UNITED STATES ENVIRONMENTAL PROTECTION AGENCY Office of Air Quality Planning and Standards Research Triangle Park, North Carolina 27711

MAR 31 1993

Mr. Bruce S Carhart Executive Director Ozone Transport Commission 444 North Capitol Street, N.W. Suite 604 Washington, D.C. 20001

Dear Bruce:

This is in response to your questions, raised in your December 30, 1992 letter to me, concerning the ozone Transport Commission's (Commission) investigation of the possibility of a regionwide nitrogen oxide (NO_x) off sets trading program. The priority the Commission has given this program reflects the concern of its constituent States and industries in the ozone Transport Region (OTR) that emissions reductions be achieved while minimizing the constraints on economic growth. As you know, the Environmental Protection Agency (EPA) shares this concern and has been evaluating a number of market-based and regional trading issues. Of course, we also share the Commission's desire that any such trading programs be both environmentally and legally sound.

Your letter expressed interest in the EPA's response to questions regarding market-based emissions trading programs raised in a July 29, 1992 letter from Michael Bradley of the Northeast States for Coordinated Air Use Management (NESCAUM) to William Rosenberg, former Assistant Administrator for Air and Radiation. The Agency is continuing to study the issues raised in the NESCAUM letter and intends to respond to the questions raised there in the near future.

In addition, your letter requested the EPA's views regarding specific elements of an approach the Stationary/Area Source Committee of the Commission has developed regarding an interstate offset system. Your letter identifies "the two main statutory requirements for offsets" generally as follows: (1) offsets must be obtained from an area with an equal or higher nonattainment classification as the area in which the new source is locating, and (2) offsets must have a beneficial air quality impact on the area in which the new source is locating. Under the Committee's approach, only the nonattainment classification constraint need be satisfied on a case-by-case basis. You reason that--because Congress created the OTR as a single and unique air quality planning region--offsets anywhere in the OTR arguably "by definition provide a beneficial air quality impact." Also, under the Committee's approach, moderate, marginal, and incomplete/no data nonattainment areas, as well as attainment areas within the OTR, would all be considered moderate areas for purposes of offsets. You explain that these areas would thus constitute a "free trade zone" in the OTR, which you assert is consistent with the Clean Air Act's (Act's) treatment of ozone transport regions. Finally, you note that new sources in serious areas could obtain offsets from any serious or severe area in the OTR, and those locating in severe areas could obtain offsets from any severe area in the OTR.

The EPA's Office of Air Quality Planning and Standards has established a work group to address issues raised by the Committee's approach. The following are our preliminary conclusions.

Statutory Provisions

Section 173(c)(1) of the Act sets out the terms under which sources may trade offsets. Where the source reducing emissions to provide offsets is located in the same nonattainment area as the new source, no special conditions on trading apply. The sources may even be located in different States. Where the source reducing emissions to provide offsets is located in a different nonattainment area than the new source, two special conditions apply. Under section 173(c)(1)(A), the area in which the source is reducing emissions to provide offsets must have an equal or higher nonattainment classification as the area where the new source is locating. Under section 173(c)(1)(B), emissions from the area in which the source is reducing emissions must contribute to a violation of the national ambient air quality standards (NAAQS) in the area where the new source is locating.

Section 184(b) of the Act provides that stationary sources that exit or have the potential to exit 50 tons per year (tpy) of volatile organic compounds (VOC) shall be considered a major stationary source and subject to the requirements that would be applicable to it if the area were classified as a moderate nonattainment area. Under section 182(f), the plan provisions required for major VOC sources also apply to major No. sources. Section 182(b)(5) specifies that the offset ratio applicable to major sources in moderate areas is 1.15:1. New major NO_x sources (i.e., 100 tpy) in the attainment, incomplete/no data, marginal and moderate areas of the OTR must satisfy this offset ratio.

Nonattainment Classification for Offsets Purposes

We do not believe that moderate, marginal, incomplete/no data nonattainment areas, as well as attainment areas within the OTR, may be considered moderate areas for purposes of securing offsets. We recognize that sources in these areas are all subject to the requirements that would be applicable to then if the areas were classified as moderate nonattainment areas. Nonetheless, section 173 (c)(1) by its terms provides that offsets must be obtained from an area of equal or higher nonattainment classification, and these areas have designated classifications under section 107 that govern. We believe that the general policy of section 173(c)(1)--to prevent offsets generated in less polluted areas from being used for new growth in more polluted areas even if contribution is demonstrated-applies equally in the OTR. We do not think emissions reductions in an attainment area can offset new growth in a designated nonattainment area consistent with section 173(c)(1).

Offsets Trading in Nonattainment Areas of the OTR

Section 173 (c) (1) applies by its terms to offsets trading between designated nonattainment areas. As noted above, offsets may be obtained from any location within the same nonattainment area. If the sources are not in the same nonattainment area, however, the designation and contribution conditions of section 173(c)(1)(A) and (B) must be satisfied . Under (A), the offsets must be obtained from an area of equal or higher nonattainment classification. Under (B), contribution must exist.

We believe that section 173 (c)(1)(B) authorizes the EPA to establish a reasonable contribution test, and that the Agency has broad discretion to determine the applicable test, so long as it is technically supportable. At this time, we do not believe it is technically feasible to model the NO_x emissions contribution for ozone for a single offset transaction. A more general contribution test must therefore be adopted. One possible test is that the new source might demonstrate that the source that is reducing emissions is within 2 days transport upwind of the new source location. Alternatively, the source that is reducing emissions a default value of 200 kilometers. In the former case, the sources would bear the burden of this demonstration as part of the approval process for the trade.

We would welcome your comments on these possible contribution tests, as well as any suggestions for other potential tests. Of course, the test adopted for the OTR could have important implications for the test applicable in other nonattainment areas elsewhere in the country.

Offsets Trading in Attainment Areas Of the OTR

The terms of section 173(c)(1) refer to nonattainment areas and contribution to a violation of the NAAQS, and therefore do not apply literally to offsets trading between designated attainment areas. The EPA has discretion to fill this gap, consistent with the spirit of section 173(c)(1),¹ the reasons new source review applies to sources in the attainment areas of the OTR under section 184(b),² and the policies reflected in the EPA's Emission offset Interpretive Ruling, 40 CFR part 51, Appendix S.³ In exercising this discretion, the EPA wants to provide a flexible approach that is consistent with the overall goals of the Commission, is environmentally sound, and legally supportable.

Applying these considerations to the unique circumstances of offsets trading in attainment areas of the OTR, our policy preference is to permit the States to allow offsets trading within those attainment areas without further limitations. The legal support for this approach rests on the purposes, structure, and technical assumptions underlying section 184(b). Congress included attainment areas in the OTR based on the presumption that they constitute a source of emissions that contributes to nonattainment in the OTR, subject to removal from the OTR under section 176A(a) (2) if the Administrator has reason to believe an area does not contribute. Contribution was not established in fact or degree for each attainment

¹ The geographic restrictions of section 173(c)(1) appear to reflect Congress's intent that the emissions impact due to new growth be offset by emissions reductions that benefit the air quality where the new source is locating.

² Congress presumably included in section 184(b) controls on emissions in attainment areas within the OTR in order to address ozone violations in the OTR's nonattainment areas.

³ The Offset Ruling was developed prior to the 1990 Amendments, and thus prior to the extension of the new source review offsets requirements to attainment areas, to the specification of offset ratios, and to the specific geographic limitations of section 173(c)(1). The offset Ruling does, however, indicate that offsets should be obtained "Within the broad vicinity of the proposed new source," and that offsets would be "acceptable if obtained from other areas that may be contributing to the ozone problem at the proposed new source location." The Offset Ruling further notes that "it is desirable to obtain offsets from sources located as close to the proposed new source as possible." This policy is consistent with the apparent intent of section 173 (c) (1) to ensure that the emissions reductions offsets counteract the emissions impact that the new source will cause. area included. Arguably, the same general approach could carry over when emissions are rearranged and reduced overall in the attainment areas through application of the offsets program. As overall contribution from attainment areas was sufficient to include then in the OTR without consideration of specific location, overall reductions in emissions from attainment areas should likewise be sufficient without consideration of specific location. In a sense, these areas might be viewed as constituting a single area for offsets purposes under this approach. Thus, ensuring-that emissions reductions offsets counteract the emissions impact that the new source will cause in the OTR overall would also satisfy the policies of section 173(c)(1) and the offset ruling as applied to attainment area controls in the OTR. Further, it follows that any attainment area in the OTR without further limitations.

The EPA's policy preference is based, in part, on our recognition that the density of major NO_x sources is greatest in the western and southwestern areas of the OTR--areas generally upwind of most designated ozone nonattainment areas in the OTR. We expect that emissions reductions at existing facilities, to offset new growth in the OTR, would most often come from these upwind areas and thus, less frequently from downwind or too far upwind locations. The benefits of such trades are clearest when offsets come from nearby upwind sources. However, even when offsets come from downwind sources or sources that are very far upwind, the emissions reductions still benefit the overall OTR, even if they may not substantially affect the ozone nonattainment areas that the new source will impact.

There is, however, an alternative view that for offsets trading between designated attainment areas within the OTR, emissions from the area where the offsets are generated must contribute to a violation of the NAAQS in a nonattainment area that the new source will impact.⁴ This alternative view incorporates both the implicit purpose of section 184(b) to protect downwind nonattainment areas as well as the provision of section 173(c)(1) that the local impacts of new growth be connected to offsetting emissions reductions. Under this approach, emissions reductions from downwind sources or from sources too far upwind could not be used as offsets. Such an alternative view could presumably be based on the same kind of contribution test as that applicable for trading in nonattainment

⁴ Similarly, if offsets are generated in a nonattainment area f or a new source locating in an attainment area, the nonattainment area's emissions must contribute to a violation of the NAAQS in another nonattainment area that the new source will impact.

areas. We would appreciate further analysis and comments from the Commission or its constituent States regarding these two approaches concerning the relative costs of applying the contribution test, the relative environmental benefits, and the legal analysis. We are also receptive to considering any other approaches that you develop.

In any case, please note that sources locating in either ozone or nitrogen dioxide attainment areas of the OTR also must comply with the requirements of the prevention of significant deterioration (PSD) program. In certain limited cases where sources must limit ambient impacts on Class I areas or increments, if offsets secured in other areas do not sufficiently impact the area where the new source is locating, the new source may need to secure other reductions to satisfy these PSD concerns.

Beyond the policy issues discussed above, it is important to note that there are enforceability issues related to any interarea and/or interstate trading programs which will need to be satisfactorily resolved. As your program development progresses, we will be happy to work with you to identify and address these enforcement issues.

Please contact me if you have any questions or comments about these issues. After you have had an opportunity to study these conclusions with the Stationary/Area Source Committee and the Commission, we look forward to working closely with you to develop a specific program and to resolve any outstanding issues.

Sincerely,

John S. Seitz Director Office of Air Quality Planning and Standards