

Sampling Location	Reporting to Regulators	Reporting to Departments	Lead Organization	Sample Type	Analysis/Frequency
<i>Water-SPDES: Compliance (See Chapter 9)</i>					
STP Effluent (8 months/year)	Monthly	Yes (cc)	EWMSD	24 hr. Composite	TAL metals, nitrogen series, BOD <sub>5</sub> , TSS, total phosphorus - sampled and analyzed 2x/month
STP Effluent (4 months/year)	Monthly	Yes (cc)	EWMSD	24 hr. Composite	TAL metals, nitrogen series, BOD <sub>5</sub> , TSS, total phosphorus, whole effluent toxicity testing - sampled and analyzed 3x/month
STP Effluent (1 month/year)	Annually	Yes (cc)	EWMSD	24 hr. Composite (Grab)	Semi-VOCs (EPA 8270 and 15 compound library search), herbicides (EPA 8150), pesticides (EPA 608, grab sample) - sampled and analyzed 3x/month
STP Influent (8 months/year)	Monthly	Yes (cc)	EWMSD	24 hr. Composite	TAL metals, BOD <sub>5</sub> , TSS - sampled and analyzed 2x/month
STP Influent (4 months/year)	Monthly	Yes (cc)	EWMSD	24 hr. Composite	TAL metals, BOD <sub>5</sub> , TSS - sampled and analyzed 3x/month
STP Effluent (8 months/year)	Monthly	Yes (cc)	EWMSD	Grab Sample	VOCs (EPA 624) and ketones, cyanide, fecal coliform - sampled and analyzed 2x/month
STP Effluent (4 months/year)	Monthly	Yes (cc)	EWMSD	Grab Sample	VOCs (EPA 624) ketones, cyanide, fecal coliform, PCBs (EPA 608) - sampled and analyzed 3x/month
STP Effluent (Daily)	Monthly	Yes (cc)	EP	Grab Sample	Temperature, pH, settleable solids, flow - sampled and analyzed daily
HN, HT-W, HS, CSF, HT-E, HW, Bldg 1004/1002-Outfall 002B (monthly)	Monthly	Yes (cc)	EWMSD	Grab Sample	Oil, grease, and pH (VOCs EPA 624, HW only) - sampled and analyzed monthly
HX (monthly)	Monthly	Yes (cc)	EWMSD/EP	Grab Sample	Flow (EP totalizer) and pH - sampled and analyzed monthly
HN, HT-W, HT-E, HW, CSF, HS, Bldg 1004/1002-Outfall 002B (quarterly)	Quarterly	Yes (cc)	EWMSD	Grab Sample	HEDP, TTA, Copper at HS, VOCs (EPA 624) at HN, TAL Metals at HN, CSF, and HW (filtered) - sampled and analyzed quarterly
Bldg. 535 Printed Circuit Board Lab	Quarterly	Yes (cc)	EWMSD/IO	Grab Sample	pH, Semi-VOCs (EPA 625), flow (IO), TAL metals (surveillance) - sampled and analyzed quarterly
Bldg. 498 Central Cleaning Facility	Quarterly	Yes (cc)	EWMSD/EP	Grab Sample	pH, Semi-VOCs (EPA 625), TAL metals, flow - sampled and analyzed quarterly
<i>Water-SPDES: Compliance (See Chapter 9)</i>					
Bldg. 902 Cooling Tower (quarterly)	Quarterly	Yes (cc)	EWMSD/CA	Grab Sample	pH, flow (CA), PPGMBE - sampled and analyzed quarterly
Satellite Boilers	Quarterly	No	EP/EWMSD	Grab Sample	pH, flow (each discharge)
HS, HO, HN, HT-W, HT-E, HM-N, HM-S, HQ, HE, HZ, and Outfall 002B (Flow circular chart/strip chart exchange)	Monthly	Yes (cc)	EWMSD	Grab Sample	Flow readings collected weekly - HO, HZ, HE, HM-S, HM-N, and HQ surveillance only; not reported to regulators

	Sampling Location	Reporting to Regulators	Reporting to Departments	Lead Organization	Sample Type	Analysis/Frequency
<i>Potable Water: Compliance (See Chapter 11)</i>						
	Potable Wells 4, 6, 7, 10, 11, and 12	Quarterly	Yes (cc)	EWMSD	Grab Sample	Gross alpha/beta, gamma, tritium, Sr-90 - sampled and analyzed quarterly; inorganic chemicals (IOC Groups 1, 2, 3, 4) - sampled and analyzed annually; water quality (alkalinity/calcium) - sampled and analyzed biannually
	Potable Wells 4, 6, 7, 10, 11, 12, 10-GAC, 11-GAC, and 12-GAC	Quarterly	Yes (cc)	EP	Grab Sample	Principle Organic Contaminants (EPA 502.2) - sampled and analyzed quarterly
	Potable Wells 4, 6, 7, 10, 10-GAC, 11, 11-GAC, 12, 12-GAC, and Water Treatment Facility	Quarterly	Yes (cc)	EP	Grab Sample	Bacteriology - sampled and analyzed quarterly
	Potable Water Distribution System	Monthly	Yes (cc)	EP	Grab Sample	Bacteriology - sampled and analyzed at 7 locations monthly
		Quarterly	Yes (cc)	EP	Grab Sample	Water Quality - sampled and analyzed quarterly at 3 locations
		Semiannual	Yes (cc)	EP	Grab Sample	Inorganic chemicals (IOC 1, 2, 3, 4), Nitrate/Nitrite, THMs, HAA5 - sampled and analyzed semiannually
		Annual	Yes (cc)	EP	Grab Sample	Asbestos - sampled and analyzed once per year
		Triennially	Yes (cc)	EP	Grab Sample	Lead and Copper - sampled and analyzed once every 3 years at 20 locations; required in 2009
	Western Well Field (Wells 4, 6, and 7)	Annually	Yes (cc)	EP	Composite	SOCs - sampled and analyzed once per year; sample composited by contract analytical laboratory
	Eastern Well Field (Wells 10, 11, and 12)	Annually	Yes (cc)	EP	Composite	SOCs - sampled and analyzed once per year; sample composited by contract analytical laboratory
	Points of Entry	Biweekly	Yes (cc)	EP	Grab	Temperature, conductivity, and pH - sampled and analyzed biweekly by operating personnel

<i>Groundwater: Compliance (See Chapter 12)</i>						
	Major Petroleum Facility (8 monitoring wells)	Semiannual	Yes (cc)	EWMSD	Grab Sample	VOCs and MTBE (EPA 624), Semi-VOCs (EPA 625) - sampled and analyzed semiannually
		Semiannual	Yes (cc)	EWMSD	Grab Sample	Floating product check - monthly
	Waste Management Facility (8 wells)	Annual	Yes (cc)	EWMSD	Grab Sample	VOCs (EPA 524.2), tritium, gamma, gross alpha/beta - sampled and analyzed semi-annually
		Annual	Yes (cc)	EWMSD	Grab Sample	Metals and anions - sampled and analyzed annually

	Sampling Location	Reporting to Regulators	Reporting to Departments	Lead Organization	Sample Type	Analysis/Frequency
<i>Sewage Treatment Plant: Surveillance (See Chapter 9)</i>						
EA		SER	SER	EWMSD	Composite	Metals, anions - sampled and analyzed monthly
		SER	SER	EWMSD	Grab Sample	VOCs (EPA 524.2) - sampled and analyzed monthly
		SER	SER	EWMSD	Composite	Sr-90 and gamma - sampled 3x/week and composited by contract analytical laboratory for monthly analysis
		SER	SER	EWMSD	Composite	Gross alpha/beta, tritium - sampled and analyzed 3x/week
DA		SER	SER	EWMSD	Composite	Metals, anions - sampled and analyzed monthly
		SER	SER	EWMSD	Composite	Sr-90 and gamma - sampled 3x/week and composited by contract analytical laboratory for monthly analysis
		SER	SER	EWMSD	Composite	Gross alpha/beta, tritium - sampled and analyzed 3x/week
	HFBR – MH #232	SER	SER	EWMSD	Weekly Composite	Tritium - sampled and analyzed once per week
	HFBR – MH #232	SER	SER	EWMSD	Weekly Composite	Gross alpha/beta, gamma - sampled once per month

<i>Surface Water – Peconic River: Surveillance (See Chapter 10)</i>						
	HY – Outside RHIC Ring	SER	SER	EWMSD	Grab Sample	Gross alpha/beta, gamma, tritium, Sr-90, metals (unfiltered), anions, VOCs (EPA 524.2) - sampled and analyzed quarterly; filtered metals- samples collected semiannually
	HV – Inside RHIC Ring	SER	SER	EWMSD	Grab Sample	Gross alpha/beta, gamma, tritium - sampled and analyzed quarterly
HE		SER	SER	EWMSD	24 hr. Composite	Metals (unfiltered), anions, Sr-90, gamma, gross alpha/beta, tritium - sampled and analyzed quarterly; filtered metals - samples collected semiannually
		SER	SER	EWMSD	Grab Sample	VOCs (EPA 524.2) - sampled and analyzed quarterly
HM-N		SER	SER	EWMSD	24 hr. Composite	Metals (unfiltered), anions - sampled and analyzed monthly; filtered metals - collected every other month
		SER	SER	EWMSD	24 hr. Composite	Sr-90, gamma - sampled and analyzed quarterly
		SER	SER	EWMSD	24 hr. Composite	Gross alpha/beta, tritium - sampled and analyzed once per month
		SER	SER	EWMSD	Grab Sample	VOCs (EPA 524.2) - sampled and analyzed once per month

	Sampling Location	Reporting to Regulators	Reporting to Departments	Lead Organization	Sample Type	Analysis/Frequency
	HM-S	SER	SER	EWMSD	Grab Sample	Metals (unfiltered), anions, VOCs (EPA 524.2), Sr-90, gross alpha/beta, gamma, and tritium - sampled and analyzed quarterly; filtered metals samples collected semiannually
	HQ	SER	SER	EWMSD	24 Hr. Composite	Metals (unfiltered), anions - sampled and analyzed monthly; filtered metals samples collected every other month.

<i>Surface Water: Surveillance - Peconic River (See Chapter 10)</i>						
	HQ	SER	SER	EWMSD	24 Hr. Composite	Sr-90, gamma- sampled and analyzed quarterly
		SER	SER	EWMSD	24 Hr. Composite	Gross alpha/beta, tritium - sampled and analyzed once per month
		SER	SER	EWMSD	Grab Sample	VOCs (EPA 524.2) - sampled and analyzed once per month
	HA, HH	SER	SER	EWMSD	Grab Sample	Metals (unfiltered), anions, VOCs (EPA 524.2), gross alpha/beta, gamma, and tritium - sampled and analyzed quarterly; filtered metals - samples collected semiannually
	Swan Pond, Donahue's Pond, Forge Pond	SER	SER	EWMSD	Grab Sample	Metals (unfiltered), anions, VOCs (EPA 524.2), gross alpha/beta, gamma, and tritium - sampled and analyzed quarterly; filtered metals - samples collected semiannually

<i>Recharge Basins: Surveillance (See Chapter 9)</i>						
	HT-E, HT-W, HS, HN	SER	SER	EWMSD	24 Hr. Composite	Metals (unfiltered), anions, gross alpha/beta, tritium, and gamma - sampled and analyzed quarterly; filtered metals - samples collected semiannually
	HT-E, HT-W, HS, HN	SER	SER	EWMSD	Grab Sample	VOCs (EPA 524.2) - sampled and analyzed quarterly
	HW, HO, HZ	SER	SER	EWMSD	Grab Sample	Metals (unfiltered), anions, VOCs (EPA 524.2) at HO and HZ, gross alpha/beta, tritium, and gamma - sampled and analyzed quarterly; filtered metal- samples collected semiannually; oil and grease - sampled and analyzed quarterly at HZ only
	CSF	SER	SER	EWMSD	Grab Sample	Metals (unfiltered), anions, VOCs (EPA 524.2) - sampled and analyzed quarterly; filtered metals - samples collected semiannually

<i>Potable Water: Surveillance (See Chapter 11)</i>						
	Wells #4, #6, #7, #10, #11, #12	SER	SER	EWMSD	Grab Sample	VOCs (EPA 524.2) - sampled and analyzed quarterly
	Wells #4, #6, #7, #10, #11, #12	SER	SER	EWMSD	Grab Sample	Anions, metals - sampled and analyzed annually

	Sampling Location	Reporting to Regulators	Reporting to Departments	Lead Organization	Sample Type	Analysis/Frequency
<i>Precipitation: Surveillance (See Chapter 8)</i>						
	P4, S5	SER	SER	EWMSD	Monthly Composite	Gross alpha/beta, gamma, tritium, mercury, and water quality - sampled and analyzed once per quarter
<i>Air Monitoring: Surveillance - Particulate Filter (See Chapters 5 and 6)</i>						
	S6, P7, P7-2, S5, P4, P2, P9, NYSDOH	SER	SER	EWMSD	Weekly Composite	Gross alpha/beta - sampled and analyzed weekly; contract analytical laboratory composites filters for monthly gamma analysis
	BLIP and Bldg. 801 Non-acid fan	SER	SER	EWMSD	Weekly Composite	Gross alpha/beta, gamma - sampled and analyzed weekly
<i>Air Monitoring: Surveillance - Charcoal (See Chapter 5)</i>						
	Bldg. 801 Non-acid fan	SER	SER	EWMSD	Weekly Composite	Gamma - sampled and analyzed weekly
	BLIP	SER	SER	EWMSD	Weekly Composite	Gamma - sampled and analyzed weekly when BLIP is running
<i>Groundwater: Surveillance (See Chapter 12)</i>						
	BMRR (4 wells)	SER/GMR	Biennial	EWMSD	Grab Sample	Tritium, gross alpha and beta, gamma - sampled and analyzed every 2 years
	BLIP (7 wells)	SER/GMR	Annual	EWMSD	Grab Sample	Tritium - sampled and analyzed quarterly; gamma- sampled and analyzed annually in select wells
	STP (9 wells)	SER/GMR	Annual	EWMSD	Grab Sample	Metals, tritium, gross alpha/beta, gamma, anions - sampled and analyzed annually
	RHIC (13 wells)	SER/GMR	Annual	EWMSD	Grab Sample	Tritium sampled and analyzed semiannually
	Bldg. 801 (1 well)	SER/GMR	Annual	EWMSD	Grab Sample	Tritium, gamma, gross alpha/beta, and Sr-90 - sampled and analyzed semi-annually
	AGS (55 wells)	SER/GMR	Annual	EWMSD	Grab Sample	Tritium - sampled and analyzed quarterly to annually; select wells sampled and analyzed for gamma annually. Temporary wells installed to track downgradient sections of the g-2 tritium plume
		SER/GMR	Annual	EWMSD	Grab Sample	VOCs (EPA 524.2), gamma (select wells) - sampled and analyzed annually
	Motor Pool Facility (6 monitoring wells)	SER/GMR	Annual	EWMSD	Grab Sample	Floating product check in 3 wells semiannually
		SER/GMR	Annual	EWMSD	Grab Sample	VOCs, including MTBE (EPA 624) - sampled and analyzed semiannually

	Sampling Location	Reporting to Regulators	Reporting to Departments	Lead Organization	Sample Type	Analysis/Frequency
	Service Station (5 monitoring wells)	SER/GMR	Annual	EWMSD	Grab Sample	Floating product check in 2 wells semiannually
		SER/GMR	Annual	EWMSD	Grab Sample	VOCs, including MTBE (EPA 624) - sampled and analyzed semiannually; some wells sampled under LTRA CCI4 Program

*Groundwater: Environmental Restoration - Long-term Response Actions (See Chapter 12)*

	Site Background (10 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed annually
	Current Landfill (11 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed quarterly to annually; anions, metals, cyanide - sampled and analyzed quarterly; gross alpha/beta, gamma, tritium, Sr-90, Ra-226 - sampled and analyzed annually
	Former Landfill (8 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed semi-annually to annually; pesticides/PCBs, gross alpha/beta, gamma, tritium, Sr-90 - sampled and analyzed annually; anions, cyanide, metals - sampled and analyzed semiannually
	OU III – Middle Road (24 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed semi-annually for plume core and perimeter wells; sampled and analyzed quarterly for bypass wells
	OU VI Ethylene Dibromide (30 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed annually; EDB - sampled and analyzed semi-annually for perimeter and core wells and quarterly for background wells
	Chemical/Animal Holes (41 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed annually; Sr-90 - sampled and analyzed annually to quarterly

*Groundwater: Environmental Restoration- Long-term Response Actions (See Chapter 12)*

	OU I South Boundary (44 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs and gamma - sampled and analyzed annually; tritium and Sr-90 - sampled and analyzed semi-annually for core and perimeter and annually for background wells.
	OU III North Street (27 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed quarterly for bypass wells, semi-annually for perimeter and core wells, and annually for background wells; gross alpha/beta, gamma, tritium, Sr-90 - sampled and analyzed annually
	OU III – Central (20 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - all wells sampled and analyzed annually except for 109-03 and 109-04, which are sampled and analyzed quarterly

	Sampling Location	Reporting to Regulators	Reporting to Departments	Lead Organization	Sample Type	Analysis/Frequency
	OU III – Building 96 (33 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed quarterly
	OU III – Carbon Tetrachloride (34 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed annually to quarterly
	OU III – South Boundary (38 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed annually to quarterly
	OU III – South Boundary Radionuclide (54 wells)	SER/GMR	--	EWMSD	Grab Sample	Gross strontium-90, gamma, tritium - sampled and analyzed annually
	OU III Western South Boundary (17 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed semi-annually for plume core and perimeter wells; all other sampled and analyzed quarterly
	OU III Magothy	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed quarterly
	OU III (BGRR/WCF Sr-90) (86 wells)	SER/GMR	--	EWMSD	Grab Sample	Sr-90 - sampled and analyzed semi-annually to annually
	OU III – Offsite (12 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed semi-annually
	OU IV – AOC 5 (3 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs and semi-VOCs – sampled and analyzed quarterly
	OU III – HFBR (116 wells)	SER/GMR	--	EWMSD	Grab Sample	Tritium - sampled and analyzed to annually; VOCs in selected wells - sampled and analyzed annually

*Groundwater: Environmental Restoration- Long-term Response Actions (See Chapter 12)*

	OU III –Industrial Park (40 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed annually to quarterly
	OU IV – AOC 6 (29 wells)	SER/GMR	--	EWMSD	Grab Sample	Gross alpha/beta, gamma, tritium, Sr-90 - sampled and analyzed semi-annually
	OU V (34 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs and tritium - sampled analyzed annually
	OU III Long Island Power Authority (16 Wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs – sampled and analyzed semi-annually to quarterly
	OU III Industrial Park East (12 Wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed quarterly
	OU III North Street East (15 Wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed semi-annually to quarterly
	OU III Airport (28 wells)	SER/GMR	--	EWMSD	Grab Sample	VOCs - sampled and analyzed quarterly
	Sampling Location	Reporting to Regulators	Reporting to Departments	Lead Organization	Sample Type	Analysis/Frequency

<i>Flora and Fauna: Surveillance - Terrestrial Sampling (On site) (See Chapter 8)</i>						
Soil	SER/IAG	SER	EWMSD	None	Former HWMF monitoring in 2006; all other monitoring discontinued in 2003	
Vegetation	SER/IAG	SER	EWMSD	None	Former HWMF monitoring in 2006; all other monitoring discontinued in 2003	
Deer	SER	SER	EWMSD	Grab Sample	Gamma and Sr-90 analysis - 25 samples, as available	
Small Mammal – Squirrels	SER	SER	EWMSD	Grab Sample	Gamma and Sr-90 analysis - 10 samples annually	
Garden Vegetables	SER	SER	EWMSD	Grab Sample	Gamma analysis - 5 samples annually	
Soil from Vegetable Garden	SER	SER	EWMSD	Grab Sample	Gamma analysis - 1 sample annually	
Soil/Sediment – Recharge Basins	SER	SER	EWMSD	Grab Sample	HN (4), HO (2), HTe, HTw, HW, and HS Metals, gamma, semi-volatiles	
Deer	SER	SER	EWMSD	Grab Sample	Gamma and Sr-90 analysis - 40 samples, as available	
Small mammal – Squirrels	SER	SER	EWMSD	Grab Sample	Gamma and Sr-90 analysis - 5 samples, as available	
Soil	--	--	EWMSD	None	Monitoring discontinued in 2003	

<i>Flora and Fauna: Surveillance - Terrestrial Sampling (Off site) (See Chapter 8)</i>						
Vegetation	--	--	EWMSD	None	Monitoring discontinued in 2003; followup monitoring in 2008	
<i>Flora and Fauna: Surveillance - Aquatic Sampling (See Chapter 8)</i>						
Fish	SER	SER	EWMSD	Grab Sample	Gamma, Sr-90, metals, and pesticides/PCBs analysis - 40 samples annually	
Freshwater mussels	--	--	EWMSD	None	Monitoring discontinued in 2003	
Vegetation	SER	SER	EWMSD	Grab Sample	Gamma, metals, and pesticides/PCBs analysis - 8 samples annually	
Sediment	SER	SER	EWMSD	Grab Sample	Gamma, Sr-90, metals (mercury and methyl mercury added), and pesticides/PCBs analysis - 31 samples annually	
Estuarine Clams/Mussels	--	--	EWMSD	None	Monitoring discontinued in 2003	



	Sampling Location	Reporting to Regulators	Reporting to Departments	Lead Organization	Sample Type	Analysis/Frequency
	Surface Water	SER/IAG	SER/IAG	EWMSD	None	Mercury, methyl mercury, TSS - 22 samples taken in June and August annually
	Surface Water	SER	SER	EWMSD	Grab	TAL metals, nutrients, water quality parameters - Meadow Marsh
<i>Air Emissions: Surveillance – Radiological - Silica Gel (See Chapters 5 and 6)</i>						
	049-DC, 053-DC, 122-DC, S6, P7, P2, P4, P9, and a rotating duplicate	SER	SER	EWMSD	Particulate and Silica Gel	Gross alpha/beta, gamma, and tritium - sampled continuously for 2 weeks (26 samples/year/location)
	BLIP	SER	SER	EWMSD	Particulate and Silica Gel	Gross alpha/beta and tritium - sampled weekly
	HFBR T-Tube	SER	Quarterly	EWMSD	Silica gel	Tritium - sampled and analyzed once per month
<i>Ambient Air: Surveillance - Radiological - TLD Exchange (Off site) - BNL Personnel (See Chapter 7)</i>						
	000-TLD4, 000-TLD5, 000-TLD7, 200-TLD2, 300-TLD2, 300-TLD3, 400-TLD1, 500-TLD1, 500-TLD2, 500-TLD4, 600-TLD3, 700-TLD2, 700-TLD3, 700-TLD4, 800-TLD1, 800-TLD2, 800-TLD3, 900-TLD2, and 999-TLD1	SER	SER	EWMSD	External Dose	Beta/gamma dose exchanged quarterly
<i>Ambient Air: Surveillance – Radiological - TLD Exchange (On site) (See Chapter 7)</i>						
	P4, S6, P7, P2, S5, 011-TLD1, 013-TLD1, 025-TLD1, 025-TLD4, 027-TLD1, 027-TLD2, 030-TLD1, 034-TLD1, 034-TLD2, 036-TLD1, 036-TLD2, 037-TLD1, 043-TLD1, 043-TLD2, 044-TLD1, 044-TLD2, 044-TLD3, 044-TLD4, 044-TLD5, 045-TLD1, 045-TLD2, 045-TLD3, 045-TLD4, 045-TLD5, 049-TLD1, 053-TLD1, 054-TLD1, 054-TLD 2, 054-TLD3, 063-TLD1, 066-TLD1, 073-TLD1, 074-TLD1, 074-TLD2, 075-TLD3, 075-TLD4, 075-TLD5, 080-TLD1, 081-TLD1, 081-TLD2, 082-TLD1, 084-TLD1, 085-TLD1, 085-TLD2, 086-TLD1, 088-TLD1, 088-TLD2, 088-TLD3, 088-TLD4, 105-TLD1, 108-TLD1, 111-TLD1, 122-TLD1, 126-TLD1	SER	SER	EWMSD	Quarterly	Beta/gamma exchanged and analyzed quarterly

	Sampling Location	Reporting to Regulators	Reporting to Departments	Lead Organization	Sample Type	Analysis/Frequency
<i>Ambient Air: Surveillance – Radiological- TLD Exchange (Off site Facilities) (See Chapter 7)</i>						
	000-TLD5, 000-TLD7, 400-TLD1, 600-TLD3, and 800-TLD3	SER	SER	EWMSD	Quarterly Composite	Beta/gamma exchanged and analyzed quarterly
<i>Air Emissions: Compliance – Non-radiological (See Chapter 5)</i>						
	CSF – Boiler #6 Stack	SER/QES	Yes (cc)	EP	Continuous	NO <sub>x</sub> , CO <sub>2</sub> , CO - continuous emissions monitoring
	CSF – Boiler #6 Stack	SER/QES	Yes (cc)	EP	Continuous	Opacity - continuous emissions monitoring
	CSF – Boiler #7 Stack	SER/QES	Yes (cc)	EP	Continuous	NO <sub>x</sub> , CO <sub>2</sub> , CO - continuous emissions monitoring
	CSF – Boiler #7 Stack	SER/QES	Yes (cc)	EP	Continuous	Opacity - continuous emissions monitoring
	CSF – Tank Nos. 4, 9, and 10	SER/QES	Yes (cc)	EP	Quarterly	Sulfur and nitrogen fuel content - quarterly analysis
	Satellite Boiler Fuel Storage Tanks	SER/QES	Yes (cc)	EP	Quarterly	Sulfur content – quarterly analysis if fuel is delivered
	CSF- Boiler #1A Stack	SER/STR	Yes (cc)	EP	Performance Test	NO <sub>x</sub> TSP – every 5 years
	CSF- Boiler #5 Stack	SER/STR	Yes (cc)	EP	Performance Test	NO <sub>x</sub> TSP – every 5 years
	CSF- Boiler #6 Stack	SER/STR	Yes (cc)	EP	Performance Test	TSP – every 5 years
	CSF- Boiler #7 Stack	SER/STR	Yes (cc)	EP	Performance Test	TSP – every 5 years
	Fleet Station and Upton Station Gasoline Fueling Stage II Vapor Recovery Systems	SER/CR	Yes (cc)	EP and SS	Performance Test	Back pressure, liquid blockage, and leak tests – every 5 years (due March 2008)
	Used AC Shop Compressor Oil and Collider Accelerator Waste Separator Oil	SER/QES	Yes (cc)	EP	3-4 times per year	Cadmium, arsenic, lead, chromium, sulfur, PCBs, total halogens, flashpoint, and gross heat content - sampled and analyzed as needed
<i>Miscellaneous Monitoring (See Chapter9)</i>						
	MH #192, STP Influent and Effluent to the primary clarifier	--	--	EWMSD	Daily Performance Check	Sewer line radiological monitors daily performance checked with Cs-137 button source

	Sampling Location	Reporting to Regulators	Reporting to Departments	Lead Organization	Sample Type	Analysis/Frequency
<i>Landfill Gas and Surface Leachate Monitoring (See Chapter 13)</i>						
	Current Landfill – Wooded Wetland Monitoring (7 locations with samples of both sediment and surface water)	ALMR	--	ERD	Grab Sample	Metals - sampled and analyzed annually
	BNL Landfills, Soil Gas Monitoring Current Landfill – 58 sampling points Former Landfill – 24 sampling points	ALMR	--	ERD	Grab Sample	Methane and hydrogen sulfate - sampled and analyzed quarterly for the Current Landfill and annually for the Former Landfill
<i>Peconic River Sediment: Environmental Restoration- Long-term Response Actions (See Chapter 8)</i>						
	PR-SS-02, PR-SS-03, PR-SS-04, PR-SS-05, PR-SS-06, PR-SS-07, PR-SS-09, PR-SS-10, PR-SS-12, PR-SS-14, PR-SS-15, PR-SS-17, PR-SS-18, PR-SS-9, PR-WW-21, PR-WW-23, PR-SS-24, PR-SS-26, PR-SS-29, PR-SS-30, PR-SS-31, - PR-SS-35, PR-SS-37, PR-SS-38, PR-MR-02,	Peconic River Monitoring Report (PRMR)	COCs Field Notes	LTRA	Core	Mercury, PCBs, cesium-137 – sampled and analyzed annually in June.
	PR-SS-01, PR-SS-16, PR-SS-33, PR-MR-01, PR-SS-DP-01	PRMR	COCs Field Notes	LTRA	Core	Mercury, silver, copper, PCBs, pesticides, cesium-137 – sampled and analyzed annually in June.
	Sediment within or beneath HQ sediment trap.	PRMR	COCs Field Notes	LTRA	Core/Composite (within trap)	Mercury, PCBs, cesium-137 – sampled and analyzed annually in June.
<i>Peconic River Surface Water: Environmental Restoration- Long-term Response Actions (See Chapter 8)</i>						
	PR-WC-14, PR-WC-13, PR-WC-12, PR-WC-11, PR-WC-10, PR-WC-09, PR-WC-08, PR-WC-07, PR-WC-06, PR-WC-05, PR-WC-04, PR-WC-03, PR-WC-02, PR-WC-01, PR-WCS-01, PR-WCS-02, PR-WCS-03, PR-WCS-04, PR-WCS-05, PR-WCS-06, PR-WCS-07	PRMR	COCs Field Notes	LTRA	Grab	Total mercury, methylmercury, total suspended solids (TSS), chlorophyll-a, total phosphorus, total nitrogen, nitrate/nitrite, total Kjeldahl nitrogen, (TKN), total organic carbon, (TOC), -  Field Measurements: Turbidity, Dissolved oxygen (DO), pH, depth, width.  Collect twice annually in June and between last week of July and first week of August. (At Connetquot River only total mercury, methylmercury and TSS are analyzed.)
	<b>Sampling Location</b>	<b>Reporting to Regulators</b>	<b>Reporting to Departments</b>	<b>Lead Organization</b>	<b>Sample Type</b>	<b>Analysis/Frequency</b>

<i>Peconic River Surface Water (continued): Environmental Restoration- Long-term Response Actions (See Chapter 8)</i>						
	PR-WC-10, PR-WC-09, PR-WC-08, PR-WC-06, PR-WC-04, PR-WC-03, PR-WC-01, PR-WCS-04	PRMR	COCs Field Notes	LTRA	Grab	Total suspended solids (TSS), chlorophyll-a, total phosphorus, total nitrogen, nitrate/nitrite, total Kjeldahl nitrogen, (TKN), total organic carbon, (TOC),  Field Measurements: Turbidity, Dissolved oxygen (DO), pH, depth  Collections occur five times annually (two weeks before and after each of the above total mercury, methylmercury and TSS collections.)
	HQ (3 samples between sediment trap and gauging station)	PRMR	COCs Field Notes	LTRA	Grab	TSS, DO - collected semi-weekly April to October as flow conditions permit.
<i>Peconic River Fish: Environmental Restoration- Long-term Response Actions (See Chapter 8)</i>						
	On BNL property: Area A (HmN), North St. (Area D)	PRMR	COCs Field Notes	LTRA	Grab	Mercury, PCBs, cesium-137 – collected once annually between late April and September, as fish population and flow conditions permit
	Outside BNL property: Schultz Rd. (Area P), Manor Rd, Donahue's Pd.	PRMR	COCs Field Notes	LTRA	Grab	Mercury, pesticides, PCBs, cesium-137 and other gamma-emitting radionuclides, as fish population and flow conditions permit,