STATE OF FLORIDA

DEPARTMENT OF ENVIRONMENTAL REGULATION

TWIN TOWERS OFFICE BUILDING 2600 BLAIR STONE ROAD TALLAHASSEE, FLORIDA 32301-8241



BOB GRAHAM GOVERNOR VICTORIA J. TSCHINKEL SECRETARY

April 26, 1984

CERTIFIED MAIL-RETURN RECEIPT REQUESTED

Mr. L. C. Lahman, Plant Manager Agrico Chemical Company South Pierce Chemical Works Post Office Box 1969 Bartow, Florida 33830

Dear Mr. Lahman:

Enclosed is Permit Number AC 53-55780, dated April 26, 1984, to Agrico Chemical Company, issued pursuant to Section 403, Florida Statutes.

Acceptance of this permit constitutes notice and agreement that the department will periodically review this permit for compliance, including site inspections where applicable, and may initiate enforcement actions for violation of the conditions and requirements thereof.

Sincerely,

C. H. Fancy, P.E.
Deputy Bureau Chief
Bureau of Air Quality
Management

CHF/pa

Enclosure

cc: William S. Hornbeck, P.E., Agrico Chemical Company H. W. Long, Agrico Chemical Company Dan Williams, DER Southwest District

No. 0157496

RECEIPT FOR CERTIFIED MAIL

NO INSURANCE COVERAGE PROVIDED— NOT FOR INTERNATIONAL MAIL

(See Reverse)

ST		T AN	AND ZIP CODE	y the	
PO:	STAC	\$			
	CERTIFIED FEE			1	¢
EES		SPECIAL DELIVERY		1	¢
₹.		RESTRICTED DELIVERY		i	¢
STER FC	WICES	SERVICE	SHOW TO WHOM AND DATE DELIVERED		¢
OSTMA:	OPTIONAL SERVICES	IPT SE	SHOW TO WHOM, DATE, AND ADDRESS OF DELIVERY		¢
CONSULT POSTMASTER FOR FEES	OPTIO	IN RECEIPT	SHOW TO WHOM AND DATE DELIVERED WITH RESTRICTED DELIVERY		¢
NOO		RETURN	SHOW TO WHOM, DATE AND ADDRESS OF DELIVERY WITH RESTRICTED DELIVERY		
TO1	TAL I	POS	AGE AND FEES	\$	
POS	TMA		OR DATE .		

B	SENDER: Complete items 1, 2, and 3. Add your address in the "RETURN TO" space on reverse.						
1: The following service is requested (characteristics) Show to whom and date delivered Show to whom, date and address RESTRICTED DELIVERY Show to whom and date delivered RESTRICTED DELIVERY. Show to whom, date, and address	I: The following service is requested (check one.) Show to whom and date delivered						
1							
P. O. Box 1969 Bartow, FL 33830							
T REGISTERED NO. CERTIFIED NO.	INSURED NO.						
0157496							
(Always obtain signature of addre							
I have received the article described above. SIGNATURE DAddresses DAnthorized agent There is a contract to the contract of t							
Mr. Edward E. Maye P. O. Box 1969 Bartow, FL 33830 3. ARTICLE DESCRIPTION: REGISTERED NO. CERTIFIED NO. 0157496 (Always obtain signature of address SIGNATURE DAddressee DAuthoriz DATE OF DEVIVERY DATE OF DEVIVERY 1. DATE OF DEVIVERY	POSTMARK						
CERTIF	O. F. C.						
6. UNABLE TO DELIVER BECAUSE:	CLERK'S						
	☆GPO: 1979-300-459						

PS Form 3800, Apr. 1976

.

FINAL DETERMINATION

Agrico Chemical Company South Pierce Chemical Works Polk County

Prilled Sulfur Pellet Handling and Melting Facility

State Permit Number AC 53-55780

Florida Department of Environmental Regulation Bureau of Air Quality Management

Central Air Permitting

April 20, 1984

Response to Public Comment

(AC 53-55780)

Agrico Chemical Company
Sulfur Pellet Handling and Melting Facility
Polk County

The company's construction permit application for installation of a sulfur pellet handling and melting facility in Polk County, Florida has been reviewed by FDER. Public notice of the Department's proposed action and hearing was published in the Lakeland Ledger on February 16, 1984. An additional opportunity for public comment and notice of cancellation of Public Hearing was published in the Lakeland Ledger on March 23, 1984. Copies of the preliminary determination and application were available for public inspection at DER's Southwest District Offices in Tampa and the Bureau of Air Quality Management in Tallahassee.

There were no comments from the public as a result of the public notice period.

The final action of the Department will be to issue the permit as noticed in the public review process.

STATE OF FLORIDA

DEPARTMENT OF ENVIRONMENTAL REGULATION

TWIN TOWERS OFFICE BUILDING 2600 BLAIR STONE ROAD TALLAHASSEE, FLORIDA 32301-8241



BOB GRAHAM GOVERNOR VICTORIA J. TSCHINKEL SECRETARY

PERMITTEE:

Agrico Chemical Company P. O. Box 1969 State Road 630 Bartow, Florida 33830 Permit Number: AC 53-55780

Date of Issue:

Expiration Date: October 30, 1985*

County: Polk

Latitude/Longitude: 27° 45' 45" N

81° 56' 28" W

Project: Wet Prilled Sulfur Pellet

Handling and Melting

Facility

This permit is issued under the provisions of Chapter(s) 403

, Florida Statutes, and Florida Administrative Code Rule(s)

17-2 and 17-4

. The above named permittee is hereby authorized to perform the work or operate the facility shown on the application and approved drawing(s), plans, and other documents attached hereto or on file with the department and made a part hereof and specifically described as follows:

For the construction of an underground receiving and unloading pit located in a partially enclosed receiving shed, construction of a conveyor from the receiving pit to a 150 ton storage hopper which will distribute by means of a screw conveyor, wet prilled sulfur pellets to three 900 ton melters.

The source is located within the existing facility of the South Pierce Chemical Complex south of Lakeland, Florida, in Polk County. The universal transverse mercator (UTM) coordinates of the source are Zone 17:407.6 km East and 3071.3 km North.

List of Attachments:

- 1. Application AC 53-55780 Received Southwest District, 5-10-82.
- Incompleteness letter to L. C. Lahaman from DER, 6-9-82.
- 3. Additional information received, 9-22-82.
- 4. Extension of time request to C. H. Fancy from Agrico 11-22-82.
- 5. Letter to Steve Smallwood from H. Long, Agrico, submitting test data, 2/8/83.
- 6. Emission Factor Determination for Prilled Sulfur by Dale Lundgren, 2-28-83.
- 7. Letter from Steve Smallwood to Dale Lundgren to request clarification of emission data, 3-17-83.
- 8. August 5, 1983 letter from Ed de la Parte to Steve Smallwood responding to request for information submitted March 17, 1983 to Dale Lundgren.
- 9. Letter from Agrico's H. Long to Ed Huck 9/22/83 submitting answers on technical clarification of issues.
- * 18 months after the validity of the permit is established

 * Protecting Florida and Your Quality of Life
 Page 1 of 10

I. D. Number:

Permit Number: AC 53-55780

Date of Issue:

Expiration Date: October 30, 1985

GENERAL CONDITIONS:

1. The terms, conditions, requirements, limitations, and restrictions set forth herein are "Permit Conditions" and as such are binding upon the permittee and enforceable pursuant to the authority of Sections 403.161, 403.727, or 403.859 through 403.861, Florida Statutes. The permittee is hereby placed on notice that the department will review this permit periodically and may initiate enforcement action for any violation of the "Permit Conditions" by the permittee, its agents, employees, servants or representatives.

- 2. This permit is valid only for the specific processes and operations applied for and indicated in the approved drawings or exhibits. Any unauthorized deviation from the approved drawings, exhibits, specifications, or conditions of this permit may constitute grounds for revocation and enforcement action by the department.
- 3. As provided in Subsections 403.087(6) and 403.722(5), Florida Statutes, the issuance of this permit does not convey any vested rights or any exclusive privileges. Nor does it authorize any injury to public or private property or any invasion of personal rights, nor any infringement of federal, state or local laws or regulations. This permit does not constitute a waiver of or approval of any other department permit that may be required for other aspects of the total project which are not addressed in the permit.
- 4. This permit conveys no title to land or water, does not constitute state recognition or acknowledgement of title, and does not constitute authority for the use of submerged lands unless herein provided and the necessary title or leasehold interests have been obtained from the state. Only the Trustees of the Internal Improvement Trust Fund may express state opinion as to title.
- 5. This permit does not relieve the permittee from liability for harm or injury to human health or welfare, animal, plant or aquatic life or property and penalties therefor caused by the construction or operation of this permitted source, nor does it allow the permittee to cause pollution in contravention of Florida Statutes and department rules, unless specifically authorized by an order from the department.

THE SECTION OF THE PROPERTY OF THE PROPERTY OF THE PARTY OF THE PARTY

And the second second

I. D. Number:

Permit Number: AC 53-55780

Date of Issue:

Expiration Date: October 30, 1985

GENERAL CONDITIONS:

6. The permittee shall at all times properly operate and maintain the facility and systems of treatment and control (and related appurtenances) that are installed or used by the permittee to achieve compliance with the conditions of this permit, as required by department rules. This provision includes the operation of backup or auxiliary facilities or similar systems when necessary to achieve compliance with the conditions of the permit and when required by department rules.

- 7. The permittee, by accepting this permit, specifically agrees to allow authorized department personnel, upon presentation of credentials or other documents as may be required by law, access to the premises, at reasonable times, where the permitted activity is located or conducted for the purpose of:
 - a. Having access to and copying any records that must be kept under the conditions of the permit;
 - Inspecting the facility, equipment, practices, or operations regulated or required under this permit;
 and
 - c. Sampling or monitoring any substances or parameters at any location reasonably necessary to assure compliance with this permit or department rules.

Reasonable time may depend on the nature of the concern being investigated.

- 8. If, for any reason, the permittee does not comply with or will be unable to comply with any condition or limitation specified in this permit, the permittee shall immediately notify and provide the department with the following information:
 - a. a description of and cause of non-compliance; and
 - b. the period of noncompliance, including exact dates and times; or, if not corrected, the anticipated time the noncompliance is expected to continue, and steps being taken to reduce, eliminate, and prevent recurrence of the noncompliance.

Page 3 of 10

I. D. Number:

Permit Number: AC 53-55780

Date of Issue:

Expiration Date: October 30, 1985

GENERAL CONDITIONS:

The permittee shall be responsible for any and all damages which may result and may be subject to enforcement action by the department for penalties or revocation of this permit.

- 9. In accepting this permit, the permittee understands and agrees that all records, notes, monitoring data and other information relating to the construction or operation of this permitted source, which are submitted to the department, may be used by the department as evidence in any enforcement case arising under the Florida Statutes or department rules, except where such use is proscribed by Sections 403.73 and 403.111, Florida Statutes.
- 10. The permittee agrees to comply with changes in department rules and Florida Statutes after a reasonable time for compliance, provided however, the permittee does not waive any other rights granted by Florida Statutes or department rules.
- 11. This permit is transferable only upon department approval in accordance with Florida Administrative Code Rules 17-4.12 and 17-30.30, as applicable. The permittee shall be liable for any non-compliance of the permitted activity until the transfer is approved by the department.
- 12. This permit is required to be kept at the work site of the permitted activity during the entire period of construction or operation.
- 13. This permit also constitutes:
 - () Determination of Best Available Control Technology (BACT)
 - () Determination of Prevention of Significant Deterioration
 - () Compliance with New Source Performance Standards.
- 14. The permittee shall comply with the following monitoring and record keeping requirements:
 - a. Upon request, the permittee shall furnish all records and plans required under department rules. The retention period for all records will be extended automatically, unless otherwise stipulated by the department, during the course of any unresolved enforcement action.

Page 4 of 10

I. D. Number:

Permit Number: AC 53-56780

Date of Issue:

Expiration Date: October 30, 1985

GENERAL CONDITIONS:

- b. The permittee shall retain at the facility or other location designated by this permit records of all monitoring information (including all calibration and maintenance records and all original strip chart recordings for continuous monitoring instrumentation), copies of all reports required by this permit, and records of all data used to complete the application for this permit. The time period of retention shall be at least three years from the date of the sample, measurement, report or application unless otherwise specified by department rule.
- c. Records of monitoring information shall include:
 - the date, exact place, and time of sampling or measurements;
 - the person responsible for performing the sampling or measurements;
 - the date(s) analyses were performed;
 - the person responsible for performing the analyses;
 - the analytical techniques or methods used; and
 - the results of such analyses.
- 15. When requested by the department, the permittee shall within a reasonable time furnish any information required by law which is needed to determine compliance with the permit. If the permittee becomes aware that relevant facts were not submitted or were incorrect in the permit application or in any report to the department, such facts or information shall be submitted or corrected promptly.

SPECIFIC CONDITIONS:

Note: All capacities are based on long tons and all emissions are based on short tons.

- 1. The only type of solid formed sulfur handled or melted at the South Pierce Chemical Works facility shall be in prill (pellet) form and shall be Fletcher process wet-formed prill pellets, such as those manufactured by Coastal and PVC, or a tested, verified, and department approved equivalent.
- 2. The maximum hours of operation of this facility shall be 8,760 per year. The maximum production shall not exceed 75 tons per hour, 1,800 tons per day, or 600,000 tons per year.

Company

I. D. Number:

Permit/Number: AC 53-55780

Date of Issue:

Expiration Date: Oct. 30, 1985

SPECIFIC CONDITIONS:

3. The maximum total emissions of sulfur particulate shall not exceed 2.8 pounds in any hour from the handling and melting facility.

- 4. The maximum total emissions of sulfur particulate shall not exceed 12 tons per year from the handling and melting facility.
- 5. The maximum total emissions of hydrogen sulfide (H_2S) shall not exceed 1 pound in any one hour or 5 tons per year from the handling and melting facility.
- 6. Sulfur prill received at South Pierce shall not be unloaded if the moisture content is less than three (3) percent. The moisture content will be monitored and if necessary adjusted by the addition of moisture as specified in Attachment 9.
- 7. A wet scrubber device servicing the drop point from the conveyor from the unloading pits to the 150 ton dump hopper will be properly installed and maintained as specified in facility diagrams and sketches in Attachment 9. The particulate emission from the scrubber exhaust shall not exceed 1 pound per hour as determined by DER Method 5. The angle of incline on the conveyor belt shall not exceed 15°.
- 8. A wet scrubber device servicing the 150 ton dump hopper and the manifold feed to the three 900 ton melters will be properly installed and maintained as specified in facility diagram and sketches in Attachment 9.
 - A. The particulate emission from the scrubber exhaust shall not exceed .2 pounds per hour as determined by DER Method 5.
 - B. The hydrogen sulfide emission from the scrubber exhaust shall not exceed .75 pounds per hour as determined by EPA Method 16.
- 9. The final disposition of the spent caustic soda solution from the hydrogen sulfide scrubber to which the melters are vented shall be handled and processed in accordance with the conditions specified in Attachment 9. This condition is necessary to prevent emission of hydrogen sulfide gas from the receiving waters. Additional treatment may be required to meet wastewater discharge requirements of the department.

I. D. Number:

Permit/Number: AC 53-55780

Date of Issue:

Expiration Date: October 30, 1985

SPECIFIC CONDITIONS:

10. On site storage of sulfur pellets in open storage piles is not allowed.

- 11. In order to minimize any wind entrainment of sulfur particulate during the unloading operation, Agrico will install a wind anemometer that will sound an alarm when the five minute average wind speed exceeds 18 miles per hour. Sulfur pellet unloading operations will be terminated until the wind has subsided to below 18 miles per hour, five minute average.
- 12. This facility will be constructed in the physical location described on the plot plan submitted to the Department of Environmental Regulation. This shall be in accordance with the property ownership map of the South Pierce Chemical Works area and an aerial map made in 1983 submitted depicting the area surrounding the construction of this source.
- 13. Clean up and housekeeping procedures: During operation the area superintendent or the superintendent's designate will survey the entire area for fugitive sulfur on a daily basis. If a significant spill occurs, such as a break in a conveyor belt, the sulfur shall be reclaimed from the spill area as soon as possible, that day. The area beneath the conveyor will be paved to facilitate easy recovery of the sulfur without introducing contamination.
- 14. The permittee shall establish and all equipment operators shall attend a training program, designed by Agrico and approved by the department, on equipment operating practices to assure the minimization of unconfined particulate matter.
- 15. There shall be no visible emissions resulting from the remelting of the wet prilled sulfur pellets in excess of 10% opacity (6 minute average) at any point in the plume that is more than 2 meters downwind of the point at which the wet prilled sulfur pellets are melted.
- 16. Within 30 days after issuance of the construction permit, a sulfur particulate and hydrogen sulfide source emissions monitoring plan, and a sulfur particulate perimeter deposition monitoring plan that describes the sampling locations, the sample

Page 7 of 10

Company

I. D. Number:

Permit/Number: AC 53-55780

Date of Issue:

Expiration Date: October 30, 1985

SPECIFIC CONDITIONS:

collecting and analysis procedures, and quality assurance measures to be employed shall be submitted to the Bureau of Air Quality Management by the permittee.

- A. After approval by the department, the deposition monitoring network shall be established expeditiously and operated continuously. A data report shall be submitted to the Southwest District and the Bureau of Air Quality Management within 30 days of the end of each calendar quarter. After 12 months of data have been collected and validated, the department will reevaluate the deposition monitoring network results in detail, and make any changes to the approved monitoring plan that are warranted.
- B. The source emissions monitoring plan shall include:
 - Records of the tonnage processed, type and supplier of the pellets, and moisture as received and added.
 - (2) A method to sample the particulate emissions from the railcar/truck unloading operation.
 - (3) Physical sampling and Lundgren test of sampled pellets.
 - (a) About 10 lb of pellets for each 300 tons of pellets processed.
 - (b) Each 400 lb of sample collected to be riffled down to 20 lb of composite sample.
 - (c) Three 5 lb samples of composite sample to be tested in Lundgren test chamber at approximately 1, 2 and 3% moisture.
 - (d) One 5 lb sample to be retained for 2 years for QA check by DER.
 - (e) Results to be reported to DER quarterly (with report on results of deposition monitoring).
 - (f) This plan will be reconsidered after fully evaluating one full year of valid data.

Page 8 of 10

Company

I. D. Number:

Permit Number: AC 53-55780

Date of Issue:

Expiration Date: October 30, 1985

SPECIFIC CONDITIONS:

17. Compliance with the process limitations of this permit shall be demonstrated by recordkeeping of: Daily hours of operation for sulfur handling and melting; any spillage recovery, the amounts of sulfur associated with each activity; the times of such spillage and recovery; and other related information necessary to properly interpret the recorded data. Data shall be maintained on file by permittee for a minimum of two years subject to inspection and review as required by DER. Annual reports shall be filed with the DER Southwest District office prior to March 1 of each following year.

- 18. The initial compliance testing for these sources shall consist of the following:
 - A. An onsite inspection by department personnel verifying that construction of the facility is in accordance with permit conditions.
 - B. Certification by the permittee that the employee training program as required has been instituted.
 - C. The witnessing by department personnel of a satisfactory demonstration of sulfur pellet handling and remelting.
 - D. The Department of Environmental Regulation shall conduct visible emissions testing by DER Method 9 during facility operations at 90 to 100% of the maximum designed processing rate to determine whether the conditions in specific condition No. 14 should be modified.
 - E. Scrubbers exhaust tests as required by Specific Conditions 7 and 8. After the initial testing, Agrico will perform annual compliance tests using the same procedure.
- 19. After satisfactory completion of the initial compliance test and prior to 90 days before the expiration of this permit, a complete application for an operating permit shall be submitted to the DER Southwest District office. The permittee may continue to operate in compliance with all terms of this construction permit until its expiration date or the issuance of an operating permit as authorized by Florida Administrative Code Rule 17-2.210(1).

Company

I. D. Number:

Permit Number: AC 53-55780

Date of Issue:

Expiration Date: October 30, 1985

SPECIFIC CONDITIONS:

20. All conditions of this permit that do not relate solely to the construction of the source shall be made a part of any subsequently issued operating permit.

21. Agrico is aware of a pending inquiry by the department into development of a rule concerning sulfur transportation, handling and storage and acknowledges that the rule ultimately adopted could, if made applicable to this category of sources, require substantial modification of the facility which is the subject of this permit. Agrico agrees to comply with any such rule within the time period established within the rule, or, if not so specified, on a reasonable time schedule developed between the permittee and the department. Agrico, by accepting this condition, does not waive its rights to participate in rulemaking proceedings nor to appeal or otherwise challenge the validity (as opposed to the applicability) of the adopted rule.

Issued this 26 day of foil 1984

STATE OF FLORIDA DEPARTMENT OF ENVIRONMENTAL REGULATION

Victoria I Techinkel

State of Florida DEPARTMENT OF ENVIRONMENTAL REGULATION

INTEROFFICE MEMORANDUM

For Routing To District Offices And/Or To Other Than The Addressee						
То:	Loctn.:					
To:	Loctn.:					
To:	Loctn.:					
From:	Date:					
Reply Optional []	Reply Required []	Info, Only []				
Date Due:	Date Due:					

Victoria J. Tschinkel TO:

FROM:

Clair Fancy /

DATE:

April 19, 1984

SUBJ:

Approval of Attached Air Construction it

APR 25 1984

Attached for your signature is one Air Construction Permit for which the applicant is Agrico Chemical Company. construction proposed is a prilled sulfur pellet handling and melting facility at the Agrico South Pierce Chemical Works in Polk County, Florida.

Nancy Wright of the Office of General Counsel has indicated to us that she would state an issuance date of no later than April 26, 1984, in the Consent Order to be filed with the Division of Administrative Hearings.

The Bureau recommends your approval and signature.

CF/pa

Attachment