



**FPL Energy**  
**Seabrook Station**

**FPL Energy Seabrook Station**  
**P.O. Box 300**  
**Seabrook, NH 03874**  
**(603) 773-7000**

December 23, 2003

NPDES Permit No. NH0020338  
NYE-03031

Environmental Protection Agency  
NPDES Program Operation Section  
P.O. Box 8127  
Boston, MA 02114

**Seabrook Station**  
**Unusual Fish Impingement – December 2003**

FPL Energy Seabrook, LLC, provides the enclosed report [Enclosure] of an unusual fish impingement on Seabrook Station's intake travelling screens in accordance with Part I.A.24.e of the referenced NPDES Permit. It is estimated that approximately 50,000 fish were impinged during the two-week period from December 6-18, 2003 as a result of a series of strong coastal storms. This report is submitted due to the number of fish impinged during the storms being greater than a typical year's impingement totals.

Telephone notifications were made to the Environmental Protection Agency and the New Hampshire Department of Environmental Services on December 22, 2003 in accordance with the NPDES Permit Part I.A.24.e.<sup>1</sup>

If you have questions on this matter, please call Allen Legendre, Environmental Compliance Supervisor at (603) 773-7773.

Very truly yours,

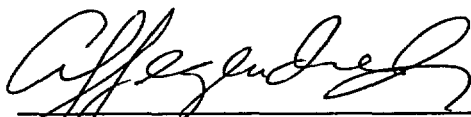
FPL Energy Seabrook, LLC

  
\_\_\_\_\_  
James M. Peschel  
Regulatory Programs Manager

<sup>1</sup> Notification of an unusual number of fish impinged at Seabrook Station, telephone notification to J. Hilton (EPA) and T. Croteau (NHDES) on December 22, 2003

IE23

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.



---

Allen Legendre  
Environmental Compliance Supervisor

Environmental Protection Agency  
NYE-03031 / Page 3

cc (with enclosures):

New Hampshire Department of Environmental  
Services (NHDES) Water Division  
Wastewater Engineering Bureau  
29 Hazen Drive, P.O. Box 95  
Concord, New Hampshire 03302-0095

United States Nuclear Regulatory Commission  
Attention: Document Control Desk  
Washington, DC 20555-0001

G.T. Dentel,  
NRC Senior Resident Inspector, (49-NR)

Mr. Jeffrey Andrews  
NH Dept. of Environmental Services  
29 Hazen Drive  
Concord, NH 03302

Mr. Robert Estabrook  
NH Dept. of Environmental Services  
29 Hazen Drive  
Concord, NH 03302

Mr. John Nelson  
NH Fish and Game Department  
225 Main Street  
Durham, NH 03824

Dr. Clare McBane  
NH Fish and Game Department  
225 Main Street  
Durham, NH 03824

Mr. Damien Houlihan  
U.S. Environmental Protection Agency  
1 Congress Street, Suite 1100  
Boston, MA 02114-2023

Mr. Jack Paar  
Ecosystems Assessment  
U.S. Environmental Protection Agency  
11 Technology Drive  
North Chelmsford, MA 01863-2431

Mr. Mike Johnson  
National Marine Fisheries Service  
One Blackburn Drive  
Gloucester, MA 01930

Mr. Hubert J. Miller  
Regional Administrator - Region 1  
U.S. Nuclear Regulatory Commission  
475 Allendale Road  
King of Prussia, PA 19406-1415

V. Nerses, Project Manager  
Mail Stop 8B-1, Division of Licensing  
Project Management  
U.S. Nuclear Regulatory Commission  
11555 Rockville Pike  
Rockville, Maryland 20852

**SEABROOK ECOLOGICAL  
ADVISORY COMMITTEE**

Dr. John Tietjen, Chairman  
134 Palisade Avenue  
Leonia, NJ 07605

Dr. W. Hunting Howell  
12 James Farm  
Lee, NH 03824

Dr. Saul Saila  
317 Switch Road  
Hope Valley, RI 02832

Dr. Bernard J. McAlice  
270 Foster Road  
Round Pond, ME 04564

Dr. Robert Wilce  
221 Morrill Science Center  
University of Massachusetts  
Amherst, MA 01003

**NORMANDEAU ASSOCIATES**

Mr. Paul Geoghegan  
Normandeau Associates, Inc.  
25 Nashua Road  
Bedford, NH 03110

**ENCLOSURE TO NYE-03031**

**Seabrook Station**  
**Unusual Fish Impingement – December 2003**

Seabrook Station's NPDES Permit Part I.A.24.e specifies that the following five topics be addressed in this report.

**1. The species, sizes, and approximate number of fish involved in the incident.**

An estimated 50,000 fish were impinged during the referenced period. Identified below are the 10 species that constitute about 98 per cent of the fish impinged, their size and approximate number. The majority of these fish are demersal fish with the exception of Atlantic silverside, which was the most common fish impinged.

<b>Species</b>	<b>Size Range (length)</b>	<b>Approximate Number</b>
Atlantic silverside	most < 4 inches	19,000
Winter flounder	most < 6 inches	8,300
Windowpane flounder	most < 5 inches	4,100
Shorthorn sculpin	most < 4 inches	4,000
Sand lance	most < 6 inches	3,000
Atlantic cod	most < 6 inches	2,600
Rainbow smelt	most < 6 inches	2,800
Rock gunnel	most < 5 inches	2,700
Three-spine stickleback	< 3 inches	1,400
Grubby sculpin	< 4 inches	1,200

The biomass of the fish impinged was relatively small as noted by the volume of the 5,200 fish identified during a December 16, 2003 impingement assessment being less than five gallons. The small size and biomass of these fish were representative of the size of the other fish during the December 6-18, 2003 unusual impingement period.

Additional adult equivalency information on the key species impinged will be included in the 2003 Seabrook Station Environmental Monitoring Report.

**2. The time, date, and duration of the occurrence.**

The high fish impingement event occurred during the December 6-18, 2003 coastal storms. Fish impingement decreased substantially after December 18, 2003.

**3. The operating mode of the station at the time of the occurrence.**

Seabrook Station was operating at 100 per cent power during the period of the unusually high fish impingement.

**4. The opinion of the permittee as to the cause of the incident.**

Continuous rough ocean conditions and high winds caused by a series of strong coastal storms are believed to be the cause of the unusual fish impingement event. These oceanic and atmospheric conditions apparently made these fish more susceptible to being drawn into Seabrook Station's offshore intake structures.

**5. The remedial action that the permittee will undertake to prevent a recurrence of the incident.**

Because the high impingement event was due to weather-related conditions, there are no specific corrective actions to prevent recurrence.