



**Public Service
of New Hampshire**

The Northeast Utilities System

AR-1349
Merrimack Generating Station

Public Service Company of New Hampshire
97 River Road
Bow, NH 03304
(603) 224-4081
Fax (603) 634-2334

The Northeast Utilities System

August 23, 2011

Ms. Nancy Lesieur
Industrial Pretreatment Coordinator
Franklin Wastewater Treatment Plant
Water Division
New Hampshire Department of Environmental Services
528 River Street
Franklin, New Hampshire 03235

Re: Industrial Wastewater Indirect Discharge Request Application
Public Service of New Hampshire (PSNH)
Bow, New Hampshire

Dear Ms. Lesieur:

In accordance with the discussion on Friday, August 12, 2011, between Steven Doloff and Ronald Breton (GZA GeoEnvironmental, Inc. [GZA]), our consulting engineer, PSNH is requesting that the Franklin Wastewater Treatment Plant consider our request to accept treated wastewater from our flue gas desulfurization system that is scheduled to become operational on or around October 1, 2011. With the issuance of a permit and/or contract by New Hampshire Department of Environmental Services (NHDES) outlining the terms of service and financial compensation, it is our intention to transport treated wastewater by tanker truck to the Franklin treatment facility seven days per week, over 24 hours each day.

As presented in our attached application (along with the \$75 application review fee), we are installing a technologically advanced wastewater treatment system. In addition, we are including post-treatment systems that can be used to reduce the volume of the treated waste stream from 70,000 gallons per day (gpd) to as small a volume as 5,000 gpd. These post-treatment systems are anticipated to be operational by January 1, 2012. With these post-treatment systems, we will have the ability to reduce the volume of wastewater while maintaining concentrations of pollutants that are compatible with your treatment system. While our goal is to gain approval to discharge all the wastewater we generate, we recognize that there may be restrictions at your facility and that only a portion of the total discharge could be accepted. This scenario has been considered in our overall wastewater management strategy.

Please note that we have previously submitted an Indirect Discharge Request application along with the required \$1,000 design review fee to George Carlson, P.E., NHDES. Therefore, Mr. Carlson is familiar with this specific indirect discharge request, and we encourage you to contact him with your inquiries.

During the course of performing your evaluation, GZA and PSNH will be available to provide additional information and technical support.

We trust that this submittal adequately address your informational needs. Should you have any questions, please contact Mr. Breton at 603-232-8744 or myself at 603-224-4081, extension 4130.

Sincerely,

Harold Keyes, Station Manager
PUBLIC SERVICE OF NEW HAMPSHIRE

Attachment(s)

cc: George Carlson, P.E. - NHDES



NHDES WATER DIVISION
 FRANKLIN WASTEWATER TREATMENT PLANT
 528 RIVER STREET; PO BOX 68
 FRANKLIN, NH 03235
 (603) 934-2809 FAX (603) 934-4831



**INDUSTRIAL WASTEWATER INDIRECT DISCHARGE REQUEST (IDR) APPLICATION
 (Winnepesaukee River Basin Program)**

The Town/City of Franklin proposes:

To connect to its existing sewage collection system the industrial flow from:

PSNH

(Project/Company Name or Description)

NOTE: The wastewater will be transported to the POTW in tanker trucks on a daily basis and discharged intermittently.

New Discharge or Modified Discharge

of pretreated (untreated) industrial waste to the municipal sewage collection system.

Flow: Average Process Wastewater Volume (gallons/day) :

Previous Permitted Total:	0
This Request:	*70,000
TOTAL:	70,000

The municipal sewage collection system has no history of surcharge and there is no record of objections from persons presently connected to the system. This proposal meets with the approval of the Planning Board, the Engineering Department and all other local authorities.

Name: _____
 (Print or Type)

Title: _____
 (Municipal Official)

Signature: _____

Date _____

Name: _____
 (Print or Type)

Title: _____
 (WRBP Official)

Signature: _____

Date _____

Notes:

- ❖ By signing this discharge permit request form, the municipal official certifies that the municipality has evaluated and approves the proposed discharge and the ability of the POTW to take the discharge based on the information submitted by the industrial user, and that the application is complete.
- ❖ The proposed discharge shall meet the requirements of state and federal pretreatment standards, and local pretreatment programs / sewer use ordinances.
- ❖ No treatment plant shall allocate or accept for treatment more than 90 percent of the headworks or loading limits.

* This value is the average daily process flow requested by the Applicant on Page 3

INSTRUCTIONS

INDUSTRIAL WASTEWATER INDIRECT DISCHARGE REQUEST (IDR) APPLICATION

NHDES approval is required for any new or increases in industrial waste being discharged to POTW having a wastewater treatment plant located in New Hampshire. Approval is also required for any proposed changes in the pollutant concentration or characteristics of an industrial waste that could cause interference with or have an adverse effect on the POTW.

The following fees are required with an IDR application: \$1,000 when plans and specifications are submitted relative to the construction or installation of waste pretreatment devices or \$50 when plans and specifications are not required made payable to "State of New Hampshire –DES" and a \$75 WRBP IDR application review fee made payable to the "State of NH – Treasurer."

The following information shall accompany any Indirect Discharge Request Application (blue form) submitted for review:

- (1) Name, street address and mailing address of industry.
- (2) Name, position and telephone number of responsible individual at the industry, i.e., plant manager, president or vice president of company, who certifies the accuracy and completeness of the information submitted in the application.
- (3) The type of industry using the North American Industrial Classification System (NAICS) code if available.
- (4) Whether the industry is subject to national categorical standards, and if so, which;
- (5) The estimated average, minimum, maximum and total daily flow for domestic discharges and each process discharge and the time and duration of those discharges.
- (6) A schematic of the proposed treatment process.
- (7) If applicable plans, specifications, and operation and maintenance procedures for new or modified treatment facilities at the industrial facility which impact the POTW, stamped by a chemical, civil, sanitary, or environmental engineer registered in New Hampshire.
- (8) Schematics or drawings, a major components list, and operation and maintenance procedures for existing treatment works designed to discharge directly to receiving waters which will be utilized for pretreating the wastewater and redirecting the discharge to a POTW, reviewed and certified as suitable for the proposed use by a chemical, civil, sanitary, or environmental engineer registered in New Hampshire.
- (9) A schematic diagram showing the production process, including the origin of each waste stream.
- (10) Analyses of the waste stream(s) to be discharged, which shall include test results or anticipated quantities of pollutants expected to be present, including those regulated by national categorical standards or local sewer use ordinances.
- (11) Information on the toxicity and treatability of the particular pollutants proposed to be discharged, as available from manufacturer's testing, safety and data publications.
- (12) A map showing the location within the municipality of the industrial facility with respect to the POTW.
- (13) A listing of all chemicals used in the industrial facility which will be discharged, such as production chemicals, degreasers, and cleaning solvents.
- (14) A description and location diagram of all sampling locations at the industrial facility.
- (15) A brief narrative describing those measures taken or planned to reduce water usage and implement pollution prevention techniques, if any, such as: flow restrictors, countercurrent rinses, recycling of non-contact cooling water, chemical substitutions, and pollutant source reduction.
- (16) A list of all environmental permits held by or for the facility.

Please contact us if you have any questions.

(1) INDUSTRY NAME & ADDRESS

Name:	PSNH
Street Address:	97 River Road, Bow, New Hampshire 03304
Mailing Address:	

(2) RESPONSIBLE INDUSTRY OFFICIAL / CONTACT

Official - Name	Harold Keyes
Title:	Station Manager
Phone #:	603-224-4081, ext. 4130
Contact Name:	Allan Palmer
Title:	Senior Engineer
Phone #:	(603) 634-2439, ext. 2439

(3) INDUSTRY TYPE

Product(s):	Electricity Generation		
NAICS Code #(s)	221112	SIC Code # (s)	4911

(4) SIU or CATEGORICAL STANDARDS APPLICABLE Yes No

CIU-Category(s) Name:	40CFR Part:	Subpart:
Steam Electric Power Generating Category	423 ⁽¹⁾	
SIU - Description		
Local Permit Class/ Number		

(1) Facility is subject to 40 CFR 423 but the treated FGD wastestream is not regulated by pretreatment standards

(5) FLOW INFORMATION: TOTAL

This DPR- Ave. Process (gpd)	# of Discharges to sewer:	# of Employees:	# of Shifts:
70,000	N/A	115	2 per day
FLOW SUMMARY	Source	Average (gpd)	Maximum (gpd)
Previous	Sanitary	0	0
	Process	0	0
	TOTAL	0	0
Change - this IDR:	Sanitary	0	0
	Process	* 70,000	70,000
	TOTAL	70,000	70,000
TOTAL :	Sanitary	0	0
	Process	70,000	70,000
	TOTAL	70,000	70,000

*** This value to match the value of "This Request" on Page 1**

NHDES INDUSTRIAL WASTEWATER INDIRECT DISCHARGE REQUEST APPLICATION PG 2 of 2

(7/8) TREATMENT SYSTEM PLANS & SPECS [\$ 1,000 Review Fee]

Engineer:	Ronald A. Breton, P.E.
Company:	GZA GeoEnvironmental, Inc.
P.E. #	5956

ATTACHMENTS

	Attached	Not Applicable	Remarks/Explanation
(6) TREATMENT PROCESS SCHEMATIC	<input checked="" type="checkbox"/>		See Figure 2
(9) PRODUCTION PROCESS DIAGRAM	<input checked="" type="checkbox"/>		See Drawing Number 3977-3-001-B
(10) WASTE STREAM ANALYSES	<input checked="" type="checkbox"/>		See Table 1
(11) TOXICITY/TREATABILITY INFO.	<input checked="" type="checkbox"/>		See Attachment 1
(12) LOCATION MAP	<input checked="" type="checkbox"/>		See Figure 1
(13) CHEMICAL LIST	<input checked="" type="checkbox"/>		See Table 2
(14) SAMPLING LOCATION	<input checked="" type="checkbox"/>		See Figure 2
(15) H ₂ O REDUCTION. / P2 NARRATIVE	<input checked="" type="checkbox"/>		See Attachment 2
(16) ENVIRONMENTAL PERMITS LIST	<input checked="" type="checkbox"/>		See Attachment 3
(7) PLANS, SPECIFICATIONS, OPERATIONS AND MAINTENANCE PROCEDURES	<input checked="" type="checkbox"/>		See Attachment 4

CERTIFICATION : (2)

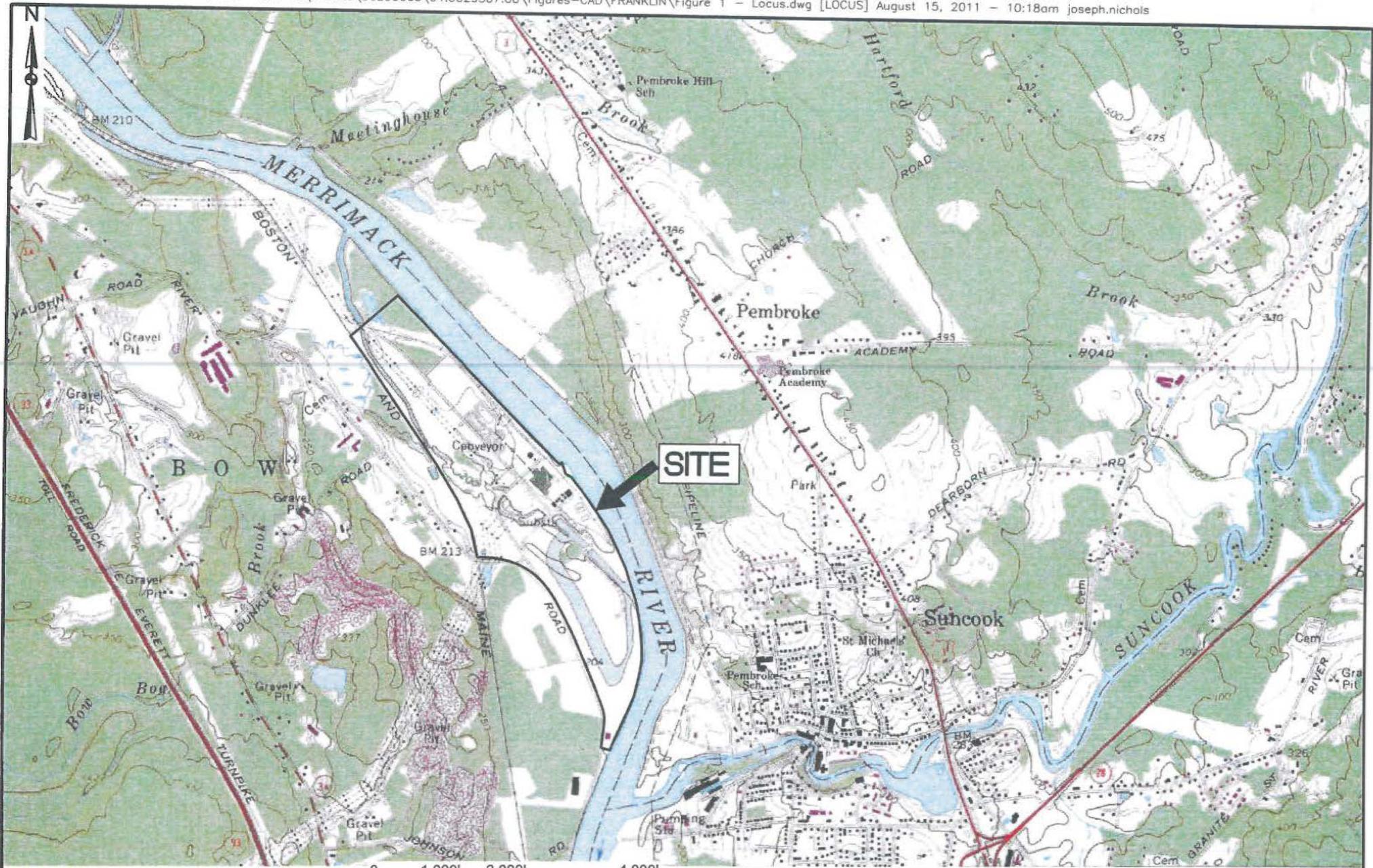
"I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations."

Signature Harold Reyes 8/22/2011
 (Responsible Industry Official)

Note:

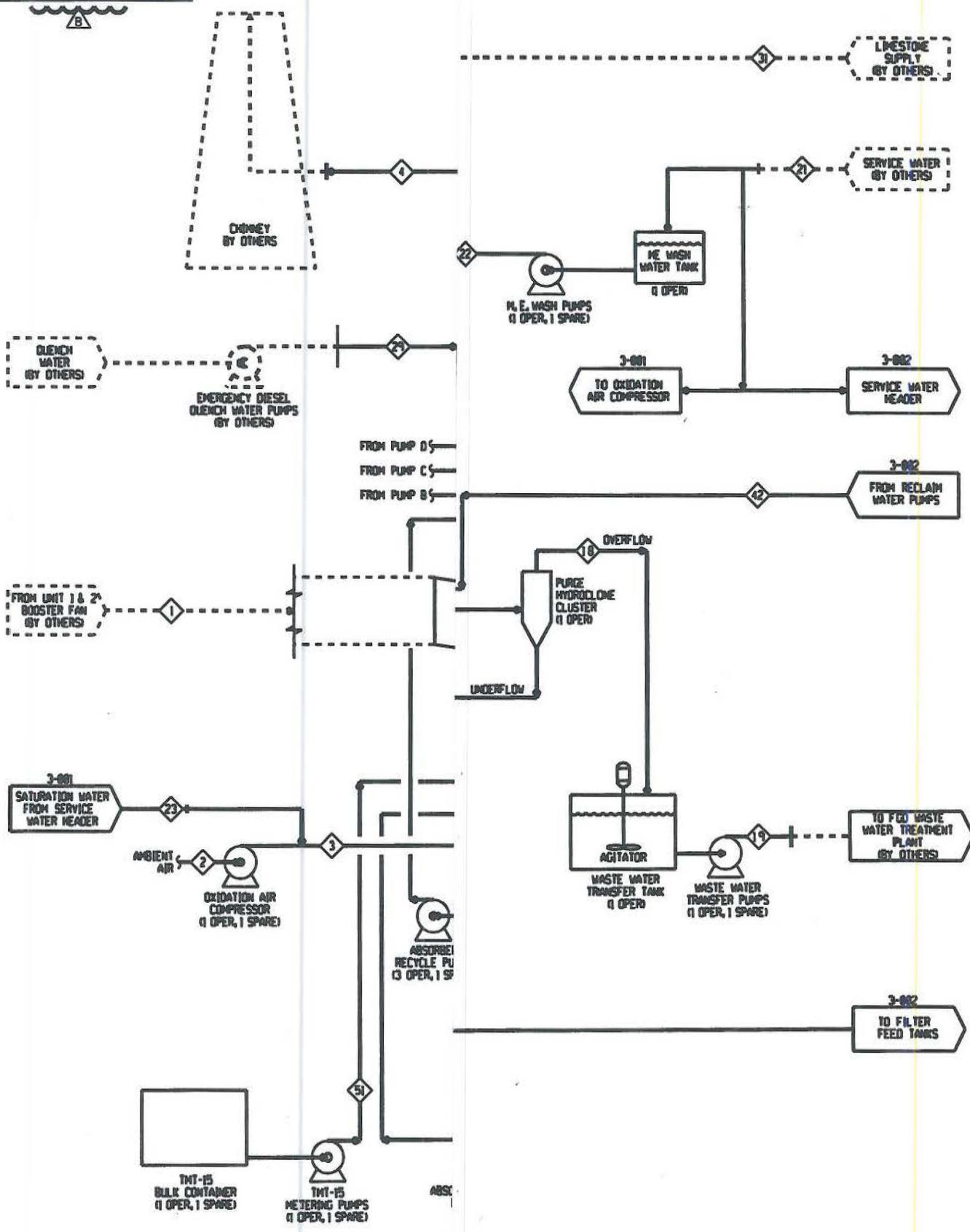
- ♣ Attach additional pages as needed.
- ♣ Feel free to call if you have any questions.
- ♣ () Numbers refer to requirement of IDR Instructions (Page 2).
- ♣ Information not designated with shading is requested but optional.

FIGURES



PREPARED BY:  GZA GeoEnvironmental, Inc. Engineers and Scientists 350 HARVEY ROAD MANCHESTER, NEW HAMPSHIRE 03103 (603) 623-5900	INDUSTRIAL WASTEWATER INDIRECT DISCHARGE REQUEST APPLICATION 97 RIVER ROAD MERRIMACK STATION BOW, NEW HAMPSHIRE	NO.		ISSUE/DESCRIPTION		BY	DATE
		LOCUS PLAN		PROJ MOR: RAB DESIGNED BY: PTP REVIEWED BY: KDB DRAWN BY: JPN CHECKED BY: RAB SCALE: 1" = 2,000'	DATE AUGUST 2011 PROJECT NO. 04.0029307.00 REVISION NO.	FIGURE 1 SHEET NO.	

3977-3-001



PRELIMINARY

NO.	REVISION	DATE	NO.
0	GENERAL REVISIONS	01-20-09	
0	FOR APPROVAL	01-12-09	

C SERVICE OF NEW HAMPSHIRE
 RRIMACK STATION UNITS 102
 BOW, NEW HAMPSHIRE

SIEMENS Power Generation, Inc
 Environmental Systems & Services

PROCESS FLOW DIAGRAM

3977-3-001 B

R:\Information\B5 red drafting\6.5.2 wacc drawings\39773001.DGN