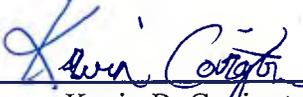


**COMMONWEALTH OF VIRGINIA
Department of Environmental Quality
Valley Regional Office**

STATEMENT OF LEGAL AND FACTUAL BASIS

Georgia Foam, Inc., d/b/a Mid-Atlantic Foam
Winchester, Frederick County, Virginia
Permit No. VRO81111

Title V of the 1990 Clean Air Act Amendments required each state to develop a permit program to ensure that certain facilities have federal Air Pollution Operating Permits, called Title V Operating Permits. As required by 40 CFR Part 70 and 9 VAC 5 Chapter 80, Mid-Atlantic Foam has applied for a renewal of the Title V Operating Permit for its Winchester facility. DEQ has reviewed the application and has prepared a draft Title V Operating Permit.

Air Permit Writer:  Date: 10/10/13
Kevin B. Cowington
(540) 574-7881

Air Permit Manager:  Date: 10/15/13
Janardan R. Pandey, P.E.

FACILITY INFORMATION

Permittee

Georgia Foam, Inc., d/b/a Mid-Atlantic Foam
P.O. Box 742
Fredericksburg, Virginia 22401

Facility

Mid-Atlantic Foam
326 McGhee Road
Winchester (Frederick County), Virginia 22603

Plant ID No.: 51-069-0101

SOURCE DESCRIPTION

SIC Code: 3086 – Plastics Foam Products

NAICS Code: 326140 – Polystyrene Foam Product Manufacturing

Georgia Foam, Inc., d/b/a Mid-Atlantic Foam manufactures molded foam boards for insulation. The boards are made of expandable polystyrene (EPS) beads. EPS beads are placed in a pre-expander where the beads are steam heated and expand due to the pentane blowing agent in the beads. After expansion the beads are transferred to a fluidized bed dryer where excess steam is removed with hot air. Beads are placed in storage silos, and from storage are molded into blocks. The blocks are then cut into different board shapes and sizes. Some of the cut board material is laminated to other materials. Pollution sources at the facility include the pentane blowing agent, which is a volatile organic compound (VOC). The pentane VOC is emitted throughout the process. Other VOC emissions result from organic solvent evaporation from molding binders and from the adhesives used in the lamination process.

The facility is a Title V major source of volatile organic compounds (VOC). This facility is located in an attainment area for all pollutants, and is a PSD minor source. The facility is currently permitted under a minor NSR Permit issued on June 21, 1989, and amended on August 5, 1991 and December 30, 1998; and a Title V operating permit dated January 19, 2009, as amended on June 24, 2009, which expires on January 18, 2014 (the “existing permit”).

CHANGES SINCE RENEWAL OF THE EXISTING PERMIT IN 2009

The existing permit became effective on January 19, 2009. Only one revision to the permit has been processed during this permit cycle: an administrative amendment to change the owner of the facility from Team/IBS, Inc., to Mid-Atlantic Foam that was issued on June 24, 2009.

CHANGES TO THE EXISTING PERMIT

On April 22, 2013 the Valley Regional Office (VRO) received a Form 805 application dated April 17, 2013 from Mid-Atlantic Foam for the renewal of its Title V operating permit. As indicated in the application, the current operations at the facility are identical to those governed by the existing permit. There have been no amendments to the minor NSR permit dated June 21, 1989 (as amended on August 5, 1991 and December 30, 1998) during the term of the current Title V operating permit.

No substantive changes from the existing permit are proposed for the renewal of the Title V operating permit. The formatting of the permit and the General Conditions have been updated as needed to reflect changes to the permit boilerplate that have occurred during the past five years.

In its application cover letter, Mid-Atlantic Foam requested that the emission factors developed from site-specific testing in 1999 be replaced by emission factors from an industry-sponsored study conducted in 2009, and it included a copy of the study report as Attachment F to its application. By e-mail dated April 30, 2013, the company (through its consultant) agreed to continue using its current emission factors.

Note that Mid-Atlantic Foam submitted a minor NSR permit application in tandem with its Title V permit renewal application. The company desired to modify its minor NSR permit now in order to reflect in this Title V permit renewal the future replacement of certain existing emission units. However, since the company does not intend to actually replace any existing equipment until the summer of 2015 (two years from now), and since the authority to construct under a minor NSR permit expires within 18 months of permit issuance, DEQ suggested, and the company agreed, that modification of the minor-NSR permit should be delayed for the time being. Accordingly, all references in the Form 805 application for the Title V permit renewal to new equipment that is not yet installed (such as emission units AF and AG listed on Page 4) should be ignored.

COMPLIANCE STATUS

The facility is inspected approximately every other year. The most recent full compliance evaluation (FCE) with a site visit was conducted on November 15, 2011. In addition, all reports and other data required by permit conditions or regulations, which are submitted to DEQ, are evaluated for compliance. Based on these compliance evaluations, the facility has not been found to be in violation of any state or federal applicable requirements at this time.

EMISSION UNIT AND CONTROL DEVICE IDENTIFICATION

The emission units at this facility consist of the following:

Table 1: Significant Emission Units

Emission Unit ID	Stack ID	Emission Unit Description	Size/Rated Capacity ²	Pollution Control Device (PCD) Description	PCD ID	Pollutant Controlled	Applicable Permit Date
EU1	S2	Pre-expander Dinglebein (PE-1) Model V-A-K 2000 (1989)	3000 lb/hr	---	---	---	6/21/1989 ¹
	V1 & V2	Bead storage - Custom Storage Bins (EBS-1) (1989)	3000 lb/hr	---	---	---	6/21/1989 ¹
	S3	Molding machine Wieser Molding Machine (M-1) (1989)	3000 lb/hr	---	---	---	6/21/1989 ¹
	S4 - S10	7 Hot Boxes (HB-1) (1989)	28 parts/hr	---	---	---	6/21/1989 ¹

¹The Minor New Source Review Permit was issued on 6/21/89 and amended on 8/5/91 and 12/30/98.

²The Size/Rated capacity is provided for informational purposes only, and is not an applicable requirement.

EMISSIONS INVENTORY

A copy of the 2012 emission statement is attached. Emissions are summarized in the following table.

Table 2: 2012 Actual Emissions

	2012 Criteria Pollutant Emission in Tons/Year				
Emission Unit	VOC	CO	SO ₂	PM ₁₀	NO _x
EU-1	64.24	--	--	--	--
Total	64.24	--	--	--	--

EMISSION UNIT APPLICABLE REQUIREMENTS – EU1

Limitations

The following applicable VOC limitations are state BACT requirements as well as requirements limiting the facility potential to emit from Part I, Conditions 4, 5, and 6 of the minor NSR permit dated June 21, 1989, as amended on August 5, 1991 and December 30, 1998. A copy of the permit and letter-style amendments are included as Attachment B.

Condition 4, limiting the yearly production of expanded polystyrene insulation products to 4,800 tons per year.

Condition 5, limiting operation of the pre-expander/dryer to 4,800 hours per year.

Condition 6, limiting facility-wide VOC emissions to 240 tons per year.

Although Condition 4 of the minor NSR permit states the facility production limit as 4,800 tons of product per year, the existing permit – as well as both preceding Title V operating permits – express the facility production limit in terms of raw material processed (“no more than 4,800 tons of polystyrene beads” shall be processed). There is no explanation for this discrepancy in the Statement of Basis for any of the preceding operating permits, so DEQ asked the company about this discrepancy. Mid-Atlantic Foam responded that it prefers to keep this limit expressed as a raw material throughput because the amount of beads processed correlates better with VOC emissions than does the amount of product produced. The emissions calculation formula used by the facility (which is provided on the following page) uses the amount of beads processed - as opposed to the amount of product produced - as one of its variables, which supports stating the facility production limit in terms of raw material used instead of product produced.

Monitoring

The monitoring and recordkeeping requirements in Part II, Condition 2 of the NSR permit have been modified to meet Part 70 requirements.

The permittee will monitor and record monthly and rolling 12 month records of bead usage for each lot used, VOC content for each lot used, and pre-expander/dryer hours of operation. The permittee will keep records of all bead supplier MSDS sheets or VOC data sheets showing bead VOC content for each bead lot used and records of DEQ-approved VOC retention factors and VOC retention factor test results. The permittee will calculate and record monthly and rolling 12 month VOC emissions using the formula shown below to determine compliance with the VOC emission limit.

$$E = \sum_{i=1}^n (W_i \times C_i) / 2000 \times (1 - R)$$

where

- E = VOC emissions in tons per month;
- W_i = The pounds of an individual lot of beads processed in the month;
- C_i = The weight fraction VOC content of the beads for an individual lot;
- R = The weight fraction of VOC retained in the product as approved by the DEQ on June 14, 1999, or as determined by subsequent retention testing required pursuant to Condition 6 of the permit and approved by DEQ. Per the 1999 testing, Hot Box processed bead retains 19% of the VOC, and non-Hot Box processed bead retains 40%

Mid-Atlantic Foam provided its emissions calculations spreadsheet for 2012 as Attachment E to its application. That spreadsheet shows total bead usage for the year of 2,742,915 lbs (1,371.5 tons), with an average VOC content of the beads of 6.29% (which is at the upper end of the range of 4% to 7% specified in its process description provided as Attachment D).

$$2,742,915 \text{ lb beads} * 0.0629 \text{ lb VOC/lb bead} = 172,529 \text{ lb VOC}$$

The spreadsheet shows 128,501 lb (64.25 tons) of VOC emissions for 2012. This yields an average retention factor of:

$$\begin{aligned} \text{VOC retention factor} &= \text{VOC retained} / \text{VOC initially present} \\ &= (\text{VOC initially present} - \text{VOC emitted}) / \text{VOC initially present} \\ &= (172,529 - 128,501) / 172,529 \\ &= 0.255 \end{aligned}$$

This average retention value of 25.5% is between the 19% retention for Hot Box processed bead, and 40% for non-Hot Box processed bead. Therefore, the company's emissions calculations appear to be reasonable.

Recordkeeping

The permit includes requirements for maintaining records of all monitoring and testing required by the permit. These records include the amount of polystyrene beads processed by the pre-expander, the VOC content of each lot of polystyrene beads processed, the pre-expander hours of operation, the DEQ approved retention factor and the retention test factor results, and VOC emission limit calculations.

Compliance Assurance Monitoring

Compliance Assurance Monitoring (CAM) does not apply to emission unit EU-1 since there are no control devices used to achieve compliance with emission limitations.

Testing

Within 60 days of each process or operational change which may affect VOC product retention factors, the permit includes requirements to conduct retention testing to determine the weight fraction of VOC retained in the final product. The permittee may use the following test method: South Cost Air Quality Management District (SCAQMD) Test Method 306-91, Analysis of Pentanes in Expandable Styrene Polymers, or other method approved in writing by DEQ.

Note that the initial Title V operating permit for this facility (issued January 19, 1999) required testing to determine the weight fraction of VOC retained in the product. This value is used to calculate VOC emissions to demonstrate compliance with the VOC limit of 240 tpy. Initial retention testing was completed on March 18 and March 30, 1999. The resulting VOC retention factors of 19% for hot box products and 40% for products which are not processed in the hot boxes were approved by the DEQ on June 14, 1999. The first renewal of the operating permit (issued in 2004) limited future VOC retention testing to only after a process or operational change that may affect the VOC retention factors, as described above.

Except for the testing described above, the permit does not require other source emission tests. DEQ and EPA have authority to require emission testing not included in this permit if necessary to determine compliance with an emission limit or standard.

Reporting

The permit includes a requirement to submit records of the six month reporting period for the pre-expander hours of operation, the amount of polystyrene bead processed by the pre-expander, VOC emissions, and semi-annual VOC reduction progress reports.

Streamlined Requirements

NSR permit Part I, Condition 7 which required an initial visible emission reading has not been included. The visible emission reading was performed on June 19, 1991 and found no visible emissions.

New source start-up notification requirements in Part II, Condition 1 of the NSR permit have not been included since the source is in operation.

Remaining general conditions in Part II of the NSR permit have been modified to meet the

general condition requirements of 40 CFR Part 70 and 9 VAC 5-80-110.

GENERAL CONDITIONS

The permit contains general conditions required by 40 CFR Part 70 and 9 VAC 5-80-110 that apply to all facilities with a Title V operating permit. These include requirements for submitting semi-annual monitoring reports and an annual compliance certification report. The permit also requires notification of deviations from permit requirements or any excess emissions.

STATE-ONLY APPLICABLE REQUIREMENTS

There are no state-only applicable requirements for this facility.

FUTURE APPLICABLE REQUIREMENTS

There are no known requirements that are expected to become applicable to this facility in the future.

INAPPLICABLE REQUIREMENTS

The applicant has identified the Standards of Performance for Volatile Organic Compound Emissions from the Polymer Manufacturing Industry in 40 CFR Part 60, Subpart DDD (the polymer manufacturing NSPS), as inapplicable. The facility does not manufacture polystyrene resin or beads (it purchases polystyrene beads as its raw material), so this standard is not applicable.

The applicant has also identified the National Emission Standards for Hazardous Air Pollutant Emissions: Group IV Polymers and Resins in 40 CFR Part 63, Subpart JJJ (the major source polymer and resin MACT), as inapplicable. The facility is not a source of hazardous air pollutants, so this standard is not applicable.

DEQ also evaluated the applicability of the National Emission Standards for Hazardous Air Pollutants for Chemical Manufacturing Area Sources in 40 CFR Part 63, Subpart VVVVVV (the area source chemical manufacturing MACT). The facility is not a source of hazardous air pollutants, so this standard is not applicable.

Similarly, the National Emission Standards for Hazardous Air Pollutants for Industrial, Commercial, and Institutional Boilers Area Sources in 40 CFR Part 63, Subpart JJJJJ (the industrial boiler MACT) is not applicable to the 8.4 MMBtu/hr natural gas-fired boiler because the facility is not a source of hazardous air pollutants. Moreover, natural gas-fired boilers are exempted from this MACT.

Finally, DEQ evaluated the applicability of the Mandatory Greenhouse Gas Reporting requirements set forth in 40 CFR 98. This regulation requires general stationary fuel combustion sources that emit 25,000 metric tons of CO₂e or more per to report greenhouse gas (GHG) emissions annually. The definition of “applicable requirement” in 40 CFR 70.2 and 71.2 does not include requirements such as those included in Part 98, promulgated under Clean Air Act (CAA) section 114(a)(1) and 208. Therefore, the requirements of 40 CFR Part 98 are not applicable under the Title V permitting program.

INSIGNIFICANT EMISSION UNITS

The insignificant emission units are presumed to be in compliance with all requirements of the Clean Air Act as may apply. Based on this presumption, no monitoring, recordkeeping or reporting shall be required for these emission units in accordance with 9 VAC 5-80-110.

Insignificant emission units include the following:

Emission Unit No.	Emission Unit Description	Citation ¹ (9 VAC)	Pollutant(s) Emitted (5-80-720 B)	Rated Capacity (5-80-720 C)
GT-1	Geotech Steam Coil Heater	5-80-720 B.2	VOC	3000 lbs of bead/hr
RP-1	Roll Laminator	5-80-720 B.2	VOC	28 parts/hr
B-1	NG Fired Boiler	5-80-720 C.2.a	PM ₁₀ , VOC, CO, NO _x , SO ₂	8.369 MMBtu/hr

¹The citation criteria for insignificant activities are as follows:

9 VAC 5-80-720 A - Listed Insignificant Activity, Not Included in Permit Application

9 VAC 5-80-720 B - Insignificant due to emission levels

9 VAC 5-80-720 C - Insignificant due to size or production rate

Note that in the existing permit, GT-1 is referred to as the “Geotech Binder”, but in the current application the company states that “Geotech steam coil heater” is better terminology for this emission unit.

CONFIDENTIAL INFORMATION

The permittee did not submit a request for confidentiality. All portions of the Title V application are suitable for public review.

PUBLIC PARTICIPATION

Notice of the proposed permit was published in *The Winchester Star* on June 21, 2013. The public comment period was from June 21, 2013 to July 22, 2013. No public comments were received. The EPA 45-day comment period ran concurrently with the public notice, and it ended on August 5, 2013. No comments were received from EPA.

ATTACHMENTS

Attachment A: 2012 Emission Statement

Attachment B: Minor New Source Review Permit issued June 21, 1989, with letter amendments

Attachment A
2012 Emission Statement



VIRGINIA DEPARTMENT OF ENVIRONMENTAL QUALITY

2012 EMISSION STATEMENT

Please correct any errors in the information below (cross out & replace)

FACILITY NAME GEORGIA FOAM INC, MID-ATLANTIC FOAM DIVISION	REGISTRATION # 81111	CONTACT PERSON RICHARD MCMAHON	
LOCATION ADDRESS 326 McGhee Rd Winchester VA 22603		JURISDICTION Frederick County	
MAILING ADDRESS 326 McGhee Road	MAILING CITY AND STATE Winchester VA	ZIPCODE 22603	
OWNER NAME Georgia Foam Inc Mid-Atlantic Foam Division	TELEPHONE NUMBER 5406620882	PRIMARY NAICS CODE 326140	For Agency Use Only
			Title V Major

FACILITY TOTALS (Sum emissions from attached pages)

	ANNUAL	OZONE SEASON
TOTAL VOC EMISSIONS FOR 2012	64.24 TONS/YR	494.15 LBS/DAY
TOTAL NO _x EMISSIONS FOR 2012	0.00 TONS/YR	0.00 LBS/DAY
TOTAL SO ₂ EMISSIONS FOR 2012	TONS/YR	NA
TOTAL PM ₁₀ EMISSIONS FOR 2012	TONS/YR	NA
TOTAL PB EMISSIONS FOR 2012	TONS/YR	NA
TOTAL TRS EMISSIONS FOR 2012	TONS/YR	NA
TOTAL TNMOC EMISSIONS FOR 2012 (landfills only)	TONS/YR	NA
TOTAL non-VOC/non-PM HAP EMISSIONS FOR 2012	TONS/YR	NA
TOTAL CO EMISSIONS FOR 2012	TONS/YR	NA
TOTAL PM _{2.5} EMISSIONS FOR 2012	TONS/YR	NA
TOTAL NH3 EMISSIONS FOR 2012	TONS/YR	NA

PLEASE ATTACH "ANNUAL UPDATE" FORM.
PLEASE ATTACH "EMISSION STATEMENT CERTIFICATION" with appropriate signature.

RECEIVED
 To: Valley
 File: 3/27/13
 3/27/13

2012 EMISSION CALCULATIONS
OPTION II: ENGINEERING ESTIMATE OR MATERIAL BALANCE METHOD

REGISTRATION #: 81114 STACK NO.: 2 POINT NO.: 20 SEGMENT NO.: 1 SCC 4909999

Material Balance - 1373 Tons of Bead used

Emissions From Process
64.24 tons

RECEIVED
D... Valley
MAR 29 2013
To: _____
File: _____



VIRGINIA DEPARTMENT OF
ENVIRONMENTAL QUALITY

EMISSION STATEMENT CERTIFICATION

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 and evaluating 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.

(see reverse side for instructions)

SIGNATURE: *Richard J. McMahon* DATE: *3/13/13*
PRINTED NAME: *Richard James McMahon*
TITLE: *Business Unit Manager*
COMPANY: *Mid-Atlantic Foam*
REGISTRATION NUMBER: *8111*
TELEPHONE NUMBER: *540-662-0882-ext 128*

RECEIVED
DEPT. OF ENVIRONMENTAL QUALITY
MAR 20 2013
To: _____
File: _____

Mid-Atlantic Foam

2011 VOC Emissions & Bead Usage

Registration No.: 81111 YEAR-2012

Title V Reporting:

VOC Emissions and
Amount of Polystyrene Beads Processed
Year of Operation: 2012

	Monthly VOC Emissions (In Tons)	Rolling 12 mos. VOC Emissions (In Tons)	Monthly Bead Processed (In Tons)	Rolling 12 mos. Bead Processed (In Tons)	Monthly Pre-Expander Hours of Operation	Rolling 12 mos. Pre-Expander Hours of Operation
January	4.49	71.56	97	1,590	94.00	1,634.00
February	4.66	71.12	101	1,575	110.00	1,660.50
March	5.35	71.04	113	1,577	127.00	1,694.00
April	4.86	70.84	102	1,569	117.50	1,646.00
May	4.87	70.87	95	1,553	99.00	1,630.50
June	5.11	66.16	117	1,437	133.50	1,569.00
January through June Totals	29.34		625.00		681.00	

Mid-Atlantic Foam
 2011 VOC Emissions & Bead Usage
 Registration No.: 81111 YEAR-2012

RECEIVED
 Delaware Valley
 MAR 20 2013

To: _____
 File: _____

Title V Reporting: VOC Emissions and
 Amount of Polystyrene Beads Processed
 Year of Operation: 2012

	Monthly VOC Emissions (In Tons)	Rolling 12 mos. VOC Emissions (In Tons)	Monthly Bead Processed (In Tons)	Rolling 12 mos. Bead Processed (In Tons)	Monthly Pre-Expander Hours of Operation	Rolling 12 mos. Pre-Expander Hours of Operation
July	5.27	63.12	109	1,356	166.50	1,560.50
August	5.93	61.73	123	1,316	173.50	1,553.00
September	4.50	60.05	101	1,285	138.50	1,535.50
October	6.66	60.48	143	1,299	159.00	1,562.50
November	6.48	60.96	144	1,315	146.50	1,564.50
December	6.06	64.24	128	1,373	173.00	1,638.00
July through December Totals	34.90		748		957.00	
Totals for the Years	64.24		1,373		1,638.00	

Registration Number: 81111

County - Plant ID: 069-00101

Plant Name: Mid-Atlantic Foam

POLLUTANT EMISSIONS REPORT (PLANT) (Tons/Year)

Parameter List

Pollutant Type: Criteria Pollutants

Years: 2012-2012

VOC

2012

64.240

SOURCE

64.24 ✓

Das
3/27/13

Attachment B

**Minor New Source Review Permit issued June 21, 1989,
with letter amendments**



COMMONWEALTH of VIRGINIA

DEPARTMENT OF ENVIRONMENTAL QUALITY

Valley Regional Office

James S. Gilmore, III
Governor

Street address: 4411 Early Road, Harrisonburg, Virginia 22801
Mailing address: P.O. Box 1129, Harrisonburg, VA 22801-1129
Telephone (540) 574-7800 Fax (540) 574-7878
<http://www.deq.state.va.us>

Dennis H. Treacy
Director

John Paul Woodley, Jr.
Secretary of Natural Resources

R. Bradley Chewning, P.E.
Valley Regional Director

December 30, 1998

Mr. Michael Terpak
President
Insulated Building Systems, Inc.
326 McGhee Road
Winchester, Virginia 22603

Location: Frederick County
Registration No: 21111
County-Plant No: 069-0101

Dear Mr. Terpak:

This letter is an amendment to your new source review permit dated June 21, 1989, and amended on August 5, 1991. The Department of Environmental Quality is amending the permit in response to the Title V permit application received February 19, 1998, and your September 9, 1998, letter requesting replacement of the hourly VOC emission limit in Part I, Condition 6, with a 12 month rolling limit.

In the course of evaluating the application and arriving at a final decision to approve the amendment, the DEQ deemed the application complete on November 17, 1998. The amendment was reviewed and processed concurrently with the Title V permit application.

Accordingly, Part I, Condition 6, of your new source review permit dated June 21, 1989, and amended on August 5, 1991, is amended as follows:

6. Volatile Organic Compounds emissions from expandable polystyrene production shall not exceed 240 tons per year calculated monthly as the sum of each consecutive 12 month period.
(9 VAC 5-50-260 and 9 VAC 5-170-160)

The amended permit condition is legally enforceable. Failure to comply may result in a Notice of Violation and civil penalty. Please read this condition carefully. All other terms of your June 21, 1989, permit and August 5, 1991, amendment remain in effect.

This permit amendment approval shall not relieve Insulated Building Systems, Inc., of the responsibility to comply with all other local, state and federal permit regulations.

Mr. Michael Terpak
December 30, 1998
Page 2

9 VAC 5-170-200 of the Board's Regulations provides that you may request a formal hearing from this case decision by filing a petition with the Board within 30 days after this case decision notice was mailed or delivered to you. Please consult the relevant regulations for additional requirements for such requests.

Additionally, as provided by Rule 2A:2 of the Supreme Court of Virginia, you have 30 days from the date you actually received this permit amendment or the date on which it was mailed to you, whichever occurred first, within which to initiate an appeal to court by filing a Notice of Appeal with:

Dennis H. Treacy, Director
Department of Environmental Quality
P.O. Box 10009
Richmond, Virginia 23240-0009

In the event that you receive this permit amendment by mail, three days are added to the period in which to file an appeal. Please refer to Part Two A of the Rules of the Supreme Court of Virginia for additional information including filing dates and the required content of the Notice of Appeal.

If you have any questions concerning this amendment, please call David B. Sellers at (540) 574-7856.

Sincerely,


for Larry M. Simmons, P.E.
Regional Permit Manager

cc: Director, OAPP (electronic file submission)
Manager, Data Analysis (electronic file submission)



WALLACE E. REED, CHAIRMAN
CHARLOTTESVILLE

TIMOTHY E. BARROW,
VICE CHAIRMAN
VIRGINIA BEACH

SAM C. BROWN, JR.
VIRGINIA BEACH

FRANCES C. KIEFFER
FAIRFAX

ALAN L. LAUBSCHER, P.E.
REGIONAL DIRECTOR

COMMONWEALTH of VIRGINIA

Department of Air Pollution Control

NORTHERN VIRGINIA REGIONAL OFFICE
SPRINGFIELD CORPORATE CENTER
6225 BRANDON AVENUE
SUITE 310
SPRINGFIELD, VIRGINIA 22150
(703) 644-0311
FAX # (703) 644-0296
TDD # (804) 371-8471

August 5, 1991

Mr. Robert M. Barlow
Insulated Building Systems, Inc.
100 Powers Court
Sterling, Virginia 22170

Location: Frederick County
Registration No: 21111
County-Plant No: 1220-0101

Dear Mr. Barlow:

Reference your letter of September 12, 1990 concerning the retention of the existing TRI Pre-Expander/Dryer at your Winchester manufacturing facility and our telephone conversation of December 19, 1990 (Millward to Barlow). As presented in your letter of September 12, the TRI Pre-Expander will be used exclusively for the larger bead, while the Dingledein Model VA-K-2000 will be used for the smaller bead, thereby, eliminating the need to purge the system during changeovers in product production.

Accordingly, Part I, Condition 3 of your air permit is amended to delete the word "temporary" from the installed equipment description of the Pre-Expander/Dryer, TRI Manufacturing Company, Model 905.

All other conditions of the air permit issued June 21, 1989 remain in force.

Sincerely,

Alan L. Laubscher
Regional Director

for Wallace N. Davis
Executive Director

ALL/WNM/da

cc: Assistant Executive Director - Regional Operations
Assistant Executive Director - Technical Operations
Director, Division of Technical Evaluation
An Equal Opportunity Employer



WALLACE E. REED, CHAIRMAN
CHARLOTTESVILLE

ELIZABETH H. HASKELL, VICE CHAIRMAN
MARTINSVILLE

TIMOTHY E. BARROW
VIRGINIA BEACH

SAM C. BROWN, JR.
RICHMOND

MANUEL DEESE
RICHMOND

COMMONWEALTH of VIRGINIA

Department of Air Pollution Control

ROOM 801, NINTH STREET OFFICE BUILDING
POST OFFICE BOX 10089
RICHMOND, VIRGINIA 23240
(804) 786-2378

RICHARD L. COL
EXECUTIVE DIRECTOR

RECEIVED

June 21, 1989

AUG 2 1989

**S.A.P.C.B.
REGION VII**

Mr. Robert H. Barlow
Insulated Building Systems, Inc.
150 McGhee Road
Winchester, VA 22601

Location: Frederick County
Registration No. 21111
County-Plant No. 1220-0101

Dear Mr. Barlow:

Attached is a permit to construct and operate an expanded polystyrene insulation products manufacturing/fabrication facility at the Stonewall Industrial Park, Winchester, Frederick County in accordance with the provisions of the Commonwealth of Virginia Regulations for the Control and Abatement of Air Pollution.

In the course of evaluating the application and arriving at a final decision, the Department of Air Pollution Control deemed the application complete on February 28, 1989 and solicited written public comments by placing a newspaper advertisement in the Winchester Star on April 26, 1989. The thirty day comment period (provided for in Section 120-08-01 C4) expired on May 25, 1989.

This approval to construct and operate shall not relieve Insulated Building Systems, Inc. of the responsibility to comply with any other local, State and Federal regulations.

If you have any questions concerning this permit, please contact the Director, Region VII, at (703) 644-0311.

Sincerely,

Wallace N. Davis

Wallace N. Davis
Executive Director

WIND/MNH/JES/edb

cc: Director, Division of Technical Evaluation
Director, Division of Computer Services
Director, Air Management Division, EPA

Director, Region VII
Springfield Towers - Suite 502
6320 Augusta Drive
Springfield, VA 22150



WALLACE E. REED, CHAIRMAN
CHARLOTTESVILLE

ELIZABETH H. HASKELL, VICE CHAIRMAN
MARTINSVILLE

TIMOTHY E. BARROW
VIRGINIA BEACH

SAM C. BROWN, JR.
RICHMOND

MANUEL DEESE
RICHMOND

COMMONWEALTH of VIRGINIA

Department of Air Pollution Control

ROOM 801, NINTH STREET OFFICE BUILDING
POST OFFICE BOX 10089
RICHMOND, VIRGINIA 23240
(804) 788-2378

RICHARD L. COOF
EXECUTIVE DIRECTOR

STATIONARY SOURCE PERMIT TO CONSTRUCT AND OPERATE

In compliance with the Federal Clean Air Act and the Commonwealth of Virginia Regulations for the Control and Abatement of Air Pollution,

Insulated building Systems, Inc.
150 McGhee Road
Winchester, Virginia 22601
Registration No. 21111
County-Plant No. 1220-0101

is authorized to construct and operate

a manufacturing/fabrication facility
for expanded polystyrene insulation
products

located at

150 McGhee Road (Stonewall Industrial
Park) Winchester, Frederick County,
Virginia

in accordance with Part I - Specific Conditions (emission limitations, monitoring and testing requirements), Part II - General Conditions, and Part III - Document List of this permit.

Approved this twenty-first day of June, 1989.

Wallace N. Davis
Executive Director

Permit Consists of 5 pages.
Part I - Specific Conditions 1 to 8.
Part II - General Conditions 1 to 12.
Part III - Document List, 4 items.

PART I - SPECIFIC CONDITIONS - the regulatory reference and authority for each condition is listed in parenthesis () after each condition.

1. Insulated Building Systems, Inc. is located at 150 McGhee Road, Winchester, Frederick County, Virginia.
2. Construction and operation shall be as proposed in the permit application dated January 25, 1989, including amendments dated January 30, 1989.
(Section 120-02-11 of State Regulations)
3. The equipment to be installed consists of:
 - Pre-Expander/Dryer, Dingledein Model VA-K-2000 rated at 1.0 tons per hour, maximum;
 - Pre-Expander/Dryer, TRI manufacturing Company Model 905 (temporary);
 - Site-Built Silos for Pre-Puff Curing; and
 - Molding Machine, Weiser Mold, Model Vacucompact.
4. The yearly production of expanded polystyrene insulation products shall not exceed 4,800 tons.
(Section 120-02-11 of State Regulations)
5. The Pre-Expander/Dryer shall not operate more than 4,800 hours per year.
(Section 120-02-11 of State Regulations)
6. Emissions from the operation of the facility shall not exceed the limitations specified below:

Volatile Organic Compounds	99 lbs/hr	240 tons/yr
(Pentane)		

Basis for this limitation is an estimated five percent loss of pentane per ton of expanded polystyrene insulation products produced.
(Section 120-05-0403 of State Regulations)
7. Upacity tests shall be conducted on the Pre-Expander/Dryer exhaust. The details of the tests shall be arranged with the Director, Region VII.
(Section 120-02-11 of State Regulations)
8. The following non-criteria pollutants from the manufacturing process as listed in the permit application are presently exempt from regulation because the uncontrolled emission rates are less than the emission rates specified in Table 5-3 of the regulations: pentane.
(Section 120-05-0301 of State Regulations)

PART II - GENERAL CONDITIONS

1. The permittee shall furnish written notification to the Department (Director, Region VII) of:
 - a. The anticipated start-up date of the facility, postmarked not more than 30 days nor less than 15 days prior to such date.
 - b. The actual start-up date of the facility, within 15 days after such date.
(Section 120-05-05 of State Regulations)
2. The permittee shall retain records of all emission data and operating parameters, to include process throughputs, required by the terms of this permit. These records shall be maintained by the source for the most current three year period.
(Sections 120-05-05 and 120-06-05 of State Regulations)
3. Insulated Building Systems, Inc. shall submit to the Director, Region VII semi-annual progress reports concerning (a) the continuing industry research program on the development and/or application of alternate expanded polystyrene blowing agents and any other applicable innovative control technologies, and (b) plant pentane emissions using material balance methods. Initial report is due January 1, 1990. Reports shall continue until terminated by mutual agreement between the Director, Region VII and Insulated Building Systems, Inc. The Board may decide to revise this permit on the basis of reported developments/ applications which are economically viable and achieve significant emission reductions.
(Section 120-02-11 of State Regulations)
4. This permit may be modified or revoked in whole or in part for cause, including, but not limited to, the following:
 - a. Violation of any terms or conditions of this permit;
 - b. Obtaining this permit by misrepresentation or failure to disclose fully all relevant facts;
 - c. A change in any condition that requires either a temporary or permanent reduction or elimination of a permitted discharge;
or
 - d. Information that the permitted discharge of any pollutant poses a threat to human health, welfare, or the environment.
(Sections 120-02-11 and 120-08-01 of State Regulations)

5. The permitted facility is to be constructed and operated as represented in the permit application referenced in Condition 2 of Part I. No changes in the permit application specifications or any existing facilities shall be made which alter the emissions into the ambient air or alter the impact of the facility on air quality without the prior written approval of the board. Any requested change in the operation of the plant that increases the allowable volatile organic compounds emissions to 250 tons per year or more shall subject the facility to a full scale PSD (Prevention of Significant Deterioration) Permit review. (Sections 120-02-11, 120-08-01 and 120-08-02 of State Regulations)
6. This permit shall become invalid if installation is not commenced within eighteen months from the date of this permit or if it is discontinued for a period of 18 months. (Section 120-08-01 I of State Regulations)
7. In the event of any change in control of ownership of the permitted source, the permittee shall notify the succeeding owner of the existence of this permit by letter and send a copy of that letter to the Department (Director, Region VII). (Section 120-02-11 of State Regulations)
8. The conditions of this permit are severable, and if any provision of this permit, or the application of any provision of this permit to any circumstance, is held invalid, the application of that provision to other circumstances, and the remainder of this permit, shall not be affected thereby. (Section 120-02-11 of State Regulations)
9. This permit approval is only applicable to the permit requirements of the State Air Pollution Control Board and does not alter permit requirements by any other local, state, or federal government agency. The permittee is cautioned that approval of this permit should not be construed to mean its operation is automatically in compliance with all aspects of the Regulations for the Control and Abatement of Air Pollution. Initial compliance shall be verified by stack test if required, visible emission evaluation if appropriate, and by other means (process rate, operating practice, etc.). Continuing compliance shall be verified by Department personnel by constant surveillance in accordance with the State Air Pollution Control Board regulations. Compliance with all air pollution regulations must be a continuing, full time effort. (Section 120-02-11 of State Regulations)
10. Annual requirements to fulfill legal obligations to maintain current stationary source emissions data will necessitate your prompt response to requests for information to include, as appropriate: fuel consumption by type, heat value, sulfur and ash content; process and production data; refuse disposal by incineration including auxiliary fuels burned; storage, handling and use of liquid organic compounds; and, changes in stack data, control equipment, and operating schedules.

Such requests for information from the Department will either be in writing or by personal contact. The availability of information submitted to the Department or the Board will be governed by applicable provisions of the Freedom of Information Act, §§ 2.1-340 through 2.1-348 of the Code of Virginia, § 10.1-1314 (addressing information provided to the Board), and § 120-02-30 of the State Air Pollution Control Board Regulations. Information provided to federal officials is subject to appropriate federal law and regulations governing confidentiality of such information.
(Section 120-02-31 of State Regulations)

11. A copy of this permit shall be maintained on the premises of the facility to which it applies.
(Section 120-02-11 of State Regulations)
12. The permittee shall allow authorized state and federal representatives, upon the presentation of credentials:
 - a. to enter upon the permittee's premises on which the facility is located or in which any records are required to be kept under the terms and conditions of this permit;
 - b. to have access to and copy at reasonable times any records required to be kept under the terms and conditions of this permit or the State Air Pollution Control Board Regulations;
 - c. to inspect at reasonable times any facility, equipment, or process subject to the terms and conditions of this permit or the State Air Pollution Control Board Regulations; and
 - d. to sample or test at reasonable times. For purposes of this section, the time for inspection shall be deemed reasonable during regular business hours or whenever the facility is in operation. Nothing contained herein shall make an inspection time unreasonable during an emergency.
(Section 120-02-11 of State Regulations)

PART III - DOCUMENT LIST

1. Insulated Building Systems, Inc. permit application, dated January 25, 1989, as amended, and signed by Robert H. Barlow.
2. Department of Air Pollution Control, Region VII engineering analysis, dated March 10, 1989.
3. Department of Air Pollution Control notification letter to the Superintendent, Shenandoah National Park, dated February 16, 1989.
4. Department of Air Pollution Control, Region VII Public Hearing Report, dated June 9, 1989.