

ILLINOIS POLLUTION CONTROL BOARD  
March 2, 1989

SHELL OIL COMPANY, )  
 )  
 Petitioner, )  
 )  
 v. ) PCB 89-43  
 )  
 ILLINOIS ENVIRONMENTAL )  
 PROTECTION AGENCY, )  
 )  
 Respondent. )

OPINION AND ORDER OF THE BOARD (by J. Marlin):

This matter comes before the Board upon a February 28, 1989 Illinois Environmental Protection Agency ("Agency") Recommendation that the Board grant a forty-five day provisional variance to the Shell Oil Company ("Shell") from 35 Ill. Adm. Code 214.382(b). Shell requests a variance to allow time to do necessary repairs on the Shell Claus Off-gas Treater ("SCOT") unit of its Sulfur Recovery System.

Shell operates a refinery complex in Wood River Township, Madison County, Illinois. The Shell refinery includes a Sulfer Recovery System with the Shell Claus Off-gas Treater ("SCOT") Unit. The SCOT unit reduces the sulfur compounds in the tail-gases to H<sub>2</sub>S with hydrogen, heat and catalyst. The converted H<sub>2</sub>S is recycled back to the claus units for conversion to sulfer. The treated tail-gas from SCOT is then incinerated prior to exhaust to the atmosphere via a stack. These emissions are limited by 35 Ill. Adm. Code 214.382(b) to 1,000 ppm of sulfer dioxide (SO<sub>2</sub>). The Sulfer Recovery Units/SCOT are presently operated pursuant to an operating permit, Application No. 79090040, with an expiration date of June 31, 1989.

The SCOT unit required a shut-down to allow necessary repairs to be performed. With the reduction in other SO<sub>2</sub> producing operations, Shell will reduce total SO<sub>2</sub> emissions by 5% of the total permitted SO<sub>2</sub> emissions of its Wood River complex. Accordingly, the Agency states that it believes that there should not be any environmental impact from the shutdown of the SCOT unit. Compliance with 35 Ill. Adm. Code 214.382(b) would require shutdown of the refinery during the repairs of the SCOT unit. This would cause an economic loss to Shell in excess of \$600,000 per day. Thus, the Agency states that shutdown of the refinery would cause an arbitrary and unreasonable hardship on Shell.

Shell has a definite compliance plan. The necessary repairs to the SCOT unit will be done during the 45 day period of the provisional variance. While the SCOT unit is shutdown, the rest of the refinery will limit SO<sub>2</sub> emissions to 95% of Shell's permitted level. There is no reasonable alternative for compliance and according to the Agency that the reduction of emissions from other SO<sub>2</sub> emission sources will minimize any possible adverse impacts.

The Board having received notification from the Agency that compliance on a short term basis with the petroleum and petrochemical processes limitations imposed by 35 Ill. Adm. Code 214.382(b) would impose an arbitrary or unreasonable hardship upon Shell, and the Board concurring in that notification, hereby grants provisional variance, subject to the conditions suggested by the Agency.

This Opinion constitutes the Board's findings of fact and conclusions of law in this matter.

ORDER

Shell Oil Company is hereby granted a provisional variance from the requirements of 35 Ill. Adm. Code 214.382(b) for the Shell Claus Off-gas Treater (SCOT) Unit at its Wood River Manufacturing Complex from January 19, 1989 until March 4, 1989, subject to the following conditions:

1. During the period of the provisional variance, the total emissions of sulfur dioxide from the facility shall not exceed 9,863 lbs/hr.
2. Within three (3) days of the end of each calendar week, from the date the provisional variance is granted, the petitioner shall submit a written report to the Agency providing the emissions of sulfur dioxide from the refinery complex for each day in tons per day and pounds per hour.
3. The weekly report shall also contain a summary of the maintenance that was performed on the unit during the subject calendar week.
4. The weekly report shall be submitted to:

Regional Manager  
State of Illinois EPA - DAPC  
2009 Mall Street  
Collinsville, Illinois 62234

5. If the levels of ambient concentrations of sulfur dioxide, based on the Agency's ambient air monitors located in South Roxana or Wood Rover, begin to indicate that an excursion of the NAAQS of 0.14 ppm (24 hours average) is possible, the petitioner shall implement measures to reduce sulfur dioxide emissions from the refinery complex. The measures may include, but not be limited to, reducing crude feed rates to the refinery or switching to low sulfur fuels. The Agency will notify the petitioner by the fastest means available upon occurrence of these levels. Local wind speed and direction will be considered in the determination if notification to petitioner is appropriate.

Within ten days of the date of this Order, Petitioner shall execute and forward to James J. O'Donnell, Enforcement Programs, Illinois Environmental Protection Agency, 2200 Churchill Road, P. O. Box 19276, Springfield, Illinois 62794-9276, a Certification of Acceptance and Agreement to be bound to all terms and conditions of this variance. Failure to execute and forward the Certificate within 10 days renders this variance void and of no force and effect as a shield against enforcement of rules from which variance was granted. The form of said Certification shall be as follows:

CERTIFICATION

I, (We), \_\_\_\_\_, having read the Order of the Illinois Pollution Control Board, in PCB 89-43, dated March 2, 1989, understand and accept the said Order, realizing that such acceptance renders all terms and conditions thereto binding and enforceable.

\_\_\_\_\_  
Petitioner

\_\_\_\_\_  
By: Authorized Agent

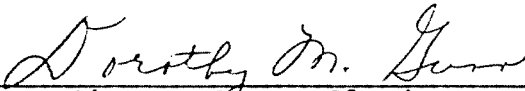
\_\_\_\_\_  
Title

\_\_\_\_\_  
Date

Section 41 of the Environmental Protection Act, Ill. Rev. Stat. 1987 ch. 111 1/2 par. 1041, provides for appeal of Final Orders of the Board within 35 days. The Rules of the Supreme Court of Illinois establish filing requirements.

IT IS SO ORDERED.

I, Dorothy M. Gunn, Clerk of the Illinois Pollution Control Board, hereby certify that the above Opinion and Order was adopted on the 2<sup>nd</sup> day of March, 1989, by a vote of 6-0.

  
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Dorothy M. Gunn, Clerk  
Illinois Pollution Control Board