.04
292087	V1-030 E8	.05
292111	V1-030 E9	.06
292189	V1-030 EA	.29
292191	V1-030 EC	.31
292092	V1-030 ED	.18
297021	V2-009 E1	.09
297023	V2-009 E2	.18
297025	V2-009 E3	.23
297027	V2-009 E4	.13
297033	V2-010 E	.43
297039	V2-013 E	.02
297069	V2-025 E	.21
293340	V3-005 E	.43
293378	V3-024 E	.18
293413	V3-040 E	.5

Bus Number	Bus Name	Full Contribution
292666	V3-058 E	.12
292668	V3-059 E	.12
293444	V3-065 E	.02
293440	V3-066 E	.02
293434	V3-067 E	.03
293429	V3-068 E	.02
292681	V3-069 E	.08
292683	V3-070 E	.31
904002	V4-001 E	.13
904042	V4-005 E	.09
LTF	V4-050	7.12
900462	V4-067 E	.08
904682	V4-069 E	.11
904692	V4-070 E	.11
209019	VIKI IPP	1.69
900801	W1-001	.97
901082	W1-024 E	.14
901102	W1-032 E	.11
901241	W1-076 C	.23
901242	W1-076 E	.38
901262	W1-082 E	.85
901342	W1-101 E	.06
901602	W1-111 E	2.06
901422	W1-113 E	.29
901432	W1-114 E	.18
901442	W1-115 E	.18
901482	W1-119 E	.61
901492	W1-120 E	.68
901502	W1-121 E	.28
901512	W1-122 E	.23
901522	W1-124 E	.62
901541	W1-127 C	.08
901542	W1-127 E	.13
901552	W1-129 E	.17
901572	W1-132 E	.12

Bus Number	Bus Name	Full Contribution
902192	W2-016 E	.59
902211	W2-019 C	.13
902212	W2-019 E	.2
902251	W2-023	40.02
902292	W2-030 E	.31
LTF	W2-033	4.37
902312	W2-036 E	.03
902372	W2-050 E	.61
902382	W2-052 E	.03
902392	W2-056 E	.34
902412	W2-060 E	.62
902422	W2-061 E	.11
902432	W2-071 E	.09
902452	W2-074 E	.06
902472	W2-076 E	.07
902482	W2-078 E	.33
902522	W2-083 E	.67
902532	W2-084 E	.45
902542	W2-085 E	.38
902552	W2-088 E	.61
902562	W2-090 E	.62
902572	W2-091 E	.7
902632	W2-102 E	.22
903222	W3-003 E	.62
903271	W3-022 C OP1	1.92
903272	W3-022 E OP1	12.87
903292	W3-025 E	.11
903302	W3-026 E	.16
903311	W3-028 C	2.43
903312	W3-028 E	16.39
903322	W3-029 E	.65
903332	W3-032 E	.35
903381	W3-033	.38
903391	W3-039 C	.18
903392	W3-039 E	1.17

Bus Number	Bus Name	Full Contribution
903402	W3-041 E	.31
903412	W3-044 E	.87
903422	W3-045 E	.11
903492	W3-057 E	.63
903562	W3-076 E	.87
903572	W3-077 E	.65
903582	W3-078 E	.47
903592	W3-079 E	.5
903602	W3-080 E	.62
903632	W3-095 E	.65
903672	W3-106 E	.44
903682	W3-110 E	.33
903722	W3-120 E	.58
903732	W3-124 E	.09
903742	W3-126 E	.77
903822	W3-139 E	.7
903832	W3-140 E	.36
903842	W3-145 E	.78
903852	W3-146 E	.47
903862	W3-149 E	.67
903872	W3-154 E	.07
903902	W3-158 E	.27
903912	W3-159 E	.42
905091	W4-009 OP1	44.42
905112	W4-011 E	.53
905122	W4-014 E	.74
905181	W4-021	44.29
905211	W4-025 C	.14
905212	W4-025 E	.24
905232	W4-029 E	.09
905242	W4-031 E	.17
905291	W4-038 OP1	1.62
905331	W4-045 C	.19
905332	W4-045 E	.31
905342	W4-046 E	.43

Bus Number	Bus Name	Full Contribution
905352	W4-053 E	.12
905362	W4-058 E	.02
905372	W4-059 E	.03
905391	W4-063 C	.03
905392	W4-063 E	.22
905402	W4-064 E	.14
905412	W4-065 E	.14
905422	W4-068 E	.35
905432	W4-072 E	.58
905442	W4-073 E	.73
905452	W4-080 E	.79
905532	W4-093 E	.29
905542	W4-097 E	.13
905562	W4-103 E	.22
209029	WAYM IPP	.03
209031	WAYMART E	8.59
208920	WLPK	.11
907002	X1-005 E	.43
907012	X1-012 E	.45
907091	X1-013 OP1	30.92
907072	X1-034 E	.05
907082	X1-037 E	.61
907132	X1-043 E	.1
907152	X1-046 E	.36
907162	X1-049 E	.12
907202	X1-054 E	.31
907222	X1-066 E	.05
907241	X1-068	.61
907272	X1-072 E	.05
907281	X1-073 C OP1	.31
907282	X1-073 E OP1	.51
907332	X1-082 E	.52
907351	X1-085 C	.11
907352	X1-085 E	.17
907372	X1-088 E	.51

Bus Number	Bus Name	Full Contribution
907381	X1-094 C	.45
907382	X1-094 E	.75
907451	X1-108	2.44
907482	X1-114 E	.09
907492	X1-116 E	.32
909021	X2-012 C	79.37
909081	X2-025	42.05
909122	X2-033 E	.11
909171	X2-050	44.52
909192	X2-054 E	.62
909212	X2-059 E	.35
909252	X2-075 E	.23
909302	X2-087 E	.04
909312	X2-088 E	.09
909322	X2-089 E	.11
909332	X2-099 E	.44
910531	X3-004	2.36
910562	X3-007 E	.11
910582	X3-011 E	.22
910612	X3-029 E	.79
910692	X3-043 E	.37
910762	X3-052 E	.2
910782	X3-056 E	5.38
910792	X3-057 E	4.73
910922	X3-083 E	.47
910931	X3-085 C	.21
910932	X3-085 E	.35
912042	X4-005 E	3.68
912062	X4-007 E	4.3
912091	X4-012 C OP1	.17
912092	X4-012 E OP1	.27
912101	X4-015 C	.1
912102	X4-015 E	.17
912111	X4-016	.67
912131	X4-019	22.94

Bus Number	Bus Name	Full Contribution
912182	X4-031 E	.12
912261	X4-044 C	.65
912262	X4-044 E	1.18
912291	X4-048 OP1	147.99
913131	Y1-020 C	.27
913132	Y1-020 E	.61
913171	Y1-025 C OP1	44.42
913172	Y1-025 E OP1	3.68
913181	Y1-026	10.34
913221	Y1-031 C OP1	.89
913222	Y1-031 E OP1	6.85
913481	Y1-072 C	.05
913482	Y1-072 E	.08
913502	Y1-075 E	.09
913561	Y1-084 C OP1	.06
913562	Y1-084 E OP1	.09
914021	Y2-013 OP2	51.54
914031	Y2-015 OP2	34.78
914041	Y2-018 C	.05
914042	Y2-018 E	.08
914051	Y2-037 C	.11
914052	Y2-037 E	.18
914091	Y2-051 C	.11
914092	Y2-051 E	.18
914191	Y2-063 OP2	34.78

Table 34

Bus Number	Bus Name	Full Contribution
914031	Y2-015 OP2	350.
914191	Y2-063 OP2	350.

Table 35

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.05
208941	FISH CT	.26
208981	FOWH IPP	.34
208982	GLBT IPP	.76
212174	INGE	.06
209004	KOPP IPP	.04
208945	LOHA CT	.07
212265	LOR1_N14_C	.05
212266	LOR1_N14_E	8.77
209020	LOR2_Q27 C	.18
209027	LOR2_Q27 E	32.62
295223	Q-028 C	1.16
295230	Q-028 E	47.24
212384	R-043	1.63
212386	R-043	6.52
290673	S-042 C	1.25
290674	S-042 E	4.99
209013	SCEN IPP	.79
212449	SUNB CT	.03
209018	SUNBIPCT	.18
209014	SUNBIPP1	.4
209015	SUNBIPP2	.4
209016	SUNBIPP3	.47
209017	SUNBIPP4	.64
893121	V2-027	.01
209019	VIKI IPP	3.57
901602	W1-111 E	1.13
901431	W1-114 C	.01
901432	W1-114 E	.76
901441	W1-115 C	.01
901442	W1-115 E	.76
903271	W3-022 C OP1	7.36

Bus Number	Bus Name	Full Contribution
903272	W3-022 E OP1	49.25
209021	WEST IPP	.26
209022	WHFR IPP	.4
208948	WILL CT	.13
909021	X2-012 C	152.97
909081	X2-025	91.53
910782	X3-056 E	3.64
912131	X4-019	49.95
914031	Y2-015 OP2	121.01
914051	Y2-037 C	.46
914052	Y2-037 E	.76
914191	Y2-063 OP2	121.01

Table 36

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.05
208941	FISH CT	.26
208981	FOWH IPP	.34
208982	GLBT IPP	.76
212174	INGE	.06
209004	KOPP IPP	.04
208945	LOHA CT	.07
212265	LOR1_N14_C	.05
212266	LOR1_N14_E	8.77
209020	LOR2_Q27 C	.18
209027	LOR2_Q27 E	32.62
295223	Q-028 C	1.16
295230	Q-028 E	47.24
212384	R-043	1.63
212386	R-043	6.52
290673	S-042 C	1.25
290674	S-042 E	4.99
209013	SCEN IPP	.79
212449	SUNB CT	.03

Bus Number	Bus Name	Full Contribution
209018	SUNBIPCT	.18
209014	SUNBIPP1	.4
209015	SUNBIPP2	.4
209016	SUNBIPP3	.47
209017	SUNBIPP4	.64
893121	V2-027	.01
209019	VIKI IPP	3.57
901602	W1-111 E	1.13
901431	W1-114 C	.01
901432	W1-114 E	.76
901441	W1-115 C	.01
901442	W1-115 E	.76
903271	W3-022 C OP1	7.36
903272	W3-022 E OP1	49.25
209021	WEST IPP	.26
209022	WHFR IPP	.4
208948	WILL CT	.13
909021	X2-012 C	152.97
909081	X2-025	91.53
910782	X3-056 E	3.64
912131	X4-019	49.95
914031	Y2-015 OP2	121.01
914051	Y2-037 C	.46
914052	Y2-037 E	.76
914191	Y2-063 OP2	121.01

Table 37

Bus Number	Bus Name	Full Contribution
204662	AES GEN1	.6
204663	AES GEN2	.6
204664	AES GEN3	.6
216908	BAYONNE	2.33
217006	BERGN26A	1.17
207922	BRIS	.02

Bus Number	Bus Name	Full Contribution
208900	BRIS G1	.92
208901	BRIS G2	1.09
208902	BRIS G3	2.16
204638	CAT TRAC	.08
204670	CAT TRAC	.03
228000	CEDR#1CT	2.37
228001	CEDR#2CT	1.14
217078	ESSEX 12	10.22
209030	FRFA O01	.02
206331	GG A1&2	2.4
206332	GG A3&4	2.4
206333	GG B5&6	2.4
206334	GG B7&8	2.4
204639	GLATFLTR	.07
204646	HAM CT	.04
208942	HARR CT	.13
208985	HMSW IPP	.06
208903	HOLT 695	.28
208904	HOLT 696	.3
208907	HOLT 697	13.87
217081	HUDSON 1	19.94
204647	HUNTR CT	.09
217083	KEARNY11	7.24
217086	KRNY9&10	1.17
292590	L-018 E	1.09
204640	LARA	.08
209027	LOR2_Q27 E	4.32
219134	MERCER 3	5.81
227807	MO AV B	1.01
204574	MODRN LF	.02
204648	MOUNT CT	.06
204603	N.LEB	.01
204665	ONTELCT1	.42
204666	ONTELCT2	.42
204667	ONTELST1	.3

Bus Number	Bus Name	Full Contribution
204649	ORTAN CT	.03
204641	PANTHER	.18
209008	PAXT IPP	.03
204652	PORT1GEN	9.33
204653	PORT2GEN	14.18
295125	Q-020 2	.32
295130	Q-020 3	.
295133	Q-020 4	.
290201	Q-044	.
204679	Q-059	.02
295671	Q-073 C	.04
204555	QUEEN ST	.61
295952	R-011	23.86
212384	R-043	.22
212386	R-043	.86
296509	R-057 C	.02
204610	ROLLHILL	.01
204655	S.RDG CT	.09
290673	S-042 C	.19
290760	S-064	2.01
208914	SAHA 34	.39
208915	SAHA 567	.64
208917	SAHA1112	.55
208916	SAHA8910	.83
218360	SEWAREN1	5.7
218361	SEWAREN2	6.46
218362	SEWAREN3	5.86
218363	SEWAREN4	6.78
218364	SEWAREN6	6.06
292512	T-146 C	3.5
885600	T20SOLAR E	.11
204656	TITUS 1G	9.84
204657	TITUS 2G	9.84
204658	TITUS 3G	9.84
204659	TMI 1GEN	2.

Bus Number	Bus Name	Full Contribution
204650	TOLNA CT	.1
292815	U1-056 C	2.3
208848	U1-067	.01
887721	U1-068	.03
889011	U2-015 C	.7
292966	U2-045 C	.13
293062	U2-076	.5
293093	U2-077	34.64
297005	V2-003 C	.08
293450	V3-051 C	.
900111	V4-020	61.56
904261	V4-027 C	.
900361	V4-045	17.03
LTF	V4-050	4.73
904511	V4-052 C	.02
904741	V4-075 C	.
209019	VIK1 IPP	.87
900801	W1-001	.82
208850	W1-046 C	.6
901151	W1-054	.04
901241	W1-076 C	.21
901361	W1-105 C	.
901371	W1-106 C	.
901541	W1-127 C	.07
901561	W1-130 C	.19
902211	W2-019 C	.12
902251	W2-023	34.27
902271	W2-028	.26
902281	W2-029	.27
902321	W2-039	2.34
902461	W2-075	.
902601	W2-094 C	.06
903271	W3-022 C OP1	1.05
903311	W3-028 C	2.34
903381	W3-033	.38

Bus Number	Bus Name	Full Contribution
903391	W3-039 C	.14
903471	W3-048	2.51
903501	W3-058 C	.19
905091	W4-009 OP1	39.38
905181	W4-021	39.83
905211	W4-025 C	.14
905221	W4-027 C	.15
905291	W4-038 OP1	1.33
905331	W4-045 C	.18
905391	W4-063 C	.03
208947	WSHO CT	.07
907091	X1-013 OP1	100.63
907241	X1-068	.54
907281	X1-073 C OP1	.28
907351	X1-085 C	.1
907381	X1-094 C	.37
907451	X1-108	1.95
909021	X2-012 C	40.61
909081	X2-025	21.43
909171	X2-050	36.66
910531	X3-004	1.94
910551	X3-006 C	10.42
910701	X3-044	1.64
910931	X3-085 C	.17
912071	X4-009 C	.76
912091	X4-012 C OP1	.13
912101	X4-015 C	.1
912111	X4-016	.56
912131	X4-019	11.69
912141	X4-020	44.55
912151	X4-021	17.82
912191	X4-032 C	.21
912261	X4-044 C	.55
912291	X4-048 OP1	51.09
913131	Y1-020 C	.21

Bus Number	Bus Name	Full Contribution
913171	Y1-025 C OP1	39.38
913181	Y1-026	8.79
913221	Y1-031 C OP1	.73
913351	Y1-056	2.08
913401	Y1-065 C	42.21
913481	Y1-072 C	.05
913511	Y1-077	3.69
913561	Y1-084 C OP1	.04
914021	Y2-013 OP2	43.94
914031	Y2-015 OP2	18.75
914041	Y2-018 C	.04
914051	Y2-037 C	.06
914091	Y2-051 C	.1
914171	Y2-061 C	.76
914191	Y2-063 OP2	18.75
204660	YK H STA	.04
204642	YK SOLID	.08

Table 38

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.16
208981	FOWH IPP	.97
212174	INGE	.18
295223	Q-028 C	3.33
290673	S-042 C	3.6
209021	WEST IPP	.74
914031	Y2-015 OP2	349.77
914191	Y2-063 OP2	349.77

Table 39

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.15
208981	FOWH IPP	.96

Bus Number	Bus Name	Full Contribution
212174	INGE	.18
208945	LOHA CT	.02
295223	Q-028 C	3.27
290673	S-042 C	3.53
212449	SUNB CT	.05
209018	SUNBIPCT	.28
209014	SUNBIPP1	.62
209015	SUNBIPP2	.62
209016	SUNBIPP3	.73
893121	V2-027	.01
209019	VIKI IPP	3.93
903271	W3-022 C OP1	19.15
209021	WEST IPP	.72
914031	Y2-015 OP2	343.65
914191	Y2-063 OP2	343.65

Table 40

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.43
208972	BECK K09	.01
217006	BERGN26A	1.21
212099	BRMO IPP	.01
217078	ESSEX 12	10.64
208941	FISH CT	.04
208981	FOWH IPP	.07
206331	GG A1&2	2.29
206332	GG A3&4	2.29
206333	GG B5&6	2.29
206334	GG B7&8	2.29
208982	GLBT IPP	.13
208943	HARW CT	.05
217081	HUDSON 1	20.76
234304	HUN GEN3	.06
234305	HUN GEN4	.1

Bus Number	Bus Name	Full Contribution
234311	HUN GEN5	.11
234312	HUN GEN6	.11
212174	INGE	.01
208944	JENK CT	.07
217083	KEARNY11	7.54
209004	KOPP IPP	.01
217086	KRNY9&10	1.21
209003	KSTN IPP	.01
292590	L-018 E	2.16
208945	LOHA CT	.02
212265	LOR1_N14_C	.01
209027	LOR2_Q27 E	5.6
208911	MONT G1	1.27
208912	MONT G2	1.3
209006	NEPC IPP	.09
209010	PEIP 1	.07
209009	PEIP 2	.12
204652	PORT1GEN	9.72
204653	PORT2GEN	15.35
295223	Q-028 C	.23
295952	R-011	23.26
212384	R-043	.28
212386	R-043	1.12
290673	S-042 C	.25
209013	SCEN IPP	.14
218360	SEWAREN1	5.73
218361	SEWAREN2	6.48
218362	SEWAREN3	5.88
218363	SEWAREN4	6.79
218364	SEWAREN6	6.07
204654	SHAW CT	.03
212449	SUNB CT	.01
209018	SUNBIPCT	.06
209014	SUNBIPP1	.12
209015	SUNBIPP2	.12

Bus Number	Bus Name	Full Contribution
209016	SUNBIPP3	.15
208918	SUSQ 1	2.37
200038	SUSQ 2	2.01
889011	U2-015 C	1.03
293093	U2-077	35.1
893121	V2-027	.
900111	V4-020	25.08
LTF	V4-050	6.28
209019	VIKI IPP	1.13
900801	W1-001	.84
901241	W1-076 C	.2
901431	W1-114 C	.
901441	W1-115 C	.
901541	W1-127 C	.07
902251	W2-023	34.53
LTF	W2-033	4.35
903271	W3-022 C OP1	1.35
903391	W3-039 C	.15
905091	W4-009 OP1	38.53
905181	W4-021	38.51
905291	W4-038 OP1	1.39
209029	WAYM IPP	.02
209021	WEST IPP	.05
209022	WHFR IPP	.07
209023	WIENIPP1	.11
209025	WIENIPP3	.11
209026	WIENIPP4	.05
208948	WILL CT	.05
208920	WLPK	.09
907091	X1-013 OP1	30.56
907241	X1-068	.53
907281	X1-073 C OP1	.26
907381	X1-094 C	.38
907451	X1-108	2.04
909021	X2-012 C	56.08

Bus Number	Bus Name	Full Contribution
909081	X2-025	22.12
909171	X2-050	38.17
910531	X3-004	2.02
910931	X3-085 C	.18
912091	X4-012 C OP1	.14
912111	X4-016	.58
912131	X4-019	12.07
912141	X4-020	24.87
912261	X4-044 C	.56
912291	X4-048 OP1	128.1
913131	Y1-020 C	.23
913171	Y1-025 C OP1	38.53
913181	Y1-026	8.91
913221	Y1-031 C OP1	.76
913401	Y1-065 C	26.32
913481	Y1-072 C	.04
913561	Y1-084 C OP1	.05
914021	Y2-013 OP2	44.42
914031	Y2-015 OP2	24.09
914041	Y2-018 C	.04
914051	Y2-037 C	.08
914061	Y2-042	1.68
914091	Y2-051 C	.1
914191	Y2-063 OP2	24.09

Table 41

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.16
208981	FOWH IPP	.97
212174	INGE	.18
295223	Q-028 C	3.33
290673	S-042 C	3.6
903271	W3-022 C OP1	19.49
209021	WEST IPP	.74

Bus Number	Bus Name	Full Contribution
914031	Y2-015 OP2	349.77
914191	Y2-063 OP2	349.77

Table 42

Bus Number	Bus Name	Full Contribution
212099	BRMO IPP	.16
208981	FOWH IPP	.97
212174	INGE	.18
295223	Q-028 C	3.33
290673	S-042 C	3.6
903271	W3-022 C OP1	19.49
209021	WEST IPP	.74
914031	Y2-015 OP2	349.77
914191	Y2-063 OP2	349.77

Table 43

Bus Number	Bus Name	Full Contribution
216908	BAYONNE	2.47
208972	BECK K09	.01
217006	BERGN26A	1.24
212099	BRMO IPP	.01
217078	ESSEX 12	10.83
208941	FISH CT	.05
208981	FOWH IPP	.07
206331	GG A1&2	2.33
206332	GG A3&4	2.33
206333	GG B5&6	2.33
206334	GG B7&8	2.33
208982	GLBT IPP	.13
208943	HARW CT	.05
217081	HUDSON 1	21.13
234304	HUN GEN3	.07
234305	HUN GEN4	.1

Bus Number	Bus Name	Full Contribution
234311	HUN GEN5	.11
234312	HUN GEN6	.11
212174	INGE	.01
208944	JENK CT	.07
217083	KEARNY11	7.67
209004	KOPP IPP	.01
217086	KRNY9&10	1.24
209003	KSTN IPP	.01
292590	L-018 E	2.2
208945	LOHA CT	.02
212265	LOR1_N14_C	.01
209027	LOR2_Q27 E	5.69
208911	MONT G1	1.29
208912	MONT G2	1.32
209006	NEPC IPP	.1
209010	PEIP 1	.07
209009	PEIP 2	.12
204652	PORT1GEN	9.88
204653	PORT2GEN	15.61
295223	Q-028 C	.23
295952	R-011	23.67
212384	R-043	.28
212386	R-043	1.14
290673	S-042 C	.25
209013	SCEN IPP	.14
218360	SEWAREN1	5.83
218361	SEWAREN2	6.59
218362	SEWAREN3	5.98
218363	SEWAREN4	6.91
218364	SEWAREN6	6.18
204654	SHAW CT	.03
212449	SUNB CT	.01
209018	SUNBIPCT	.06
209014	SUNBIPP1	.13
209015	SUNBIPP2	.13

Bus Number	Bus Name	Full Contribution
209016	SUNBIPP3	.15
208918	SUSQ 1	2.41
200038	SUSQ 2	2.05
889011	U2-015 C	1.05
293093	U2-077	35.71
893121	V2-027	.
900111	V4-020	25.52
LTF	V4-050	6.39
209019	VIKI IPP	1.15
900801	W1-001	.85
901241	W1-076 C	.21
901431	W1-114 C	.
901441	W1-115 C	.
901541	W1-127 C	.07
902251	W2-023	35.13
LTF	W2-033	4.43
903271	W3-022 C OP1	1.38
903391	W3-039 C	.15
905091	W4-009 OP1	39.19
905181	W4-021	39.18
905291	W4-038 OP1	1.41
209029	WAYM IPP	.02
209021	WEST IPP	.05
209022	WHFR IPP	.07
209023	WIENIPP1	.11
209025	WIENIPP3	.11
209026	WIENIPP4	.05
208948	WILL CT	.05
208920	WLPK	.1
907091	X1-013 OP1	31.11
907241	X1-068	.54
907281	X1-073 C OP1	.27
907351	X1-085 C	.1
907381	X1-094 C	.39
907451	X1-108	2.08

Bus Number	Bus Name	Full Contribution
909021	X2-012 C	57.05
909081	X2-025	22.5
909171	X2-050	38.84
910531	X3-004	2.06
910931	X3-085 C	.18
912091	X4-012 C OP1	.14
912111	X4-016	.59
912131	X4-019	12.28
912141	X4-020	25.3
912261	X4-044 C	.57
912291	X4-048 OP1	130.29
913131	Y1-020 C	.23
913171	Y1-025 C OP1	39.19
913181	Y1-026	9.06
913221	Y1-031 C OP1	.78
913401	Y1-065 C	26.78
913481	Y1-072 C	.04
913561	Y1-084 C OP1	.05
914021	Y2-013 OP2	45.19
914031	Y2-015 OP2	24.51
914041	Y2-018 C	.04
914051	Y2-037 C	.08
914091	Y2-051 C	.1
914191	Y2-063 OP2	24.51

Table 44

Bus Number	Bus Name	Full Contribution
204638	CAT TRAC	.04
204670	CAT TRAC	.02
213585	EDDYSTN2	7.12
204639	GLATFLTR	.07
204646	HAM CT	.05
217081	HUDSON 1	8.24
204647	HUNTR CT	.21

Bus Number	Bus Name	Full Contribution
204574	MODRN LF	.01
204648	MOUNT CT	.09
204649	ORTAN CT	.08
315446	Q-065	-28.34
204555	QUEEN ST	.28
295952	R-011	10.11
290760	S-064	1.13
291017	S-107 1CT	2.99
291019	S-107 1ST	5.97
291018	S-107 2CT	2.99
218360	SEWAREN1	2.39
218361	SEWAREN2	2.71
218362	SEWAREN3	2.46
218363	SEWAREN4	2.85
218364	SEWAREN6	2.55
204656	TITUS 1G	2.41
204657	TITUS 2G	2.41
204658	TITUS 3G	2.41
204650	TOLNA CT	.06
887721	U1-068	.01
293093	U2-077	14.46
LTF	U4-022	1.23
LTF	U4-023	1.23
900111	V4-020	19.26
900361	V4-045	7.38
LTF	V4-050	2.43
902251	W2-023	14.34
902461	W2-075	.
902601	W2-094 C	.26
903341	W3-032A 1	3.53
903351	W3-032A 2	3.53
903961	W3-175	8.52
905091	W4-009 OP1	16.65
905141	W4-016	7.81
905181	W4-021	16.96

Bus Number	Bus Name	Full Contribution
907091	X1-013 OP1	31.89
909021	X2-012 C	16.52
909081	X2-025	8.82
909171	X2-050	15.14
909231	X2-066	7.06
909241	X2-067	7.07
910831	X3-068 OP1	8.79
912141	X4-020	18.34
912151	X4-021	7.34
912291	X4-048 OP1	20.91
913171	Y1-025 C OP1	16.65
913401	Y1-065 C	18.53
914021	Y2-013 OP2	18.36
914031	Y2-015 OP2	7.61
LTF	Y2-044	1.21
914191	Y2-063 OP2	7.61
204660	YK H STA	.03
204642	YK SOLID	.04

Table 45

Bus Number	Bus Name	Full Contribution
203283	MANOR	.01
200851	MEHOOP3	.17
294572	P-028 C	.08
294573	P-028 E	14.98
295952	R-011	6.66
291017	S-107 1CT	1.64
291019	S-107 1ST	3.29
291018	S-107 2CT	1.64
218360	SEWAREN1	1.64
218361	SEWAREN2	1.85
218362	SEWAREN3	1.68
218363	SEWAREN4	1.94
218364	SEWAREN6	1.74

Bus Number	Bus Name	Full Contribution
293093	U2-077	10.02
LTF	U4-022	.76
LTF	U4-023	.76
900111	V4-020	7.49
LTF	V4-050	2.02
902251	W2-023	9.86
LTF	W2-033	1.75
905091	W4-009 OP1	11.03
905181	W4-021	11.04
907091	X1-013 OP1	9.44
907461	X1-109 C	117.09
909021	X2-012 C	15.75
909171	X2-050	10.86
910522	X3-003 E	2.5
912141	X4-020	7.46
912291	X4-048 OP1	34.98
913171	Y1-025 C OP1	11.03
913172	Y1-025 E OP1	.91
913311	Y1-047 OP1	1.92
913401	Y1-065 C	7.82
913402	Y1-065 E	.46
914021	Y2-013 OP2	12.68
914031	Y2-015 OP2	6.8
914061	Y2-042	1.98
914161	Y2-060	.44
914191	Y2-063 OP2	6.8

Table 46

Bus Number	Bus Name	Full Contribution
203283	MANOR	.01
200851	MEHOOP3	.17
294572	P-028 C	.08
294573	P-028 E	14.98
295952	R-011	6.66

Bus Number	Bus Name	Full Contribution
291017	S-107 1CT	1.64
291019	S-107 1ST	3.29
291018	S-107 2CT	1.64
218360	SEWAREN1	1.64
218361	SEWAREN2	1.85
218362	SEWAREN3	1.68
218363	SEWAREN4	1.94
218364	SEWAREN6	1.74
293093	U2-077	10.02
LTF	U4-022	.76
LTF	U4-023	.76
900111	V4-020	7.49
LTF	V4-050	2.02
902251	W2-023	9.86
LTF	W2-033	1.75
905091	W4-009 OP1	11.03
905181	W4-021	11.04
907091	X1-013 OP1	9.44
907461	X1-109 C	117.09
909021	X2-012 C	15.75
909171	X2-050	10.86
910522	X3-003 E	2.5
912141	X4-020	7.46
912291	X4-048 OP1	34.98
913171	Y1-025 C OP1	11.03
913172	Y1-025 E OP1	.91
913311	Y1-047 OP1	1.92
913401	Y1-065 C	7.82
913402	Y1-065 E	.46
914021	Y2-013 OP2	12.68
914031	Y2-015 OP2	6.8
914061	Y2-042	1.98
914161	Y2-060	.44
914191	Y2-063 OP2	6.8

Table 47

Bus Number	Bus Name	Full Contribution
213585	EDDYSTN2	7.12
204646	HAM CT	.05
217081	HUDSON 1	8.24
204647	HUNTR CT	.21
204649	ORTAN CT	.08
315446	Q-065	-14.11
204555	QUEEN ST	.28
295952	R-011	10.11
290760	S-064	1.13
291017	S-107 1CT	2.99
291019	S-107 1ST	5.97
291018	S-107 2CT	2.99
218360	SEWAREN1	2.39
218361	SEWAREN2	2.71
218362	SEWAREN3	2.46
218363	SEWAREN4	2.85
218364	SEWAREN6	2.55
292512	T-146 C	1.59
292513	T-146 E	6.36
204656	TITUS 1G	2.41
204657	TITUS 2G	2.41
204658	TITUS 3G	2.41
292815	U1-056 C	1.05
292816	U1-056 E	6.99
293093	U2-077	14.46
LTF	U4-022	1.23
LTF	U4-023	1.23
900111	V4-020	19.26
900361	V4-045	7.38
LTF	V4-050	2.43
902251	W2-023	14.34
902601	W2-094 C	.26
902602	W2-094 E	.45
903311	W3-028 C	1.03

Bus Number	Bus Name	Full Contribution
903312	W3-028 E	6.96
903341	W3-032A 1	3.53
903351	W3-032A 2	3.53
903961	W3-175	8.52
905091	W4-009 OP1	16.65
905141	W4-016	7.81
905181	W4-021	16.96
907091	X1-013 OP1	31.89
909021	X2-012 C	16.52
909081	X2-025	8.82
909171	X2-050	15.14
909231	X2-066	7.06
909241	X2-067	7.07
912141	X4-020	18.34
912151	X4-021	7.34
912291	X4-048 OP1	20.91
913171	Y1-025 C OP1	16.65
913172	Y1-025 E OP1	1.38
913401	Y1-065 C	18.53
913402	Y1-065 E	1.08
914021	Y2-013 OP2	18.36
914031	Y2-015 OP2	7.61
LTF	Y2-044	1.21
914191	Y2-063 OP2	7.61

Table 48

Bus Number	Bus Name	Full Contribution
204638	CAT TRAC	.04
204670	CAT TRAC	.02
213585	EDDYSTN2	7.12
204639	GLATFLTR	.07
204646	HAM CT	.05
217081	HUDSON 1	8.24
204647	HUNTR CT	.21

Bus Number	Bus Name	Full Contribution
204574	MODRN LF	.01
204648	MOUNT CT	.09
204649	ORTAN CT	.08
204653	PORT2GEN	5.6
315446	Q-065	-26.52
204555	QUEEN ST	.28
295952	R-011	10.11
290760	S-064	1.13
291017	S-107 1CT	2.99
291019	S-107 1ST	5.97
291018	S-107 2CT	2.99
218360	SEWAREN1	2.39
218361	SEWAREN2	2.71
218362	SEWAREN3	2.46
218363	SEWAREN4	2.85
218364	SEWAREN6	2.55
204656	TITUS 1G	2.41
204657	TITUS 2G	2.41
204658	TITUS 3G	2.41
204650	TOLNA CT	.06
887721	U1-068	.01
293093	U2-077	14.46
LTF	U4-022	1.23
LTF	U4-023	1.23
900111	V4-020	19.26
900361	V4-045	7.38
LTF	V4-050	2.43
902251	W2-023	14.34
902461	W2-075	.
902601	W2-094 C	.26
903341	W3-032A 1	3.53
903351	W3-032A 2	3.53
903961	W3-175	8.52
905091	W4-009 OP1	16.65
905141	W4-016	7.81

Bus Number	Bus Name	Full Contribution
905181	W4-021	16.96
907091	X1-013 OP1	31.89
907291	X1-074	6.66
909021	X2-012 C	16.52
909081	X2-025	8.82
909171	X2-050	15.14
909231	X2-066	7.06
909241	X2-067	7.07
LTF	X3-050	.75
912141	X4-020	18.34

Bus Number	Bus Name	Full Contribution
912151	X4-021	7.34
912291	X4-048 OP1	20.91
913171	Y1-025 C OP1	16.65
913401	Y1-065 C	18.53
914021	Y2-013 OP2	18.36
914031	Y2-015 OP2	7.61
LTF	Y2-044	1.21
914191	Y2-063 OP2	7.61
204660	YK H STA	.03
204642	YK SOLID	.04