

Cross-State Air Pollution Rule (CSAPR) Update Rule – Missouri’s Perspective

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Air Program Advisory Forum
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Overview

- What is CSAPR?
- What is the CSAPR Update Rule?
- CSAPR Update Rule – Missouri specifics
- Missouri original CSAPR state implementation plans (SIPs)
- Missouri SIP options – CSAPR Update Rule

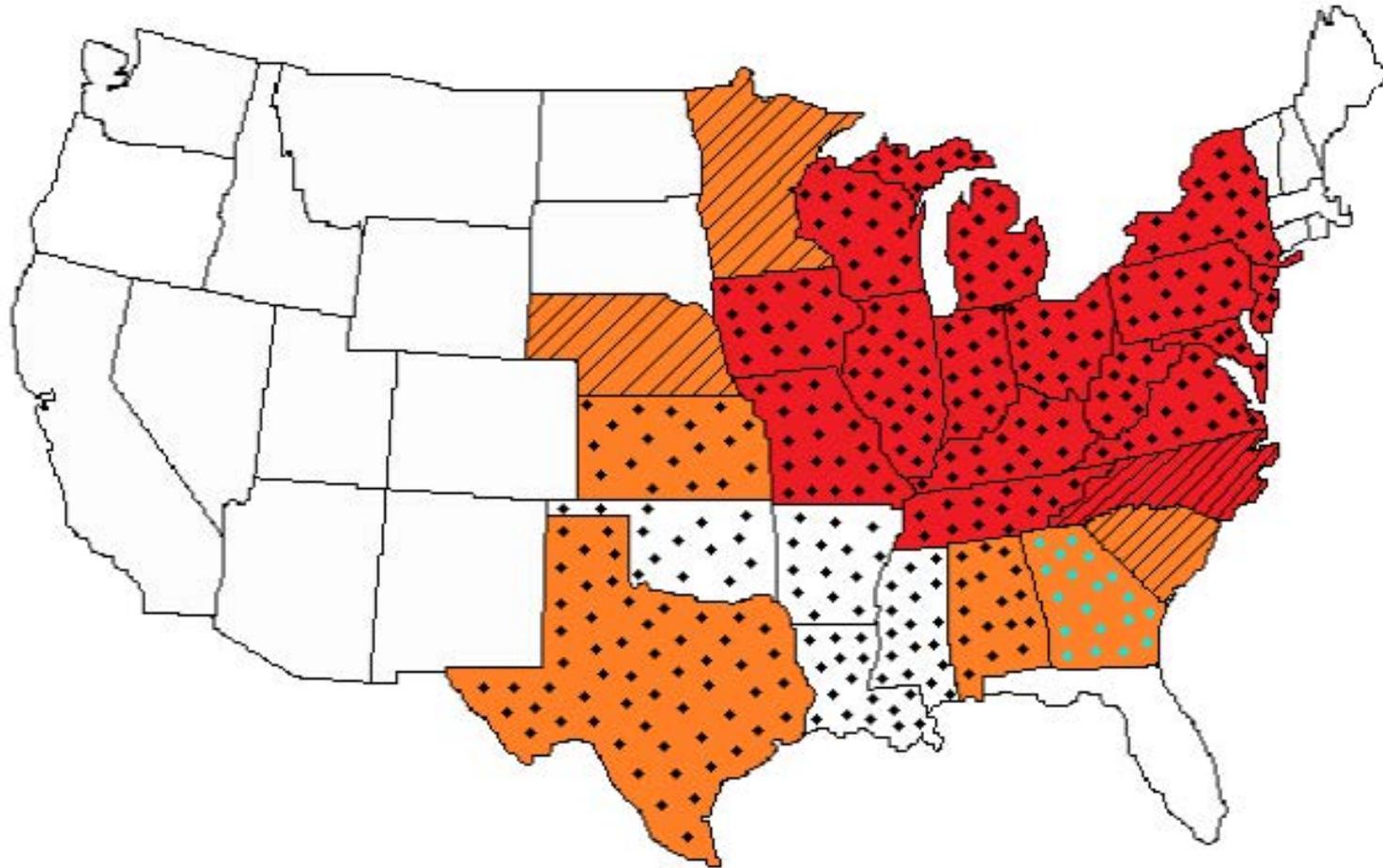
What is CSAPR?

- The Cross-State Air Pollution Rule (CSAPR) is a federal emissions cap and trade program that controls NO_x and SO_2 emissions from electric generating units in 27 states
- It addresses the Clean Air Act's "Good Neighbor Provision" for various $\text{PM}_{2.5}$ and ozone standards
- Original CSAPR had four trading programs –
Annual SO_2 Group 1, Annual SO_2 Group 2,
Annual NO_x , and Ozone Season NO_x

What is the CSAPR Update Rule?

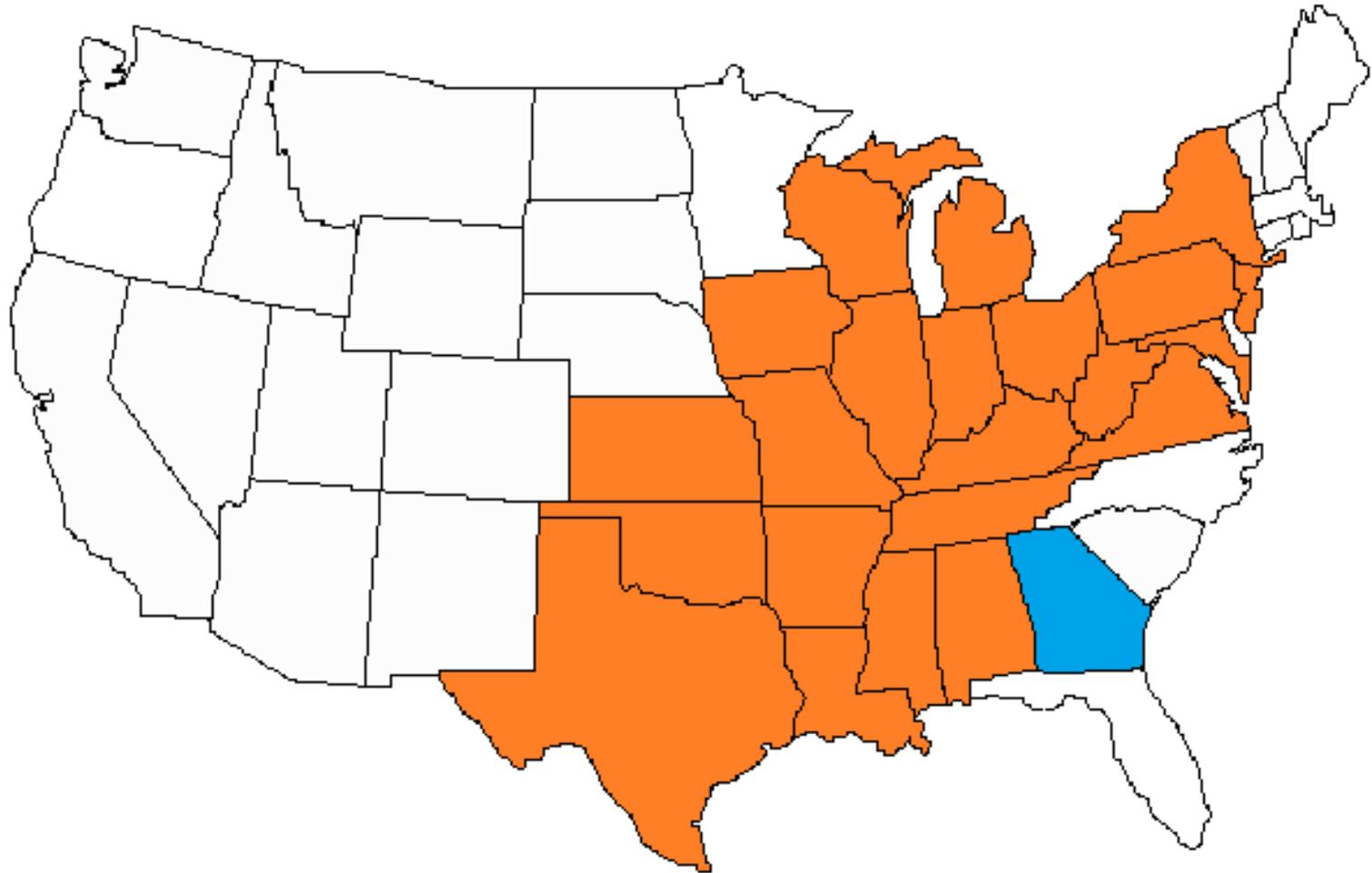
- CSAPR infrastructure remains largely the same (cap and trade, variability limits, and assurance provisions)
- No change to annual NO_x and annual SO₂ trading programs
- Revises federal NO_x ozone season trading program to address the 2008 ozone standard
 - Partially addresses 2008 ozone standard Good Neighbor Provision
- Starting in 2017 - Lowers NO_x ozone season emission budgets for 22 states
- Creates two NO_x ozone season trading programs
 - Group 1 (Georgia)
 - Group 2 (22 states including Missouri)
- Adds KS and removes FL, NC, and SC

States Covered Under CSAPR



- | | | | |
|--|---|--|---|
|  | SO ₂ Group 1, Ozone Season NO _x Group 2, and Annual NO _x (15 States) |  | SO ₂ Group 2, Ozone Season NO _x Group 1, and Annual NO _x (1 State) |
|  | SO ₂ Group 1 and Annual NO _x (1 State) |  | Ozone Season NO _x Group 2 only (4 States) |
|  | SO ₂ Group 2, Ozone Season NO _x Group 2, and Annual NO _x (3 States) |  | Not covered by CSAPR |
|  | SO ₂ Group 2 and Annual NO _x (3 States) | | |

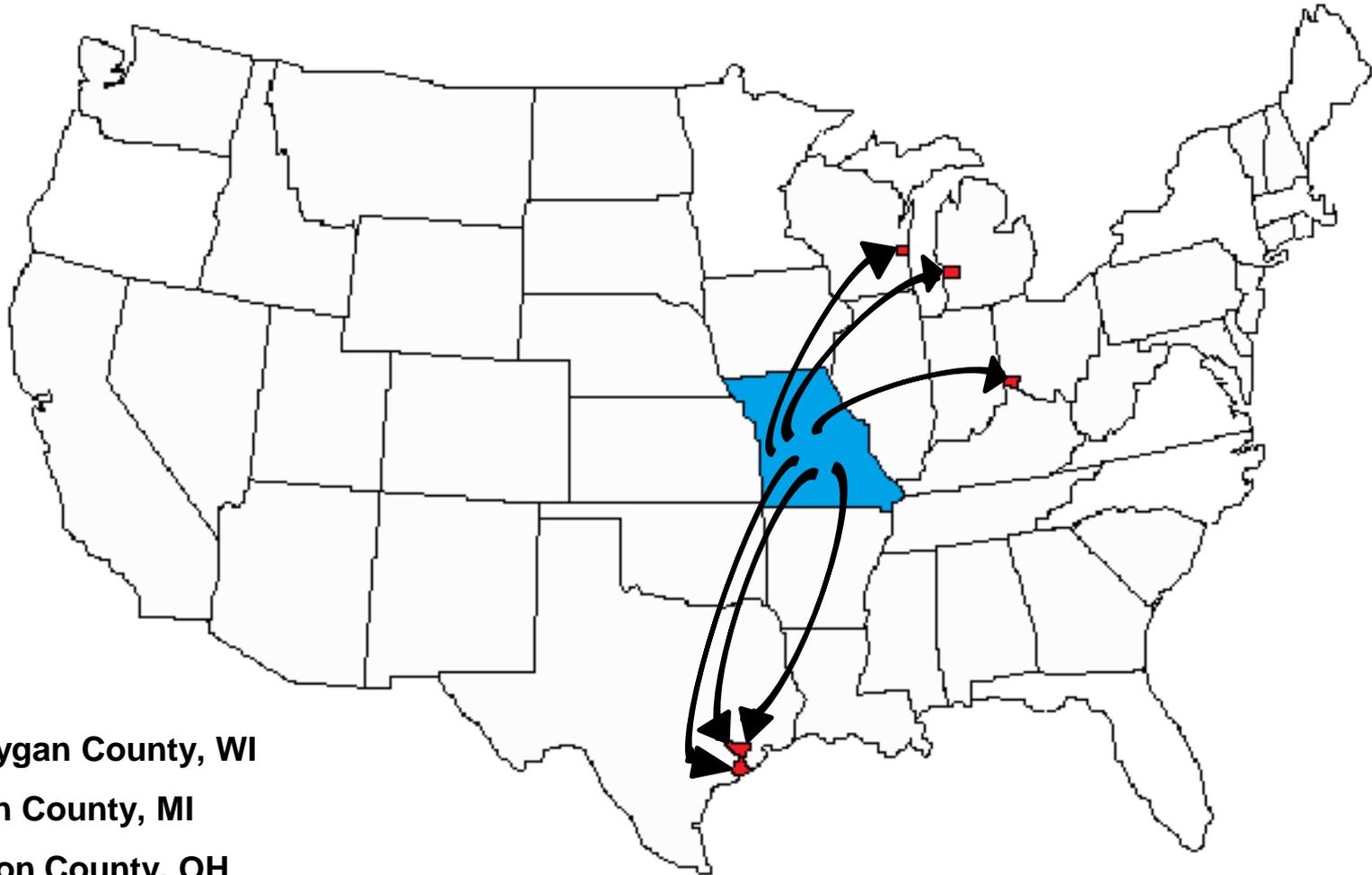
CSAPR Update Rule States



 CSAPR Ozone Season NO_x Group 2 States (22 States)

 CSAPR Ozone Season NO_x Group 1 States (Georgia only)
They can opt into Group 2 (requires a lower emission budget)

Missouri Downwind Contributions



Sheboygan County, WI

Allegan County, MI

Hamilton County, OH

Harris County, TX (2 monitors)

Brazoria County, TX

Missouri's New Emissions Budget

MO 2017 Statewide Budget	MO Variability Limit	Level	MO 2015 NO _x Emissions
15,780	3,314	19,094	18,855

All figures are displayed in tons NO_x/control period (May-September)

- Missouri Affected Sources: 126 Units at 41 Facilities
- Missouri's 2017 NO_x ozone season budget in the original CSAPR was 21,099 tons
This represents a 25% reduction to Missouri's emission budget.

Missouri's New Unit Set-Aside (NUSA)

Missouri Total Statewide Budget	Missouri NUSA Budget	Missouri Existing Unit Budget
15,780	324	15,456

All figures are displayed in tons NO_x/control period (May-September)

- New units for the CSAPR NO_x Ozone Season trading program - commenced operation after January 1, 2015
 - John Twitty Unit 2 and Iatan Unit 2 are now existing units under this program (Does not apply to annual NO_x or annual SO₂ programs)

Unit Level Allocations – Federal Plan (FIP)

Rule History

September 7, 2016 – Final Cross-State Air Pollution Rule Update

The EPA finalized Federal Implementation Plans (FIPs) in the CSAPR Update to address air quality impacts of the interstate transport of ozone air pollution in the eastern United States.

- [Final Cross-State Air Pollution Rule Update](#)
- [Fact Sheet](#)
- [Key Changes and Improvements Fact Sheet](#)
- [Press Release](#)
- [More Information – Benefits and Maps](#)
- [Regulatory Impact Analysis](#)
- [Power Sector Modeling](#)

Technical Support Documents (TSDs)

- [Air Quality Modeling TSD for the Final Cross-State Air Pollution Rule Update](#)
 - [8-Hour Ozone Model Performance Statistics by Monitoring Site for the 2011 Base Year CAMx Model Simulation for the Final CSAPR Update](#)
 - [Data File with Ozone Design Values and Ozone Contributions](#)
- [EGU NOx Mitigation Strategies Final Rule TSD](#)
- [Status of 110\(a\)\(2\)\(D\)\(i\)\(I\) SIPs for the 2008 Ozone NAAQS](#)
- [Ozone Transport Policy Analysis Final Rule TSD](#)
 - [Appendix E: Budget Calculations](#)
- [Assessment of Non-EGU NOx Emission Controls, Cost of Controls, and Time for Compliance Final TSD](#)
- [CSAPR Allowance Allocations Final Rule TSD](#)
 - [Unit-Level Allocations and Underlying Data for the CSAPR Update for the 2008 Ozone NAAQS](#)

What About Banked Allowances?

- The CSAPR Update Rule provides a one-time conversion of 2015/2016 banked allowances to be used in 2017 and beyond
- Conversion factor ensures a carryover of 99,700 allowances for use in 2017 and beyond
 - Depends on the number of banked allowances after 2016
- EPA estimates the conversion factor at approximately:
3.5 banked allowances = **1** allowance for 2017 and beyond
- Conversion to take place after March 1, 2017, but before March 1, 2018

Missouri's Original CSAPR SIPs

- Missouri State Rules 10 CSR 10-6.372 and 6.376 (CSAPR NO_x Annual and CSAPR SO₂ Group 1)
 - Approved into the SIP
 - State allocations are submitted to and recorded by EPA each year
- Missouri State Rule 10 CSR 10-6.374 (CSAPR NO_x Ozone Season)
 - Not approved into SIP because is based on original CSAPR budget
 - EPA will not record state submitted allocations based on this rule
 - CSAPR Update Rule took state rule's allocation method into account and allocates 1 allowance to Chillicothe and Higginsville

Missouri SIP Options – CSAPR Update Rule

Control Period	Explanation	
2017	All states included in the Update Rule are subject to a FIP, No option to replace the FIP through a SIP	
2018 *	A state can replace FIP allocations to existing units through a streamlined SIP (submitted by April 1, 2017). No state rule required. New unit allocations are still made via the FIP	
2019 and 2020	<ul style="list-style-type: none"> • CSAPR SIPs (must allocate full budget) <ul style="list-style-type: none"> - Full SIP: Trading Program requirements and allocations (can add units to program) - Abbreviated SIP: Allocations only • Alternative Good Neighbor SIP <ul style="list-style-type: none"> - Can remove the state from the trading program (Subject to EPA approval) 	<p>State rule required</p> <p>Deadline to Submit: Dec. 1, 2017</p>
2021 and 2022	Same options as 2019 and 2020 control periods, but the submittal date is Dec. 1, 2018	

* If a state wants to submit a SIP to allocate existing unit allowances for 2018, a letter of intent must be submitted by December 15, 2016.

Timing – Allocation Recordation

Control Period	Under FIP		Under SIP	
	Existing Units	New Unit Set-Aside	Existing Units	New Unit Set-Aside
2017	Jan. 3, 2017	Aug. 1, 2017 & Feb. 15, 2018	*	*
2018	Jan. 3, 2017	Aug. 1, 2018 & Feb. 15, 2019	Oct. 1, 2017	*
2019 and 2020	July 1, 2018	Aug. 1 (current year) & Feb. 15, (following year)	July 1, 2018	Aug. 1 (current year)
2021 and 2022	July 1, 2019		July 1, 2019	

* The state cannot submit a SIP to replace any FIP allocations for 2017 or the New unit set-aside allocations under the FIP for 2018

Open Discussion

Questions?

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Nothing in this document may be used to implement any enforcement action or levy any penalty unless promulgated by rule under chapter 536 or authorized by statute.