



## Correspondence



March 13, 1998

Donald Sutton, Manager  
Permits Section  
Division of Air Pollution Control  
Illinois Environmental Protection Agency  
P.O. Box 19506  
Springfield, Illinois 62794-9506

Dear Mr. Sutton:

The purpose of this letter is to provide further guidance on the major modification provisions of the federal rules for Prevention of Significant Deterioration (PSD), 40 CFR 52.21, as applied to a proposed "re-permitting" of the integrated steel mill (Application 93040047) at the Acme Steel Company (Acme) located in Chicago and Riverdale, Illinois. While the U. S. Environmental Protection Agency (USEPA) has had many discussions with your staff at the Illinois Environmental Protection Agency (IEPA) regarding the proposed Acme permit actions, we would like to clarify our position.

According to the information we have received, since approximately 1964, Acme has operated the facilities in Chicago and Riverdale as one integrated steel mill [with coke ovens and blast furnace operations in Chicago together with basic oxygen furnace (BOF), casting and hot strip mill operations in Riverdale]. The Acme integrated steel mill operates in a series of four batch processes. At the Chicago portion of the plant, coke from the coke plant is sent to the blast furnace. The blast furnace produces hot metal that is transported via commercial rail to the BOF shop in Riverdale. With the addition of scrap steel, the BOF shop produces liquid steel that is formed into steel coils in the continuous caster/hot strip mill. Both portions of Acme steel mill are located in the Chicagoland severe non-attainment area for ozone and the Lake Calumet non-attainment area for particulate matter less than 10 microns (PM-10).

In their recent proposal, Acme would like to revise a construction permit issued on March 4, 1994, that authorized the replacement of its old steel processing (teeming, soaking, reheating, and hot strip mill operations at the Riverdale site) with a new, more efficient

continuous caster/hot strip mill. The 1994 permit necessitated the limiting of all major operations (i.e., production of coke, iron, steel, and fuel usage) such that the continuous caster/hot strip mill project would not be considered a major modification for emissions of PM-10 or sulfur dioxide.

Acme now believes that the project was permitted incorrectly.

Specifically, Acme requests that the Riverdale and Chicago portions of the plant be considered two separate sources for New Source Review (NSR) permitting. Due to their belief that debottlenecking of the production line, as considered in the 1994 permit, did not occur with the addition of the new continuous caster/hot strip mill, Acme also requests the removal of all the 1994 permit conditions and limitations associated with the coke ovens, blast furnace and the BOF.

The primary issue presented is whether the Chicago and Riverdale facilities can be considered separate sources or one source.

Secondary is the issue of "re-permitting" the 1994 netting analysis based on different assumptions and limits. With respect to the first issue, the PSD regulations in 40 CFR 52.21(b)(5) and (6) and the Title V operating permit regulations in 40 CFR 70.2 define a stationary source as any building, structure, facility, or installation whose pollutant-emitting activities belong to the same industrial grouping, are located on contiguous or adjacent properties, and are under the control of the same person or entity (or entities under common control). The common control and industrial grouping factors important in determining whether operations should be aggregated as a single source are clearly satisfied. The integrated steel mill operations in Riverdale and Chicago have the same 2-digit SIC code and they are both owned and operated as single source by Acme. The remaining factor to consider in case-by-case single source determinations is consideration of the contiguity and/or adjacency of the Riverdale and Chicago operations. The Riverdale portions of the steel mill are located approximately 3.7 geographic miles from the closest part of the coke plant at the Chicago portion of the mill.

Although the two sites are separated by Lake Calumet, landfills, I-94, and the Little Calumet River, USEPA considers that the close proximity of the sites, along with the interdependency of the operations and their historical operation as one source, as sufficient reasons to group these two facilities as one.

Furthermore, it would now be inappropriate to divide the activities of the steel mill into two sources, because it appears that the netting analysis supporting the 1994 permit depended on the whole facility being one source. The netting analysis performed for PM-10 demonstrated that Acme needed PM-10 emission reductions at the Chicago portion of the plant to offset the increases at the Riverdale portion of the plant due to the continuous caster/hot strip mill addition and resulting debottlenecking. Although Acme would now like to choose a different netting scenario, such that the 1994 operational restrictions would not be necessary to avoid major NSR, this "re-permitting" request is not possible because of the timing of the proposed emission reduction credits. As 40 CFR 52.21(b)(3)(vi)

states:

A decrease in actual emissions is creditable only to the extent that:

- (a) ...
- (b) It is federally enforceable at and after the time that actual construction on the particular change begins; and
- (c) It has approximately the same qualitative significance for public health and welfare as that attributed to the increase from the particular change.

Although USEPA does not consider Acme's business choices to constitute mistakes that warrant permit review, if Acme feels that they need more flexibility or capacity than provided by the 1994 permit, USEPA will work with the IEPA to evaluate that request following the proper modification procedures provided by NSR.

We understand that Illinois EPA has been working closely with Acme to update the PM-10 attainment demonstration for the Lake Calumet PM-10 non-attainment area. Yet, the proposed use of some of those "voluntary reductions" for netting credits is questionable due to pending enforcement consent decrees which require those reductions.

We applaud your efforts to work cooperatively to bring this area into attainment for PM-10, but such efforts cannot be made, such that they violate the principles of the PSD and NSR regulations.

I hope you will find this information useful. We will consider any further information submitted by Illinois EPA with regard to the issues presented in this matter. If we can answer any questions regarding these comments, or if we can provide any further guidance, please contact Keary Cragan, of my staff, at (312) 353-5669. Once again, thank you for your commitment to working with us to improve the permitting process.

Sincerely yours,

/s/

Cheryl L. Newton, Chief  
Permits and Grants Section



**AIR AND RADIATION DIVISION**  
**77 WEST JACKSON BOULEVARD (A-18J)**  
**CHICAGO, ILLINOIS 60604**  
**(800) 621-8431 OR (312) 353-2212**