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May 31, 2018

Honorable Scott Pruitt Administrator U.S. Environmental Protection Agency Mail Code 1101A 1200 Pennsylvania Avenue, N.W. Washington, DC 20460

RE: New York CAA Section 126 Petition.

Dear Administrator Pruitt,

On March 12, 2018, the New York Department of Environmental Conservation filed a petition pursuant to Section 126 of the federal Clean Air Act (CAA) directed at some 123 electric generating units (EGUs), 166 "non-electric generating units" and 59 oil and gas sector facilities in the states of Illinois, Indiana, Kentucky, Maryland, Michigan, Ohio, Pennsylvania, Virginia and West Virginia. By final rule effective on May 11, 2018 (83 Federal Register 21909) EPA extended the deadline for acting on the petition to no later than November 9, 2018. Even though the Environmental Protection Agency (EPA) has not yet opened a formal comment period related to this petition, the defects in the petition are significant enough to compel the submission of comments at this time on behalf of the Midwest Ozone Group<sup>1</sup>.

MOG's concerns regarding the New York petition go to the fundamental premise of CAA \$126 – to provide a carefully crafted mechanism by which states can resolve disputes of interstate transport of air pollutants as they relate to significant contribution to a nonattainment or maintenance problem. The basic premise of CAA \$126 as applied in this case is that New York must first demonstrate that it has an ozone non-attainment or maintenance problem before it can assert a claim against an upwind source. See CAA \$126(b) and 110(a)(2)(D)(ii).



<sup>&</sup>lt;sup>1</sup> The members of and participants in the Midwest Ozone Group include: American Coalition for Clean Coal Electricity, American Electric Power, American Forest & Paper Association, American Wood Council, Ameren, Alcoa, Appalachian Region Independent Power Producers Association (ARIPPA), ArcelorMittal, Associated Electric Cooperative, Citizens Energy Group, Council of Industrial Boiler Owners, Duke Energy, East Kentucky Power Cooperative, FirstEnergy, Indiana Energy Association, Indiana Utility Group, LGE / KU, National Lime Association, Ohio Utility Group, Olympus Power, and City Water, Light and Power (Springfield IL).

In these comments MOG has identified many deficiencies with the New York petition including the fact that EPA has established other processes to address interstate transport through the approval of Good Neighbor implementation plans submitted by the upwind states targeted by the petition and the use of outdated emission data for the sources that are targeted by the petition. Significantly, the following three deficiencies go to the fundamental question of whether New York has an air quality problem that justifies the filing of the petition:

- 1. The petition fails to address exceptional events. Consideration of exceptional events by EPA will show that all New York monitors currently attain the 2008 ozone NAAQS when monitoring data influenced by these exceptional events are excluded.
- 2. The petition fails to address international transport. Consideration of international emissions by EPA will show that "but for" international transport from Canada and Mexico every monitor in New York would attain both the 2008 and 2015 ozone NAAQS.
- 3. The petition fails to consider EPA's most recent 12 km Good Neighbor modeling which demonstrates that all of the New York monitors will attain the 2008 ozone NAAQS. MOG's application of the EPA modeling to a 4km grid goes further and demonstrates that all New York monitors will also attain the 2015 ozone NAAQS.

MOG submits that the New York petition is fatally flawed on both legal and technical grounds and urges EPA to reject the petition.

Very truly yours,

David M Flanney

David M. Flannery Legal Counsel Midwest Ozone Group

cc: William L. Wehrum Assistant Administrator Office of Air and Radiation U.S. Environmental Protection Agency

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# COMMENTS OF THE MIDWEST OZONE GROUP REGARDING STATE OF NEW YORK CLEAN AIR ACT §126 PETITION

MAY 31, 2018

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#### COMMENTS OF THE MIDWEST OZONE GROUP REGARDING STATE OF NEW YORK, CLEAN AIR ACT §126 PETITION<sup>1</sup>

#### MAY 31, 2018

On March 12, 2018, the State of New York filed a petition pursuant to Section 126 of the federal Clean Air Act (CAA) directed at some 123 electric generating units (EGUs), 166 "nonelectric generating units" and 59 oil and gas sector facilities in the states of Illinois, Indiana, Kentucky, Maryland, Michigan, Ohio, Pennsylvania, Virginia and West Virginia. By final rule effective on May 11, 2018 (83 Federal Register 21909) EPA extended the deadline for acting on the petition to no later than November 9, 2018. The petition not only directly affects numerous facilities owned and operated by the members of and participants in the Midwest Ozone Group (MOG) but also raises several significant policy matters that are of significant concern to MOG. While MOG will defer to the owners of the individual sources on matters specific to those facilities, these comments are being offered to address more general concerns about the legal and technical deficiencies of the petition.

MOG is an affiliation of companies, trade organizations, and associations that draw upon their collective resources to seek solutions to the development of legally and technically sound national ambient air quality management programs.<sup>2</sup> MOG's primary efforts are to work with policy makers in evaluating air quality policies by encouraging the use of sound science. MOG has been actively engaged in a variety of EPA issues and initiatives related to the development and implementation of air quality policy, including the development of transport rules, NAAQS standards, nonattainment designations, petitions under 176A and 126 of the Clean Air Act, NAAQS implementation guidance, the development of Good Neighbor state implementation plans and related regional haze issues. MOG members and participants operate a variety of emission sources including more than 75,000 MW of coal-fired and coal-refuse fired electric power generation in more than ten states. They are concerned about the development of technically unsubstantiated interstate air pollution rules and the impacts on their facilities, their employees, their contractors, and the consumers of their products.

<sup>&</sup>lt;sup>1</sup>Questions or inquiries about these comments should be directed to David M. Flannery, Kathy G. Beckett, or Edward L. Kropp, Legal Counsel, Midwest Ozone Group, Steptoe & Johnson PLLC, 707 Virginia Street East, Charleston West Virginia 25301; 304-353-8000; <u>dave.flannery@steptoe-johnson.com</u> and <u>kathy.beckett@steptoe-johnson.com</u> and <u>skipp.kropp@steptoe-johnson.com</u> respectively. These comments were prepared with the technical assistance of Alpine Geophysics, LLC.

<sup>&</sup>lt;sup>2</sup> The members of and participants in the Midwest Ozone Group include: American Coalition for Clean Coal Electricity, American Electric Power, American Forest & Paper Association, American Wood Council, Ameren, Alcoa, Appalachian Region Independent Power Producers Association (ARIPPA), ArcelorMittal, Associated Electric Cooperative, Citizens Energy Group, Council of Industrial Boiler Owners, Duke Energy, East Kentucky Power Cooperative, FirstEnergy, Indiana Energy Association, Indiana Utility Group, LGE / KU, National Lime Association, Ohio Utility Group, Olympus Power, and City Water, Light and Power (Springfield IL).

MOG's concerns regarding the New York petition go to the fundamental premise of CAA \$126 – to provide a carefully crafted mechanism by which states can resolve disputes of interstate transport of air pollutants as they relate to significant contribution to a nonattainment or maintenance problem. The basic premise of CAA \$126 as applied in this case is that New York must first demonstrate that it has an ozone non-attainment or maintenance problem before it can assert a claim against an upwind source. See CAA \$126 (b) and 110(a)(2)(D)(ii).

In conjunction with the denial of the Connecticut \$126 petition involving the Brunner Island facility, EPA itself described the process of evaluating a \$126 petition as follows:

The EPA's basis for this final action denying the petition has not fundamentally changed from the proposal. We continue to believe that Connecticut has not demonstrated that Brunner Island emits or would emit in violation of the good neighbor provision such that it will significantly contribute to nonattainment or interfere with maintenance of the 2008 ozone NAAQS in Connecticut. Moreover, the EPA's own analysis provides no basis to conclude that the Brunner Island facility either currently emits or would emit pollution in violation of the good neighbor provision for the 2008 ozone NAAQS. In section III of this notice, and in the RTC document included in the docket for this action, the agency explains the rationale supporting its conclusion in light of the public comments.

As an initial matter, the EPA's historical approach to evaluating CAA section 126(b) petitions looks first to see whether a petition identifies or establishes a sufficient basis for the requested section 126(b) finding. The EPA first evaluates the technical analysis in the petition to see if that analysis, standing alone, is sufficient to support a section 126(b) finding. The EPA focuses on the analysis in the petition because the statute does not require the EPA to conduct an independent technical analysis to evaluate claims made in section 126(b) petitions. The petitioner thus bears the burden of establishing, as an initial matter, a technical basis for the specific finding requested. The EPA has no obligation to prepare an analysis to supplement a petition, or a petition that fails to identify the specific finding requested, could be found insufficient.<sup>3</sup>

In these comments, MOG has identified many deficiencies with the New York petition. These deficiencies include the use of outdated upwind source emission data and the likelihood that the petition will be mooted when states and EPA act later this year to submit and approve Good Neighbor implementation plans specifically directed at satisfying Clean Air Act requirements with respect to interstate transport consistent with EPA's recently issued guidance on Good Neighbor

<sup>&</sup>lt;sup>3</sup> <u>https://www.gpo.gov/fdsys/pkg/FR-2018-04-13/pdf/2018-07752.pdf</u>

SIPs<sup>4.</sup> In addition, there are three deficiencies that go to the fundamental question of whether New York has an air quality problem that justifies the filing of the petition:

- The petition fails to address exceptional events. Consideration of exceptional events by EPA will show that all New York monitors currently attain the 2008 ozone NAAQS when monitoring data influenced by these exceptional events are excluded.
- The petition fails to address international transport. Consideration of international emissions by EPA will show that "but for" international transport from Canada and Mexico every monitor in New York would attain both the 2008 and 2015 ozone NAAQS.
- The petition fails to consider EPA's most recent 12 km Good Neighbor modeling which demonstrates that all of the New York monitors will attain the 2008 ozone NAAQS. MOG's application of the EPA modeling to a 4km grid goes further and demonstrates that all New York monitors will also attain the 2015 ozone NAAQS.

For reasons based upon these deficiencies and others set forth below, the Midwest Ozone Group strongly believes that EPA must deny the New York 126 petition.

# 1. New York's petition should be rejected because it incorrectly characterizes the emissions of targeted states and sources.

The beginning point for the New York petition is its reliance on some EPA modeling data that was developed in support of the 2016 CSAPR Update Rule. From this data New York selected 10 states that it asserts should be considered today to be "significantly contributing states" in violation of the good neighbor provision of CAA Section 110(a)(2)(D)(i). The 10 states initially identified as "significantly contributing" include: Illinois, Indiana, Kentucky, Maryland, Michigan, New Jersey, Ohio, Pennsylvania, Virginia and West Virginia.

Beyond the fact that the petition did not otherwise rely on any EPA generated data in support of its petition, the data selected to identify these target states are extremely outdated and not representative of emissions that occurred in 2017 – the year selected by New York for review. The following chart compares the data that is used by New York to characterize 2017 EGU emissions compared with the actual EGU NOx emissions in 2017 as measured by Continuous Emission Monitors (CEM) and reported to EPA's CAMD office:

<sup>&</sup>lt;sup>4</sup> See EPA's Stephen Page memorandum, dated October 27, 2017 (<u>https://www.epa.gov/sites/production/files/2017-10/documents/final\_2008\_o3\_naaqs\_transport\_memo\_10-27-17b.pdf</u>) and EPA's Peter Tsirigotis memorandum dated March 27, 2018 (<u>https://www.epa.gov/airmarkets/march-2018-memo-and-supplemental-information-regarding-interstate-transport-sips-2015</u>.

	2017 Ozone Season NOx Tons from All EGUs				
State / Region	Modeled CSAPR Base; IPM 5.14	Actual as Reported to CAMD/CEM	CSAPR-CEM Delta	Delta from CSAPR (%)	
IL .	15,706	14,531	1,175	-7%	
IN	43,842	22,419	21,423	-49%	
KY	38,968	20,053	18,915	-49%	
MD	4,348	2,939	1,409	-32%	
MI	32,167	16,958	15,209	-47%	
NJ	4,001	1,684	2,317	-58%	
ОН	29,599	21,005	8,595	-29%	
PA	50,870	14,435	36,435	-72%	
VA/DC	10,438	8,069	2,369	-23%	
WV	25,582	18,463	7,119	-28%	
Sec 126 Subtotal	255,522	140,556	114,966	-45%	
СТ	493	430	63	-13%	
DE	362	459	(97)	27%	
NY	7,396	5,614	1,782	-24%	
North East	2,730	1,611	1,119	-41%	
WI	8,690	8,103	586	-7%	
NC	21,929	16,474	5,456	-25%	
TN	6,383	10,135	(3,752)	59%	
South	80,999	54,262	26,737	-33%	
AR	11,888	12,811	(923)	8%	
МО	20,572	15,400	5,172	-25%	
OK	24,329	11,043	13,286	-55%	
TX	66,585	54,375	12,210	-18%	
West	180,994	148,488	32,506	-18%	
US Total	688,872	479,761	209,111	-30%	

The New York petition also states (p.10 of 17) that it relied upon 2014 National Emissions Inventory (NEI) data to identify 400 tons sources. Even though New York concedes that in doing so it included emissions that were overstated, it nevertheless conducts its analysis based upon these incorrect and outdated emissions. In the case of 14 forest products industry sources included in the analysis and listed in Appendix B of the petition, the projected 2017 emissions are overstated by almost 7,500 tons. This error is not only significant in making a determination of 2017 emissions, it results in a much greater error in assessing those sources in 2023 – the attainment year applicable to both the 2008 and 2015 ozone NAAQS. Several large coal-fired industrial boilers in various sectors were shutdown, replaced with new natural gas boilers, or retrofitted with new natural gas burners that emit less NOx as a result of the Boiler MACT rule that was implemented after 2014. These lower emissions will be reflected in the actual emissions inventories for 2017 and beyond.

Reliance on such outdated data obfuscates the effect of on-going emission reduction programs. New York's reliance on this outdated information dramatically overstates the impact of these sources on its monitors and requires EPA to deny the New York petition as it did, in part, for the same reason as EPA did in issuing the proposed denial of the Connecticut petition related to the Brunner Island Plant<sup>5.</sup>

# 2. Emission trends for states targeted by the petition have been decreasing for many years and will continue to do so for the foreseeable future.

The New York petition is directed at sources in nine upwind states that have in fact experienced a significant reduction in NOx emissions over recent years. These reductions not only reflect the good faith of these upwind states in regulating their own sources but also the effectiveness of EPA programs adopted to meet the Good Neighbor provisions of the Clean Air Act and to reduce emissions from industrial source categories.

Set forth below is a table developed from EPA modeling platform summaries<sup>6</sup> illustrating total anthropogenic emission reduction and EGU-only emission reduction in the states targeted by the New York petition.

<sup>&</sup>lt;sup>5</sup> 83 Fed. Reg. 7716 (February 22, 2018).

State	2011						
	2011	2017	2023	Tons	%	Tons	%
Illinois	506,607	354,086	293,450	152,521	-30%	213,156	-42%
Indiana	444,421	317,558	243,954	126,863	-29%	200,467	-45%
Kentucky	327,403	224,098	171,194	103,305	-32%	156,209	-48%
Maryland	165,550	108,186	88,383	57,364	-35%	77,167	-47%
Michigan	443,936	296,009	228,242	147,927	-33%	215,694	-49%
New Jersey	191,035	127,246	101,659	63,789	-33%	89,376	-47%
Ohio	546,547	358,107	252,828	188,439	-34%	293,719	-54%
Pennsylvania	562,366	405,312	293,048	157,054	-28%	269,318	-48%
Virginia	313,848	199,696	161,677	114,152	-36%	152,171	-48%
West Virginia	174,219	160,102	136,333	14,117	-8%	37,886	-22%
Sec 126 Total	3,675,930	2,550,399	1,970,766	1,125,531	-31%	1,705,164	-46%
New York	388,350	264,653	230,001	123,696	-32%	158,349	-41%
	Annual FGL	J NOx Emissions	(Tons)	Emissions Delta (2	017-2011)	Emissions Delta (20	023-2011)
State	2011	2017	2023	Tons	<u>%</u>	Tons	<u>/</u> %
Illinois	73,689	31,132	30,764	42,557	-58%	42,926	-58%
Indiana	119,388	89,739	63,397	29,649	-25%	55,991	-47%
Kentucky	92,279	57,520	42,236	34,759	-38%	50,043	-54%
Maryland	19,774	6,001	9,720	13,773	-70%	10,054	-51%
Michigan	77,893	52,829	33,708	25,064	-32%	44,186	-57%
New Jersey	7,241	2,918	5,222	4,323	-60%	2,019	-28%
Ohio	104,203	68,477	37,573	35,727	-34%	66,630	-64%
Pennsylvania	153,563	95,828	49,131	57,735	-38%	104,432	-68%
Virginia	40,141	7,589	20,150	32,553	-81%	19,992	-50%
West Virginia	56,620	63,485	46,324	(6,865)	12%	10,296	-18%
Sec 126 Total	744,792	475,518	338,225	269,274	-36%	406,568	-55%

As can be seen from this table, the states being targeted by the New York petition are projected to reduce their annual anthopogenic NOx emissions by 31% (1.125 million tons) through 2017 and 46% from 3.68 million tons to 1.97 million tons between 2011 and 2023. Comparatively, these targeted states are projected to reduce EGU-only annual NOx emissions by 36% (269 thousand tons) through 2017. The 2017 actual NOx emissions reductions are even greater than the predicted reductions as shown by the CEM-reported emissions presented in earlier sections of this document as compared to the modeled 2017 EGU emissions. Futhermore, a 55% reduction in annual EGU NOx emissions from the NY petition targeted states, or 406 thousand tons, is projected by EPA between 2011 and 2023. Emission trends for these states have been deceasing for many and will continue to decrease for the foreseeable future as the result of nothing mode than on-the-books controls.

### 3. EPA projects that in 2023 all New York monitors will attain or are already in attainment of the 2008 75 ppb ozone NAAQS.

On October 27, 2017, EPA issued guidance and supporting data on how states should develop approvable Good Neighbor SIPs related to the 2008 ozone NAAQS.<sup>7</sup> The following is the opening paragraphs of that memorandum:

The purpose of this memorandum is to provide supplemental information to states and the Environmental Protection Agency Regional offices as they develop or review state implementation plans (SIPs) that address section 110(a)(2)(D)(i)(I) of the Clean Air Act (CAA), also called the "good neighbor" provision, as it pertains to the 2008 ozone National Ambient Air Quality Standards (NAAQS) of 75 parts per billion (ppb). Specifically, we are providing future year ozone design values and contribution modeling outputs for monitors in the United States based on updated air quality modeling (for 2023) and monitoring data. The EPA's updated modeling indicates that there are no monitoring sites, outside of California, that are projected to have nonattainment or maintenance problems with respect to the 2008 ozone NAAQS of 75 ppb in 2023.

EPA's modeling data has been confirmed by modeling performed for MOG by Alpine Geophysics.<sup>8</sup>

 <sup>&</sup>lt;sup>6</sup> Stephen Page memorandum, October 27, 2017: <u>https://www.epa.gov/sites/production/files/2017-10/documents/final\_2008\_o3\_naaqs\_transport\_memo\_10-27-17b.pdf</u>.
 <sup>7</sup> "Good Neighbor" Modeling for the 2008 8-Hour Ozone State Implementation Plans, Final Modeling Report",

<sup>&</sup>lt;sup>7</sup> ""Good Neighbor" Modeling for the 2008 8-Hour Ozone State Implementation Plans, Final Modeling Report", prepared by Alpine Geophysics, December 2017

http://midwestozonegroup.com/files/Ozone Modeling Results Supporting GN SIP Obligations Final Dec 2017 .pdf

				DVf (2023)	DVf (2023)
Monitor	State	County	<b>DVb</b> (2011)	Ave	Max
360010012	New York	Albany	68.0	55.4	57.0
360050133	New York	Bronx	74.0	68.0	69.9
360150003	New York	Chemung	66.5	54.9	55.3
360270007	New York	Dutchess	72.0	58.6	60.2
360530006	New York	Madison	67.0	55.0	55.0
360610135	New York	New York	73.3	65.3	67.8
360671015	New York	Onondaga	69.3	57.8	60.1
360715001	New York	Orange	67.0	55.3	56.9
360750003	New York	Oswego	68.0	55.7	57.3
360790005	New York	Putnam	70.0	58.4	59.2
360810124	New York	Queens	78.0	70.1	71.9
360850067	New York	Richmond	81.3	71.9	73.4
360870005	New York	Rockland	75.0	62.0	62.8
361030002	New York	Suffolk	83.3	72.5	74.0
361030004	New York	Suffolk	78.0	66.3	68.0
361030009	New York	Suffolk	78.7	68.5	69.7
361111005	New York	Ulster	69.0	57.4	57.4
361192004	New York	Westchester	75.3	68.1	68.8

The data taken from the EPA 12km grid modeling are displayed in the following table:

It is thus apparent that current emission control programs are more than adequate to satisfy Good Neighbor obligations of states such as New York even without consideration of a more refined grid modeling platform.

### 4. State-of-the-art modeling by the Midwest Ozone Group shows that all of New York's monitors will attain the 2015 ozone NAAQS.

To address its own concerns about whether modeling with a 12 km grid is sufficiently refined to address the land/water interface issues, MOG undertook to run EPA's model at a finer 4km grid.

As is shown in the following chart, when EPA's air quality modeling platform is run with a 4 km grid (rather than a 12 km grid) predicted ozone concentration at all monitors in New York are in attainment with respect to both the 2008 ozone NAAQS as well as the more stringent 2015 ozone NAAQS.

			12km N	Iodeling	4km M	odeling
Monitor	NY County	DVb (2011)	DVf (2023) Ave	DVf (2023) Max	DVf (2023) Ave	DVf (2023) Max
360010012	· ·	68.0	55.4	57.0	56.5	58.2
360050133		74.0	68.0	69.9	64.7	66.4
360150003	Chemung	66.5	54.9	55.3	55.1	55.5
360270007	Dutchess	72.0	58.6	60.2	56.8	58.4
360530006	Madison	67.0	55.0	55.0	54.8	54.8
360610135	New York	73.3	65.3	67.8	61.5	63.7
360671015	Onondaga	69.3	57.8	60.1	57.6	59.8
360715001	Orange	67.0	55.3	56.9	54.9	57.0
360750003	Oswego	68.0	55.7	57.3	55.9	57.5
360790005	Putnam	70.0	58.4	59.2	56.7	57.5
360810124	Queens	78.0	70.1	71.9	68.0	69.8
360850067	Richmond	81.3	71.9	73.4	69.6	71.0
360870005	Rockland	75.0	62.0	62.8	61.1	63.1
361030002	Suffolk	83.3	72.5	74.0	70.7	72.1
361030004	Suffolk	78.0	66.3	68.0	64.5	66.2
361030009	Suffolk	78.7	68.5	69.7	66.8	67.9
361111005	Ulster	69.0	57.4	57.4	55.4	55.4
361192004	Westchester	75.3	68.1	68.8	64.4	64.9

Modeling of this type using a finer grid is specifically recommended under existing EPA guidance which states:

The use of grid resolution finer than 12 km would generally be more appropriate for areas with a combination of complex meteorology, strong gradients in emissions sources, and/or <u>land-water interfaces</u> in or near the nonattainment area(s).<sup>9</sup> Emphasis added.

Accordingly, when state of the art modeling is used to assess air quality in New York at the appropriate attainment date, all receptors – without exception- are in attainment with the 2015 ozone NAAQS compelling the denial of the New York petition.

<sup>&</sup>lt;sup>8</sup><u>http://www3.epa.gov/scram001/guidance/guide/Draft\_O3-PM-RH\_Modeling\_Guidance-2014.pdf</u>

# 5. The CSAPR Update Rule and the 2008 and 2015 "Good Neighbor" plans resolve (both legally and technically) the issues that have been raised by the New York petition.

While the petition acknowledges (p.6 of 17) the near-term deadlines for action by EPA on the Good Neighbor plans of the targeted states related to the 2008 ozone NAAQS, the petition fails to address the fact that action on these plans addresses exactly the same provision of the Clean Air Act as does their petition (CAA 110(a)(2)(D)(i) and would effectively satisfy their petition as it relates to the 2008 ozone NAAQS. This close relationship was addressed by EPA in its proposed denial of the Connecticut 126 petition involving the Brunner Island Plant when EPA stated<sup>10</sup>:

Put another way, requiring additional reductions would result in eliminating emissions that do not contribute significantly to nonattainment or interfere with maintenance of the NAAQS, an action beyond the scope of the prohibition in CAA section 110(a)(2)(D)(i)(1) and therefore beyond the scope of EPA's authority to make the requested finding under CAA section 126(b). See EPA v. EME Homer City Generation, L.P., 134 S. Ct. 1584, 1604 n.18, 1608-09 (2014) (holding the EPA may not require sources in upwind states to reduce emissions by more than necessary to eliminate significant contribution to nonattainment or interference with maintenance of the NAAQS in downwind states under the good neighbor provision).

The petition also fails to acknowledge the October 1, 2018 deadline that is applicable to all target states for the submittal of Good Neighbor plans related to the 2015 ozone NAAQS. These Good Neighbor plans would also address CAA 110(a)(2)(D)(i) and effectively eliminates any need for the relief requested in the petition.

In addition to the 2008 and 2015 ozone NAAQS Good Neighbor State Implementation Plans (SIPs), EPA's CSAPR Update Rule was also adopted to implement and satisfy CAA Section 110(a)(2)(D)(i) obligations. The combination of these actions has already has or ultimately will resolve the responsibility of the states and sources named in the New York petition (filed pursuant to CAA Section 126) because both sections of the CAA call for the application of the same legal standard.

CAA §126(b) provides -

Any state or political subdivision may petition the Administrator for a finding that any major source or group of stationary sources emit or would emit any air pollutant in violation of the prohibition of section  $110(a)(2)(D)(ii) \dots$ <sup>11</sup>

CAA §110(a)(2)(D)(i) provides -

<sup>&</sup>lt;sup>9</sup>83 Fed. Reg. 7712 (February 22, 2018).

 $<sup>^{10}</sup>$  Appalachian Power Co. v. EPA, 249 F.3d 1032 (D.C. Cir.) held this to be a scrivener's error and that the reference here was intended to be to section 110(a)(2)(D)(i) rather than to section 110(a)(2)(D)(ii) as written.

Each plan shall ... contain adequate provisions ... prohibiting ... any source ... from emitting any air pollutant in amounts which will ... contribute significantly to non-attainment in, or interfere with maintenance by, any other state

Thus, resolution of the question of interstate transport under CAA 110(a)(2)(D)(i) effectively and legally resolves any issues that might be the bases for a petition filed under CAA 126(b).

# 6. The petition's request to have emission control limits set on a daily basis is a consideration that EPA previously addressed and rejected and daily limits should also be rejected here.

One of the requests advanced in the New York petition (see page 17 of 17.) is to have emission limits imposed on a daily – rather than ozone season - basis. Such a proposal has previously been considered and rejected by EPA in connection with the CSAPR Update Rule. MOG urges that it also be rejected here.

During proceeding on the CSAPR Update rulemaking, EPA carefully considered requests from Northeast states urging that the CSAPR budget be applied on a short term basis. EPA made the final decision to establish a program for the regulation of  $NO_X$  emissions from EGUs on an ozone season average basis rather than on any shorter time frame.<sup>12</sup>

# 7. The New York monitors that are currently measuring the highest ozone concentrations are already nearly attaining the 2008 ozone NAAQS without consideration of any other mitigating factors.

While the petition mentions three monitors in the state with 2017 design values in excess of the 2008 ozone NAAQS level of 75 ppb, the design values for each of those monitors is only 76 ppb – 1 ppb above the 2008 ozone NAAQS. Elsewhere in these comments, MOG will note several factors which when taken into account are likely to reduce these concentrations significantly. However, even without the consideration of those factors, it is critical that the petition fails altogether to take this 1 ppb increment into account in offering its proposed remedy. Failure to do so is a failure to avoid over-control that would result from the imposition of emission reductions on upwind states and sources that are more than necessary to bring downwind state monitors into attainment. The following are the preliminary 2017 design values for those three monitors that exceed the 2008 (75 ppb) ozone NAAQS:

<sup>&</sup>lt;sup>11</sup> 81 Fed Reg. 74523, October 26, 2016.

		Prelim 2017 DV
360850067	Susan Wagner HS	76
361030002	Babylon	76
361030004	Riverhead	76

Failure to address whether the proposed remedy results in over-control is a failure that requires denial of any Section 126 petition. Upwind states are not required to achieve a higher level of control than that which is necessary to achieve attainment in a downwind area.

### 8. Consideration of Exceptional Events that occurred in 2016 would bring all New York monitors into attainment with the 2008 Ozone NAAQS.

The Clean Air Act and EPA recognize that Exceptional Events can result in higher design values for many monitors in both the upwind and downwind states. If Exceptional Events are not accounted for, use of the resulting higher design values will not only result in inaccurate nonattainment designations, but also in ultimately higher future year predictions of ozone concentrations and the inaccurate representation that additional control measures are necessary.

The importance of the need to exclude data influenced by Exceptional Events is recognized by Congress in the provisions of Clean Air Act §319(b)(3)(B) which provides as follows:

Regulations promulgated under this section shall, at a minimum, provide that

(i) the occurrence of an exceptional event must be demonstrated by reliable, accurate data that is promptly produced and provided by Federal, State, or local government agencies;

(ii) a clear causal relationship must exist between the measured exceedances of a national ambient air quality standard and the exceptional event to demonstrate that the exceptional event caused a specific air pollution concentration at a particular air quality monitoring location;

*(iii) there is a public process for determining whether an event is exceptional; and* 

(iv) there are criteria and procedures for the Governor of a State to petition the Administrator to exclude air quality monitoring data that is directly due to exceptional events from use in determinations by the Administrator with respect to exceedances or violations of the national ambient air quality standards.

EPA's regulations on Exceptional Events appear at 40 CFR 50.14 (81 Fed. Reg. 68216, October 3, 2016) and provide the framework for addressing Exceptional Events. The regulations include requirements related to demonstrating (a) that a clear, causal relationship exists between the event and monitored exceedance(s) (b) the event was of human origin and not likely to recur or was natural in origins and (c) the occurrence was not reasonably controllable or preventable.

In addition, EPA has also offered guidance related to Exceptional Events<sup>13</sup> that, among other things, requires that demonstrations include:

- A narrative conceptual model that describes the event(s) causing the exceedance or violation and a discussion of how emissions from the event(s) led to the exceedance or violation at the affected monitor(s);
- A demonstration that the event affected air quality in such a way that there exists a clear causal relationship between the specific event and the monitored exceedance or violation;
- Analyses comparing the claimed event-influenced concentration(s) to concentrations at the same monitoring site at other times. The Administrator shall not require a State to prove a specific percentile point in the distribution of data;
- A demonstration that the event was both not reasonably controllable and not reasonably preventable;
- A demonstration that the event was caused by human activity that is unlikely to recur at a particular location or was a natural event; and
- Documentation that the submitting air agency followed the public comment process.

A number of states have already made requests to have the air masses caused by the Canadian wildfires that occurred in 2016 be declared Exception Events – thus allowing monitored data influenced by those events to be excluded from the calculation of the design value for the affected monitor. Among the states submitting these requests are several of New York's neighboring states including:

**Connecticut** - The Connecticut demonstration related to the May 2016 event was submitted on May 23, 2017.<sup>14</sup> In addition to showing that Canadian wildfire caused the event, the demonstration noted that ". . . the exceedances of May 25-26th cannot be attributed to EGUs operating on high electric demand days as is more typically the case later in the ozone season." EPA concurred in that demonstration on July 31, 2017.

**New Jersey -** The New Jersey demonstration related to the May 2016 was submitted on May 31, 2017.<sup>15</sup> In addition to showing that Canadian wildfire caused the event in New Jersey, the demonstration also noted that the event had had a similar impact on many other states including Wisconsin, Michigan, Illinois, Indiana, Ohio, Pennsylvania and New York. EPA concurred in that demonstration on October 24, 2017.

<sup>&</sup>lt;sup>12</sup> Guidance on the Preparation of Exceptional Events Demonstrations for Wildfire Events that May Influence Ozone Concentrations, Final, EPA, September 2016: <u>https://www.epa.gov/sites/production/files/2016-09/documents/exceptional events guidance 9-16-16 final.pdf</u>

<sup>&</sup>lt;sup>13</sup> https://www.epa.gov/air-quality-analysis/exceptional-events-documents-ozone-connecticut

<sup>&</sup>lt;sup>14</sup> https://www.epa.gov/air-quality-analysis/exceptional-events-documents-ozone-new-jersey

**Massachusetts** - The Massachusetts demonstration related to the May 2016 event was submitted on May 25, 2017.<sup>16</sup> EPA concurred in that demonstration on September 19, 2017.

**Maryland** – While the Maryland demonstration dated May 26, 2017, nominally addresses July 2016 event, the demonstration report itself includes data which assesses how the design values for Maryland's monitors are affected by both the May and July 2016 events.<sup>17</sup> MOG is not aware that EPA has yet addressed the merit of the Maryland demonstration.

**Pennsylvania** – Pennsylvania has also made a demonstration related to the May 2016 event dated November 2017.<sup>18</sup> We are not aware that EPA has yet addressed the merit of the Pennsylvania demonstration.

MOG has analyzed the 2016 design values of all of the monitors in New York to determine the impact on design values after data collected during these 2016 Exceptional Events are excluded.

To illustrate the process used to assess these monitors, MOG offers the following graphics related to the Suffolk (361030002) and Richmond (360850067) monitors in New York. In the case of each monitor MOG has graphically identified the 10 highest ozone concentrations that occurred in 2016 and have highlighted in red those readings that occurred on dates related to the May 2016 and July 2016 Canadian wildfire events. These graphics demonstrate the significance of the exclusion of those data points affected by the two Exceptional Events identified.

<sup>&</sup>lt;sup>15</sup> https://www.epa.gov/air-quality-analysis/exceptional-events-documents-ozone-massachusetts

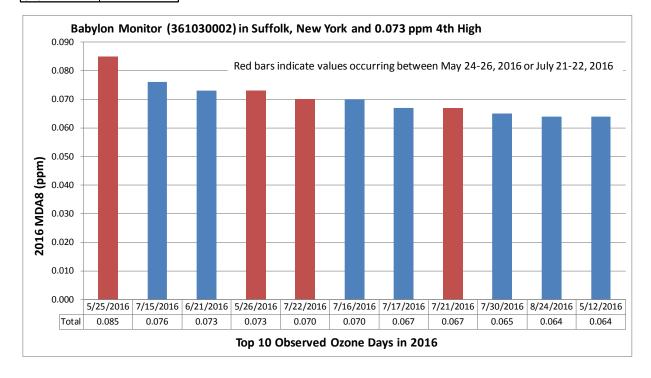
<sup>&</sup>lt;sup>16</sup><u>http://www.mde.state.md.us/programs/Air/AirQualityMonitoring/Documents/MDE\_JUL\_21\_22\_2016\_EE\_demo.p\_df</u>
<sup>17</sup><u>http://www.elibrary.dep.state.pa.us/dsweb/Get/Document-117484/Ozone%20EE%20Analysis%20May%2024-26-</u>

<sup>&</sup>lt;sup>17</sup> http://www.elibrary.dep.state.pa.us/dsweb/Get/Document-117484/Ozone%20EE%20Analysis%20May%2024-26-2017.pdf<sup>-</sup>

AQS_SITE_ID		361030002	<b>.T</b> .
Row Labels	ιT	Sum of Daily	MDA8
5/25/2016			0.085
7/15/2016			0.076
6/21/2016			0.073
5/26/2016			0.073
7/22/2016			0.070
7/16/2016			0.070
7/17/2016			0.067
7/21/2016			0.067
7/30/2016			0.065
8/24/2016			0.064
5/12/2016			0.064

Suffolk,	New York

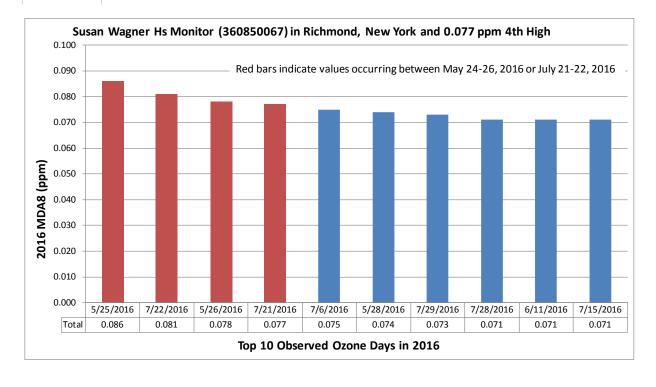
	Ozone
Value	MDA8 (ppb)
2016 4th (fire)	73
2016 4th (no fire)	67
2014-16 DV (fire)	72
2014-16 DV (no fire)	70



AQS_SITE_ID	360850067
Row Labels	Sum of Daily MDA8
5/25/2016	0.086
7/22/2016	0.081
5/26/2016	0.078
7/21/2016	0.077
7/6/2016	0.075
5/28/2016	0.074
7/29/2016	0.073
7/28/2016	0.071
6/11/2016	0.071
7/15/2016	0.071

Richmond, New York
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	Ozone
Value	MDA8 (ppb)
2016 4th (fire)	77
2016 4th (no fire)	71
2014-16 DV (fire)	76
2014-16 DV (no fire)	74



While Connecticut, Massachusetts, New Jersey, Pennsylvania, Maryland and several other states have requested consideration of Exceptional Events for 2016 Canadian wildfire event, New York has made no such request. However, as can be seen in the following data, had the May and July events been excluded, the design values for 25 of New York's monitors (highlighted in green) would be significantly lower<sup>19</sup>. In the case of each monitor, the measurements collected during on the days in May and July 2016 impacted by the Canadian wildfire for which Exceptional Events analysis should have been filed, resulted in new 4<sup>th</sup> high values and new 3 year design values for each monitor for comparison to the 2008 and 2015 ozone NAAQS.

<sup>&</sup>lt;sup>18</sup> https://www.epa.gov/sites/production/files/2017-12/documents/ny\_nj\_ct\_new\_york-northern\_new\_jerseylong\_island\_120d\_tsd\_final.pdf

			Fire Exclusion	
			2014-2016 Design Value	2014-2016 Design Value
AQS Site ID	State Name	County Name	(ppm)	(ppm)
360010012	New York	Albany	0.064	0.063
360050110	New York	Bronx	0.067	0.066
360050133	New York	Bronx	0.070	0.070
360130006	New York	Chautauqua	0.068	0.067
360270007	New York	Dutchess	0.068	0.067
360290002	New York	Erie	0.069	0.068
360310002	New York	Essex	0.062	0.061
360310003	New York	Essex	0.065	0.063
360319991	New York	Essex	0.058	0.058
360337003	New York	Franklin	0.058	0.057
360410005	New York	Hamilton	0.060	0.059
360430005	New York	Herkimer	0.063	0.058
360450002	New York	Jefferson	0.063	0.062
360551007	New York	Monroe	0.063	0.063
360610135	New York	New York	0.069	0.068
360631006	New York	Niagara	0.066	0.065
360671015	New York	Onondaga	0.064	0.062
360715001	New York	Orange	0.066	0.065
360750003	New York	Oswego	0.060	0.060
360790005	New York	Putnam	0.068	0.068
360810124	New York	Queens	0.069	0.067
360850067	New York	Richmond	0.076	0.074
360870005	New York	Rockland	0.072	0.071
360910004	New York	Saratoga	0.063	0.062
361010003	New York	Steuben	0.059	0.059
361030002	New York	Suffolk	0.072	0.070
361030004	New York	Suffolk	0.072	0.070
361030009	New York	Suffolk	0.066	0.065
361099991	New York	Tompkins	0.063	0.061
361173001	New York	Wayne	0.064	0.063
361192004	New York	Westchester	0.074	0.072

With respect to the three monitors highlighted in the New York petition, MOG has also recalculated what the preliminary 2017 design value for each monitor would be if the Exceptional Events are considered. Significantly, all three of the New York monitors with preliminary design values above the 2008 ozone NAAQS, would be below the 2008 standard if only the 2016 Canadian wildfire related exceptional events were addressed.

AQS Site ID	Local Site Name	2017 DV With wildfire	2017 DV Without wildfire
360850067	Susan Wagner HS	76	74
361030002	Babylon	76	74
361030004	Riverhead	76	74

In the absence of a request by New York to exclude data related to these wildfire affected time periods, MOG requests that EPA do so as it evaluates the merit of this petition. Because consideration of only the 2016 Canadian Exceptional Events is adequate to bring he design values of all New York into attainment with the 2008 ozone NAAQS, the relief requested by New York would necessarily result in prohibited over-control.

In the alternative, we note that EPA's March 27, 2018, Good Neighbor SIP guidance memorandum specifically calls into question whether "downwind areas have considered and/or used available mechanisms for regulatory relief." <sup>20</sup> The fact that New York has not requested relief from the impact of these exceptional events does indeed become an independent basis for the denial of its petition.

# 9. New York's basis for ignoring the EPA's Good Neighbor SIP modeling data has no merit.

The New York petition complains that EPA's CSAPR Update Rule was designed by EPA to be a "partial remedy" to address interstate transport in 2017 (p. 6 of 17). The petition, however, dismisses EPA's Good Neighbor SIP data<sup>21</sup> discussed above that clearly demonstrates that the CSAPR Update becomes a full remedy when it is extended to applicable compliance date determined by EPA to be appropriate for the 2008 ozone NAAQS.

A review of the three reasons offered by New York for dismissing the EPA Good Neighbor SIP data illustrates that New York's rejection of the EPA data has no merit.

 <sup>&</sup>lt;sup>19</sup> EPA Peter Tsirigotis memorandum of March 27, 2018 (<u>https://www.epa.gov/airmarkets/march-2018-memo-and-supplemental-information-regarding-interstate-transport-sips-2015</u> at p. A-2.
 <sup>20</sup> Stephen Page memorandum, October 27, 2017: <u>https://www.epa.gov/sites/production/files/2017-</u>

<sup>&</sup>lt;sup>20</sup> Stephen Page memorandum, October 27, 2017: <u>https://www.epa.gov/sites/production/files/2017-10/documents/final\_2008\_o3\_naaqs\_transport\_memo\_10-27-17b.pdf</u>

- a. The initial reason stated by New York for ignoring EPA's most recent Good Neighbor modeling data is New York's belief that enforceable limits are needed before the modeling could be considered. This concern ignores that EPA's projection of emissions in 2023 is based upon "on-the-book" regulations and control requirements that are self-implementing and do not require any further regulatory actions. EPA's modeling relied only upon control programs currently in place and in effect. As such, nothing more is needed to evaluate these control programs in 2023.
- b. New York also offers a concern about the ability of EPA's modeling to address monitors located at a land/water interface.<sup>22</sup> EPA's Good Neighbor modeling was, of course, conducted using a 12 km modeling grid. EPA's March 27, 2018 Good Neighbor SIP guidance memorandum addressed this very issue by selecting from its 12km modeling data only those values that were modeled over land. This approach showed that all receptors in New York did indeed attain the 2015 ozone NAAQS with the exception of the Suffolk (361030002) monitor which has a 3 year "No Water" 2023en design value of 74.0 ppb. As will be discussed in the next section of these comments, moving to 4 km modeling in accordance with EPA modeling guidance demonstrates that even the Suffolk monitor is in attainment.
- c. New York also declined to consider the EPA Good Neighbor modeling because it was based on 2023 whereas New York asserts that relief under a 126 petition must be implemented in no more than 3 years. Given that 2023 is the likely attainment year for the 2015 ozone NAAQS and given the time that would be needed for EPA to approve the New York petition and to apply a three year compliance schedule to any such determination, EPA's selection of 2023 for its modeling is very reasonable.

# 10. The exclusion of New Jersey from list of states targeted by the petition ignores the impact of New Jersey and its mobile source emissions on New York's monitors.

Even though New Jersey was identified by New York as a "significantly contributing" state based on EPA's 2016 CSAPR Update Rule modeling, the petition excludes New Jersey from the states targeted by New York's request for new controls. (See March 12, 2018 cover letter) This exclusion is remarkable because New Jersey's contribution to New York's air quality is greater than that of any other of the 10 "significantly contributing" states

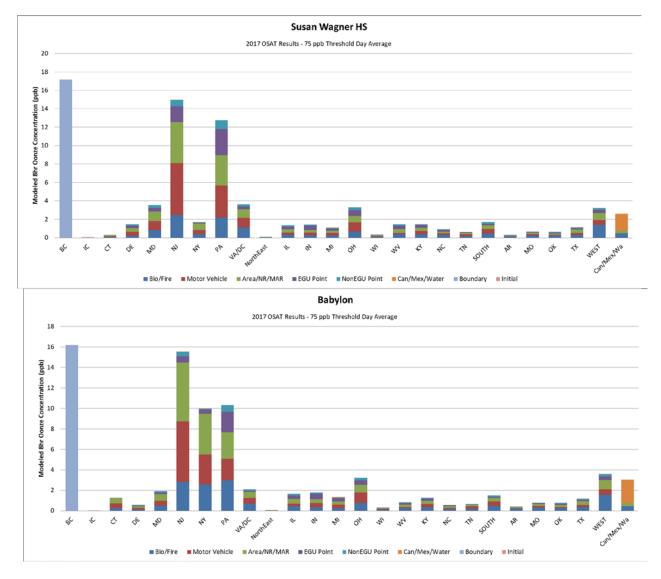
In excluding New Jersey, the New York petition states (page 14 of 17):

<sup>&</sup>lt;sup>21</sup> As pointed out in EPA's Stephen Page memorandum, October 27, 2017

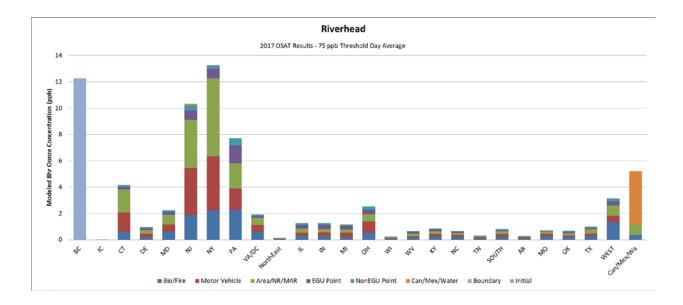
<sup>(</sup>https://www.epa.gov/sites/production/files/2017-10/documents/final\_2008\_o3\_naaqs\_transport\_memo\_10-27-17b.pdf) and again in the Peter Tsirigotis memorandum of March 27, 2018 (https://www.epa.gov/airmarkets/march-2018-memo-and-supplemental-information-regarding-interstate-transport-sips-2015\_at p. B-3), when EPA's methodology to account for the land/water interface was applied to the New York monitors, all of the New York monitors were modeled to be attainment with the 2015 ozone NAAQS except for the Suffolk monitor (361030002) which had a "no water' design value of 74.0 ppb.

### *New Jersey is excluded from this appendix since it did not contribute to any non-attainment or maintenance monitors.*

However, as can be seen in the following graphics based on an ozone source apportionment data associated with CSAPR Update modeling relied upon by New York<sup>23</sup>, New Jersey contributes more to the ozone concentrations in New York than any of the states targeted by the petition. Equally significant is that New Jersey's impacts are overwhelmingly from motor vehicles and area and non-road sources. The EGU contributions shown in the following graphics are based upon the grossly overstated emissions from that source category in the 10 states that New York identified in the petition.



<sup>&</sup>lt;sup>22</sup> http://www.midwestozonegroup.com/files/Relative Contribution of Upwind Sources on Key Monitors.pdf



### **11.** The New York petition cannot be sustained based only on the possibility of two maintenance monitors.

As MOG data has demonstrated, even without addressing Exceptional Events, international emissions or additional local controls, New York will not have any nonattainment monitors in 2023 with respect to either the 2008 or 2015 ozone NAAQS. In 2023, only the Suffolk monitor (361030002) and the Richmond monitor (360850067) are predicted to have a maximum single year design value above the 2015 ozone NAAQS which under EPA's CSAPR Update definition would be enough to make them maintenance monitors and be given the same amount of weight as nonattainment monitors in developing Good Neighbor requirements. However, as EPA has recently explained, it is not necessary to address maintenance as it was addressed in the CSAPR Update.

EPA's January 17, 2018, brief in the CSAPR Update litigation (Wisconsin et al. v EPA, Case No. 16-1406) offers the following statement on pages 77 and 78 which recognizes that alternatives measures for addressing maintenance receptors are appropriate in circumstances not constrained by the time limits imposed on the CSAPR Update Rule:

Ultimately, Petitioners' complaint that maintenance-linked states are unreasonably subject to the "same degree of emission reductions" as nonattainment linked states must fail. Indus. Br. 25. There is no legal or practical prohibition on the Rule's use of a single level of control stringency for both kinds of receptors, provided that the level of control is demonstrated to result in meaningful air quality improvements without triggering either facet of the Supreme Court's test for over-control. So while concerns at maintenance receptors can potentially be eliminated at a lesser level of control in some cases given the smaller problem being addressed, this is a practical possibility, not a legal requirement. See 81 Fed. Reg. at 74,520. <u>Here, EPA's use of</u>

the same level of control for both maintenance-linked states and nonattainmentlinked states is attributable to the fact that the Rule considered only emission reduction measures available in time for the 2017 ozone season. Id. at 74,520. Under this constraint, both sets of states reduced significant emissions, without overcontrol, at the same level of control. Id. at 74,551-52. Accordingly, EPA's selection of a uniform level of control for both types of receptors was reasonable. (Emphasis added.)

It is clear therefore, that in other circumstances where the remedy is not constrained by the same time limitations as were imposed on the CSAPR Update, an alternative mechanism should be developed to recognize the smaller nature of the problem being addressed.<sup>24</sup>

Section 175A of the Clean Air Act addresses the circumstance in which a state requests redesignation from nonattainment to attainment in which case maintenance is addressed by requiring a demonstration that attainment will be maintained for at least 10 years. CAA Section 175A(a) states as follows:

Each State which submits a request under section 7407 (d) of this title for redesignation of a nonattainment area for any air pollutant as an area which has attained the national primary ambient air quality standard for that air pollutant shall also submit a revision of the applicable State implementation plan to provide for the maintenance of the national primary ambient air quality standard for such air pollutant in the area concerned for at least 10 years after the redesignation. The plan shall contain such additional measures, if any, as may be necessary to ensure such maintenance.

In addition, EPA long-time policy for addressing maintenance is set forth in the Calcagni memorandum<sup>25</sup> which contains the following statement on page <sup>9</sup>:

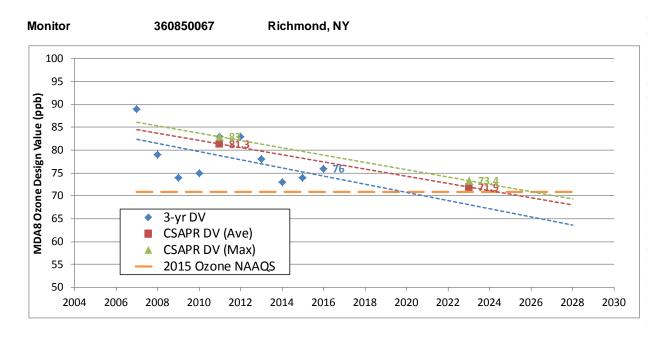
A State may generally demonstrate maintenance of the NAAQS by either showing that future emissions of a pollutant or its precursors will not exceed the level of the attainment inventory, or by modeling to show that the future mix of source and emission rates will not cause a violation of the NAAQS. Under the Clean Air Act, many areas are required to submit modeled attainment demonstrations to show that proposed reductions in emissions will be sufficient to attain the applicable NAAQS. For these areas, the maintenance demonstration should be based upon the same level

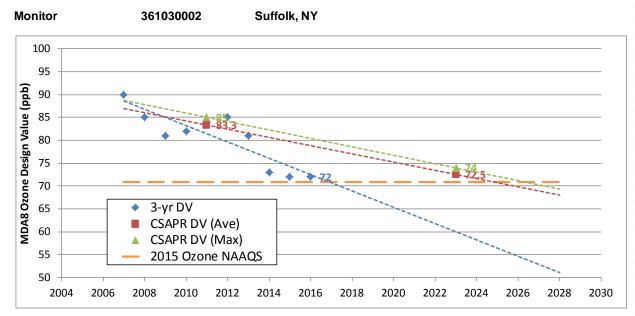
<sup>&</sup>lt;sup>23</sup> Consideration of alternative approaches to address maintenance areas is central theme of EPA's Peter Tsirigotis memorandum dated March 27, 2018 (<u>https://www.epa.gov/airmarkets/march-2018-memo-and-supplemental-information-regarding-interstate-transport-sips-2015</u>), where on pages A-2 and A-3, EPA sets forth a series of options that are being considered for allowing greater flexibility in addressing the question of whether an upwind state is interfering with a downwind maintenance area.

<sup>&</sup>lt;sup>24</sup> Procedures for Processing Requests to Redesignate Areas to Attainment, John Calcagni memorandum, 4 September 1992.

of modeling. In areas where no such modeling was required, the State should be able to rely on the attainment inventory approach. In both instances, the demonstration should be for a period of 10 years following the redesignation.

As demonstrated below, it is clear that the only two possible maintenance monitors in New York remain in attainment for 10 years and thus CAA requirements to address maintenance are satisfied.





It is clear therefore that The New York petition cannot be sustained based only on the possibility of two maintenance monitors.

#### 12. International emissions must be addressed as an integral part of the consideration of this petition.

International emission must be considered as an integral part of any assessment of interstate transport such as New York would have EPA consider in acting on its petition.<sup>26</sup>

The CAA addresses international emissions directly in Section 179(B)(a) which states:

(a) Implementation plans and revisions

Notwithstanding any other provision of law, an implementation plan or plan revision required under this chapter shall be approved by the Administrator if— (1) such plan or revision meets all the requirements applicable to it under the chapter other than a requirement that such plan or revision demonstrate attainment and maintenance of the relevant national ambient air quality standards by the attainment date specified under the applicable provision of this chapter, or in a regulation promulgated under such provision, and

(2) the submitting State establishes to the satisfaction of the Administrator that the implementation plan of such State would be adequate to attain and maintain the relevant national ambient air quality standards by the attainment date specified under the applicable provision of this chapter, or in a regulation promulgated under such provision, but for emissions emanating from outside of the United States. (Emphasis added.)

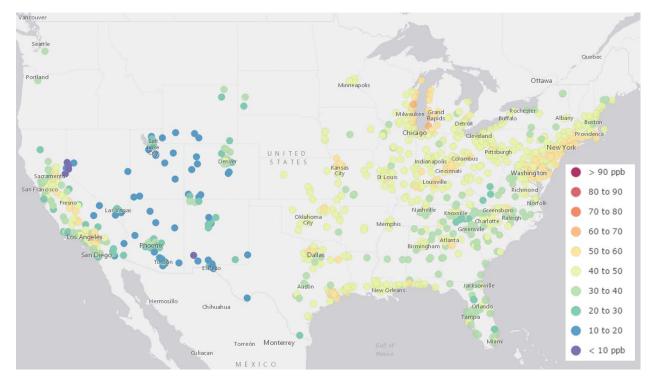
Addressing international emissions in the context of the New York petition is critically important because the petition seeks to implement the Good Neighbor provisions of CAA Section 110(a)(2)(D). In connection with such matters, the U.S. Supreme Court has ruled that it is essential that Good Neighbor states be required to eliminate only those amounts of pollutants that contribute to the nonattainment of NAAQS in downwind States. Specifically, the Supreme Court stated: "EPA cannot require a State to reduce its output of pollution by more than is necessary to achieve attainment in every downwind State. . . "<sup>27</sup> In addition, the D.C. Circuit has commented that ". . . the good neighbor provision requires upwind States to bear responsibility for their fair share of the mess in downwind States." Slip op at 11.

<sup>&</sup>lt;sup>25</sup> Consideration of alternative approaches to address international emissions is also a central theme of EPA's Peter Tsirigotis memorandum dated March 27, 2018 on page A-3 (https://www.epa.gov/airmarkets/march-2018-memoand-supplemental-information-regarding-interstate-transport-sips-2015). <sup>26</sup> EPA v. EME Homer City Generation, 134 S. Ct. 1584, 1608 (2014).

In addressing CAA Section 110(a)(2)(D)(i)(I) the DC Circuit has ruled that this section "gives EPA no authority to force an upwind state to share the burden of reducing other upwind states' emissions." *North Carolina v. EPA*, 531 F 2d at 921.

At the request of MOG, Alpine Geophysics employed EPA's modeling data for 2017 to prepare the following graphic which depicts the projected 2017 8-hour ozone Design Values across the US excluding boundary condition contributions and the international emissions sector. Note that this projection shows all monitors in the continental US with a design value equal to or less than 66 ppb when these categories are excluded.

#### Projected 2017 ozone design values (ppb) excluding the contribution from boundary condition, initial condition, Canadian and Mexican emission sources



Focusing only on the three worst monitors in New York and applying EPA modeling data for 2017 and 2013, the following chart shows that accounting for boundary conditions and Canada/Mexico emissions brings the worst of the New York monitors to a level of 52.55 ppb. If only the Canada/Mexico portion of international transport were considered, EPA's 2023 modeling shows that all of New York's monitors would attain both the 2008 and 2015 ozone NAAQS in 2023.

				2017 Average M	IDA8 Ozone I	Design Value (ppb)	)
Monitor ID	Local Site Name	2009-2013 Average Design Value	2017 Average Base Case	Canada & Mexico Contribution	2017 Base Case w/o Can/Mex	Initial & Boundary Condition Contribution	2017 Base Case w/o BC and Can/Mex
360850067	Susan Wagner HS	81.3	75.8	1.40	74.40	17.14	57.26
361030002	Babylon	83.3	76.8	1.25	75.55	15.67	59.88
361030004	Riverhead	78.0	70.6	0.99	69.61	12.69	56.92

				2023 Average M	IDA8 Ozone I	Design Value (ppb)	)
Monitor ID	Local Site Name	2009-2013 Average Design Value	2023 Average Base Case	Canada & Mexico Contribution	2023 Base Case w/o Can/Mex	Initial & Boundary Condition Contribution	2023 Base Case w/o BC and Can/Mex
360850067	Susan Wagner HS	81.3	71.2	1.82	69.38	16.83	52.55
361030002	Babylon	83.3	71.3	1.78	69.52	17.17	52.35
361030004	Riverhead	78.0	64.9	0.97	63.93	12.56	51.37

These data demonstrate that but for Canadian and Mexican international emissions, all of New York's monitors would be in attainment with the 2008 and 2015 ozone NAAQS. These facts are made all the more important because New York has made no attempt to avail itself of this available mechanism for regulatory relief – a clear factor to be considered in evaluating a request of this kind.<sup>28</sup> We also note that in its response to comments associated with its April 30, 2018 final rule establishing initial air quality designations for the 2015 ozone NAAQS, EPA offers the following comment on international transport:

> The EPA encourages affected air agencies to coordinate with their EPA Regional office to identify approaches to evaluate the potential impacts of international transport and to determine the most appropriate information and analytical methods for each area's unique situation. The EPA will also work with states that are developing attainment plans for which section 179B is relevant, and ensure the states have the benefit of the EPA's understanding of international transport of ozone and ozone precursors. To assist in this effort, EPA is currently developing or has developed the following implementation tools to stratospheric ozone intrusion exceptional events implementation guidance, and technical guidance on preparing approvable demonstrations under CAA section 179B.<sup>29</sup>

The failure of New York to pursue this available mechanism for relief provides an additional basis for the denial of its §126 petition.

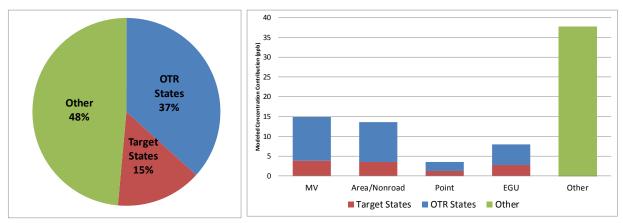
<sup>&</sup>lt;sup>27</sup> EPA Peter Tsirigotis memorandum of March 27, 2018 (<u>https://www.epa.gov/airmarkets/march-2018-memo-and-</u> supplemental-information-regarding-interstate-transport-sips-2015 at p. A-2. <sup>28</sup> https://www.epa.gov/sites/production/files/2018-04/documents/placeholder 2.pdf

#### 13. Mobile sources – not point sources - have the largest impact on New York monitors.

The petition erroneously concludes that major stationary sources in other states are causing their ozone air quality concerns. Specifically, the petition offers the following statement on page 5 of 17 of the petition:

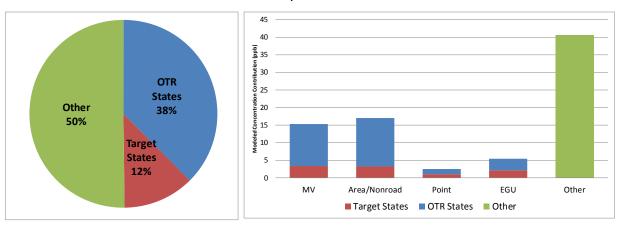
The high concentrations of ozone that are transported to New York State are largely the result of emission from major stationary sources of NOx located out-of-state.

Contrary to this statement and as demonstrated in the ozone source apportionment run of the 2017 EPA CSAPR platform<sup>30</sup>, it is clear that even with considerably overestimated emissions levels for EGUs, ozone impacts on New York's problem monitors are overwhelmingly from motor vehicles and area and non-road sources.



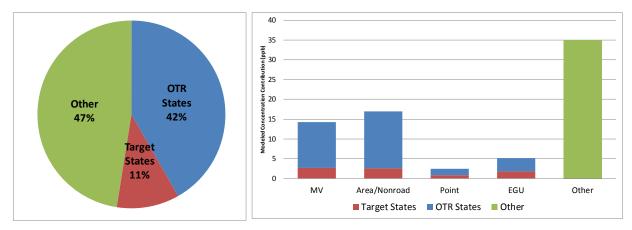
#### 360850067 - Susan Wagner HS - 2017 OSAT Results

<sup>&</sup>lt;sup>29</sup> http://www.midwestozonegroup.com/files/Relative Contribution of Upwind Sources on Key Monitors.pdf



361030002 - Babylon - 2017 OSAT Results





### 14. New York's reliance on the Dunkirk Monitor is inappropriate since that monitor attains both the 2008 and 2015 Ozone NAAQS.

The Dunkirk monitor (360130006) is cited in the petition (p. 12 of 17) as a monitor that has "the potential to exceed the NAAQS – particularly, the updated 2015 standards – due to transported ozone pollution." Putting aside the question of the origination of the ozone measured at that monitor, it is obvious that the petition is incorrect in this conclusion inasmuch as this monitor has consistently measured design values below the 2015 ozone NAAQS and would experience even lower levels if measurements related to the 2016 Canadian wildfire exceptional events are excluded – all as shown in the following table:

AQS Site ID	State	County	Local Site Name	
360130006	New York	Chautauqua	Dunkirk	
	4th High	Daily Max De	sign Value (ppb)	
2014	2015	2016	2016 (Excl Fire Dates)	2017*
66	71	69	66	66
3	-yr MDA8 De	esign Value (j	opb)	
	2014-2016		2015-2017	
	(Excl 2016		(Excl 2016	
2014-2016	Fire Dates)	2015-2017*	Fire Dates)*	
68	67	68	67	

15. New York has failed to provide any data addressing the cost effectiveness of the controls that it has proposed.

The New York petition fails to offer any assessment of the potential costs and air quality benefits of the control strategy that it is urging. Failure to do so, creates an additional fatal flaw in their petition. This very point was addressed directly by EPA in its denial of the Connecticut petition against Brunner Island. In its final determination, EPA offered the following comment:

As discussed in further detail in section III, the state's analysis of Brunner Island's impact on air quality in Connecticut provides insufficient information regarding the source's impact on Connecticut air quality on high ozone days and it does not reflect the facility's current operations. Moreover, the petition does not evaluate the potential costs and air quality benefits that would inform the EPA's evaluation of whether additional emission reductions are cost effective, consistent with the EPA's interpretation of the good neighbor provision.... Accordingly, the EPA denies Connecticut's CAA section 126(b) petition.<sup>31</sup>

Failure to provide these same data in the case of the New York petition requires EPA to deny it as well.

<sup>&</sup>lt;sup>30</sup> <u>https://www.gpo.gov/fdsys/pkg/FR-2018-04-13/pdf/2018-07752.pdf</u>

### 16. New York admits that some targeted sources are already achieving their requested control levels.

The petition concedes (p. 17 of 17) that some sources already achieve the emission rate it requests, a clear admission that these sources are not the cause of the problem being complained of by New York.

### **17.** The zero-out modeling performed by New York is not valid for source contribution calculations.

To assess the impact of the 400 ton sources, the petition states that New York "zeroed out" all such sources. Such an approach is considered inappropriate for this purpose as "zero out" modeling perturbs the emissions in the air quality model, highlighting the nonlinearity in the system and failing to account for the sum of contributions from every category in predicted ozone concentrations. Where zero out modeling is adequate for source sensitivity analyses, the petition does not seek to eliminate the 400 ton sources but rather to impasse an incremental level of control on them. Beyond the obvious overstatement of the emission change involved, the scenario modeled by New York is so radical as to alter the ability of the computer model to accurately predict ozone concentrations, let alone determine the relative contribution of the identified sources.

# 18. New York fails to offer any analysis of air quality or interstate transport for any time period after 2017 even though 2023 is the critical assessment date.

Although the attainment data for the 2015 ozone NAAQS is 2023 or later and although EPA has selected 2023 as the compliance date for Good Neighbor plans related to the 2008 ozone NAAQS, the New York petition offers no data or analyses after 2017. The petition therefore, fails to address the substantive technical issue involved and cannot be used to demonstrate the need for additional controls on sources in the target states.

#### 19. New York did not apply an EPA approved modeling technique to perform its analysis.

New York concedes (p.11 of 17) that it did not apply EPA approved modeling techniques to its analysis. Specifically, New York has identified two changes that it made in EPA's methodology.

Significantly one such change made by New York was to base its modeling on days where the model predicted concentrations as low as 60 ppb – far below even the 2015 (70 ppb) ozone NAAQS. By permitting a maximum impact value to be calculated on modeled low concentration days, New York has potentially overstated the impact of identified sources on days when

nonattainment or maintenance concentrations are observed. For example, on low concentration days (when the model demonstrates attainment), the transport patterns may come from the identified upwind states region. Comparatively, on high concentration days (when the model demonstrates nonattainment), the transport patterns may be stagnant or indicate flow from regions within the state or directionally different from low concentration days. Because the modeling data supporting the analysis is not readily available (see issue 14 above), thorough review of New York's method cannot be conducted. This "adjustment" inappropriately includes emission and meteorological conditions that are potentially unrelated to the issues to be addressed in a 126 petition.

New York also notes that one of the "adjustments" to EPA's approved modeling was to examine only a portion of the ozone season rather than the entire season (p. 11 of 17). This was done because of "resource constraints"; however, in performing its analysis on this limited basis, New York has failed to determine if other factors could be influencing its monitors during the remainder of the ozone season.

# 20. Controls on local sources must be addressed first by New York before EPA can approve emission reductions on sources in the target states.

When an area is measuring nonattainment of a NAAQS, the Clean Air Act (CAA) requires that the effects and benefits of local controls on all source sectors be considered first, prior to pursuing controls of sources in upwind states. CAA §107(a) states that "[e]ach State shall have the primary responsibility for assuring air quality within the entire geographic area comprising such State." In addition, CAA §110(a)(1) requires that a state SIP "provides for implementation, maintenance, and enforcement" of the NAAQS "in each air quality control region . . . within such State." Moreover, by operation of law, additional planning and control requirements are applicable to areas that are designated to be in nonattainment.

This issue is important not only to assessing the merit of the New York petition but also because upwind states must be confident this has occurred as they prepare to submit approvable Good Neighbor state implementation plans to address the 2008 and 2015 ozone NAAQS this year. EPA's current interstate transport modeling platforms fail to incorporate local emission reductions programs that are required to improve ambient ozone concentration in 2023. Only through a full assessment of these local emissions reductions can EPA determine whether there are any bases for the imposition of additional emissions controls in upwind states. This is because additional control requirements in upwind states can only be legally imposed if, after consideration of local controls, there is a continuing nonattainment issue in downwind areas.<sup>32</sup>

<sup>&</sup>lt;sup>31</sup> *EME Homer et.al.* v *EPA*, 134 S. Ct. at 1608.

The CAA addresses the affirmative obligations of the states to meet the deadlines for submittal and implementation of state implementation plans designed to specifically address their degree of nonattainment designation. Review of Section 172(c)(1) of the CAA provides that State Implementation Plans (SIPs) for nonattainment areas shall include "reasonably available control measures", including "reasonably available control technology" (RACT), for existing sources of emissions. Section 182(a)(2)(A) requires that for Marginal Ozone nonattainment areas, states shall revise their SIPs to include RACT. Section 182(b)(2)(A) of the CAA requires that for Moderate Ozone nonattainment areas, states must revise their SIPs to include RACT for each category of VOC sources covered by a CTG document issued between November 15, 1990, and the date of attainment. CAA section 182(c) through (e) applies this requirement to States with ozone nonattainment areas classified as Serious, Severe and Extreme.

The CAA also imposes the same requirement on States in ozone transport regions (OTR). Specifically, CAA Section 184(b) provides that a state in the Ozone Transport Region (OTR) must revise their SIPs to implement RACT with respect to all sources of VOCs in the state covered by a CTG issues before or after November 15, 1990. CAA Section 184(a) establishes a single OTR comprised of Connecticut, Delaware, Maine, Maryland, Massachusetts, New Hampshire, New Jersey, New York, Pennsylvania, Rhode Island, Vermont and the Consolidated Metropolitan Statistical Area (CMSA) that includes the District of Columbia.

Given the significance of the need for local controls to address concern about the NY-NJ-CT nonattainment area, MOG urges EPA to confirm that all appropriate local controls are adequately accounted for by New York as its addresses the merit of the New York petition.

#### Conclusion

The action requested by New York in its Section 126 petition is not justified on either legal or technical basis. Ozone precursor emissions have been and will continue to be reduced absent the New York petition due to the CSAPR Update Rule, PA RACT 2 and other on-the-books controls, including controls in New York. This year, upwind states will be submitting Good Neighbor SIP plans that are likely to demonstrate that the existing programs will be adequate to satisfy Good Neighbor SIP obligations. Additionally, appropriately accounting for Exceptional Events, international emissions and local controls also serve to demonstrate compliance with Clean Air Act requirements.

Accordingly, the Midwest Ozone Group urges that EPA deny the Clean Air Act Section 126 petition filed by New York on March 12, 2018.