

GETTING

TO A HEALTHY

EXAMINING THE IMPACTS OF NEW OZONE REGULATIONS ON KEY TRANSPORTATION PROJECTS





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The mission of the U.S. Chamber of Commerce's Institute for 21st Century Energy is to unify policymakers, regulators, business leaders, and the American public behind a common sense energy strategy to help keep America secure, prosperous, and clean. Through policy development, education, and advocacy, the Institute is building support for meaningful action at the local, state, national, and international levels.

SARAH J. SIWEK & Associates

Transportation & Environmental Consulting



At the request of the Institute for 21st Century Energy, Siwek and Associates undertook detailed analysis of the possible impacts of proposed U.S. Environmental Protection Agency (EPA) ozone regulations on transportation funding and projects. The conclusions in this report are those of the Institute for 21st Century Energy.

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INTRODUCTION AND EXECUTIVE SUMMARY

America's transportation system is in dire need of repair. From coast to coast, urban and rural areas alike face deteriorating roads and transit systems, both hobbled by growing congestion and an increasingly limited ability to meet infrastructure needs that are literally the foundation of economic development and job growth.

Nearly 20 percent of America's major roads are in poor condition.¹ Vehicle repairs and extra operating expenses due to inadequate roads cost U.S. motorists \$109 billion per year—equivalent to \$516 per motorist.² Population growth and increased travel have resulted in congestion on 44 percent of major urban highways, costing motorists \$121 billion each year in wasted time and fuel costs. Similarly, many metropolitan areas face growing public transit challenges, from the maintenance and operation of existing systems to the construction of new capacity to accommodate increased ridership and demands for expanded service.

Meanwhile, state and local governments are scrambling to do more with less, as declining funding and Congressional inaction on needed reforms leaves few options beyond transportation triage. For these reasons and more, the U.S. Chamber of Commerce has made securing long-term policy changes and funding certainty necessary to address transportation challenges a top priority.

As Congress gears up to debate reauthorization of surface transportation programs, this report is intended to call attention to a significant emerging threat to addressing the aforementioned transportation challenges: the Environmental Protection Agency's (EPA) forthcoming ozone national ambient air quality

standards (NAAQS). This report analyzes the impact of these regulations on transportation projects.

Expected to be finalized later this year, the rules threaten to hit nearly every sector and region of the economy. The stringent level at which EPA has proposed to tighten the ozone standard will result in unprecedented compliance costs and challenges, and many states and metropolitan areas have said that meeting the proposed standard will be extremely difficult, if not impossible.

State and local governments unable to develop satisfactory compliance plans and demonstrate that their transportation plans meet the transportation conformity regulatory requirements—which, for reasons outlined in this report, will be increasingly difficult—face severe penalties under the Clean Air Act, not least of which is the withholding of federal transportation funding.

This analysis examines these compliance challenges and their associated potential impacts on transportation funding. Specifically, the report details how:

- EPA's proposed ozone regulation will dramatically increase the number of areas of the country in violation, forcing up to 331 counties that meet the current standard into noncompliance, and "moving the goalposts" on an additional 227 counties that have been working to comply with the agency's 2008 standard.

¹ The Road Information Program (TRIP). Available at http://tripnet.org/docs/Fact_Sheet_National.pdf

² Ibid.

- In many areas of the country compliance will be difficult if not impossible due to a number of factors, including:

- Exceedingly limited technological options to reduce emissions. EPA itself admits that in order to comply with a 65 parts per billion standard, 40 percent of necessary reductions must be met by “unknown controls” currently not in existence.
 - A greatly reduced ability to devise practical control strategies due to the tightened standard’s proximity to background ozone levels unaffiliated with local anthropogenic emissions.
 - Growing populations and business expansion—while undoubtedly positive for local economies—exacerbate ozone compliance challenges, particularly those regions with manufacturing and industrial-based economies.
- If EPA moves forward as proposed, these challenges will combine to result in a spike in Clean Air Act noncompliance penalties, including transportation “conformity lapses” that could cause the cutoff of federal transportation funding. With the exception of certain exemptions, these penalties impact all highway and transit projects that receive federal funding, as well as non-federally funded projects in need of federal approvals or permits.
 - Adding insult to injury, construction delays resulting from withheld transportation funding will only worsen traffic congestion, thereby increasing ozone-forming emissions.

- In order to avoid or resolve transportation conformity lapses, states and localities will be forced to make difficult and expensive choices, such as cancelling popular projects, taking vehicles off the road, and offsetting mobile source emissions through increased restrictions on (or shutdowns of) stationary sources such as industrial facilities and power plants.

The direct economic impacts of EPA’s proposed ozone regulations are well documented. According to the National Association of Manufacturers, the rule is expected to be the most expensive regulation in history, and will serve as an economic handcuff on business development in areas unable to comply with more stringent standards. As demonstrated in this report, however, the indirect transportation impacts of this rule could lead to similarly harsh consequences, as penalties for noncompliance result in the withholding of funds for critically important infrastructure improvements.

These cutoffs in funding and other associated impacts will serve not only to worsen the economic costs of the rulemaking, but they will also impose a literal roadblock on efforts to address the stifling congestion and worsening state of disrepair of America’s roads, bridges, and transit systems in growing cities around the country.

BACKGROUND

Ozone—or smog—is a gas composed of oxygen molecules that occurs naturally in the atmosphere and also forms as a result of combustion, such as that which takes place in vehicle engines, fires, or at industrial facilities and power plants. Thanks in large part to technological innovation, the United States has made tremendous progress addressing this challenge, cutting ozone-forming emissions in half since 1980.

In 2008, EPA lowered ozone standards from 80 parts per billion (ppb) to 75 ppb. Despite continued improvements, many parts of the country have yet to meet the 2008 standards (figure 1). Nevertheless, EPA is now seeking to lower the standard to a range of between 65 and 70 ppb, and is taking comment on a level as low as 60 ppb. This would dramatically increase the number of “nonattainment areas” throughout the country that violate the standard (figure 1). EPA estimates that, at 65 ppb, 331 new counties nationwide will be thrown into nonattainment, in addition to the 227 counties currently in nonattainment with the 75 ppb standard.

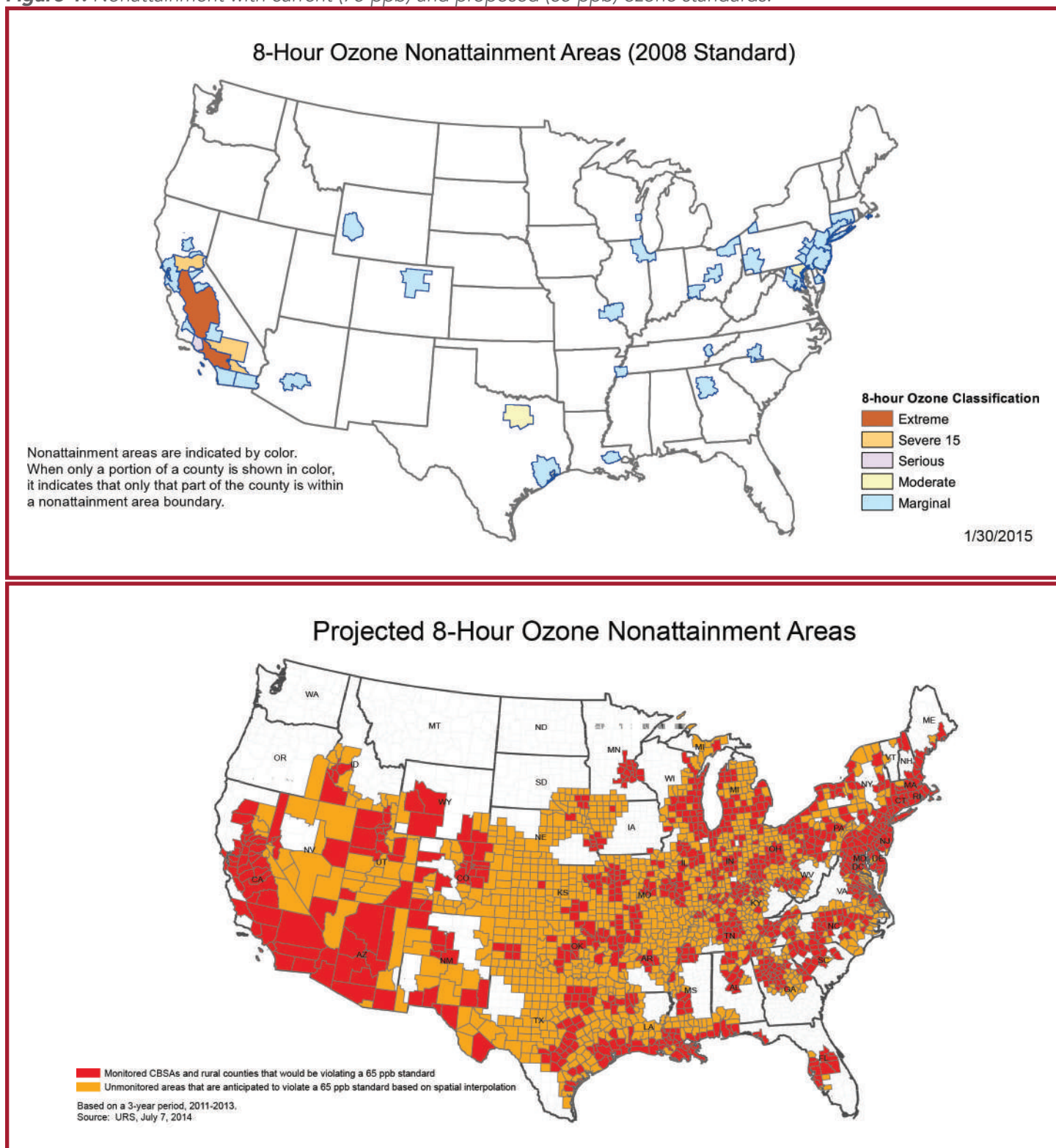
In fact, EPA’s proposed standard is so low that the pristine air of many national parks, including the Grand Canyon, Yellowstone, Great Basin and Yosemite, will violate a 65 ppb standard. Adding insult to injury, the new requirements effectively “move the goalposts” on states and municipalities that expended significant resources to achieve compliance with the 2008 standard.

The economic impacts of a nonattainment designation are serious and immediate. EPA has estimated that compliance costs of a 65 ppb standard will top \$15 billion annually, making this the most expensive regulation in the agency’s history. A National Association of Manufacturers (NAM) study estimates that the regulation will reduce annual GDP by \$140 billion, result in 1.4 million fewer jobs, and cost the average U.S. household \$830 per year in lost consumption.³ In Nevada, NAM estimates that the rule will reduce state GDP by \$19 billion between 2017 and 2040, and reduce employment by 6,000 jobs annually.

On a local level, a nonattainment designation results in layers of restrictions that stifle business investment and economic development. Companies that want to build or expand facilities in nonattainment areas are required to reduce ozone-forming emissions regardless of cost, straining economic development and local tax revenues (figure 2).

³ www.nam.org/ozone

Figure 1. Nonattainment with current (75 ppb) and proposed (65 ppb) ozone standards.⁴



⁴In the map of projected ozone nonattainment, counties in red denote monitored areas; counties in orange represent unmonitored areas anticipated to violate a 65 ppb standard based on spatial interpretation. Currently, regulatory compliance requirements are limited to monitored areas. Nonattainment designations are determined using the fourth-highest annual 8-hour average ozone concentration averaged over the most recent three-year period.

Figure 2. Local economic impacts of an ozone nonattainment designation.

EPA's New Ozone Rules: Coming to Your Community Soon

EPA has proposed new standards for emissions that form ozone. Sounds good, right? Not so fast. Emissions that form ozone have already been cut in half since the 1980s. We're all in favor of a better environment, but EPA's new proposed standards are so unreasonable that much of the country—even some national parks—won't be in compliance.

What happens when communities can't comply? Something EPA calls "nonattainment." Being in nonattainment status places enormous regulatory burdens on business and industry, stifling investment and bringing economic development and job creation to a grinding halt.

That's why this proposed ozone regulation is the most expensive in American history.

\$140 Billion

Annual loss in GDP as a result of nonattainment restrictions

1.4 Million

Jobs eliminated as a result of nonattainment restrictions

\$830 Per Year

Cost to the average US household

* Source: National Association of Manufacturers: nam.org/Issues/Ozone-Regulations/

Let's take a closer look at what it means for our communities:

Agriculture \$\$\$

"Reducing the standard for ozone...would negatively impact agricultural producers around the country...The practical ramification of this is that the costs associated with agricultural production would increase."

-National Association of State Departments of Agriculture

Small Businesses \$\$\$

Costly controls on small business equipment and operations will strain investment and harm consumers.

Cars and Trucks \$\$\$

Expensive restrictions on fuels and vehicles.

Government Revenue

Ozone regulations will restrict economic growth and development, resulting in lower state and local tax revenues and straining government services.

Highway Funding

Federal highway funding in nonattainment areas may be delayed indefinitely until a state commits to expensive offsets or demonstrates that a proposed project will not increase ozone.

Construction \$\$\$

Costly restrictions will halt business expansion by requiring major modifications for new facilities, leading to delayed or canceled construction projects.

Power Plants \$\$\$

Coal-fired power plants will be forced to shut down; construction of gas plants to replace lost electricity will take time, and be difficult and expensive.

Manufacturing \$\$\$

Manufacturing and industrial facilities may not get permits they need to build or expand.



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TRANSPORTATION FUNDING AND THE CLEAN AIR ACT

The Clean Air Act (CAA) operates on the principle of cooperative federalism, under which EPA sets attainable emissions standards that individual states are responsible for meeting in the manner that best fits their circumstances. However, to encourage state cooperation, the Act's programs governing ozone (and other regulated emissions) authorize EPA to impose two types of penalties for noncompliance: (1) offset sanctions (requiring new or expanded facilities to reduce emissions up to two tons for every ton of emission growth); and (2) withholding of transportation funding.

Transportation funding penalties come in two forms: automatic sanctions and funding cutoffs stemming from conformity lapses. Automatic sanctions prohibit release of federal transportation funds, except for certain safety, transit, or air quality-improving projects. They occur after expiration of a two-year "sanctions clock" that EPA initiates after disapproving a state implementation plan (SIP) or finding that an approved SIP is not being implemented. Conformity lapses are triggered when a metropolitan planning organization (MPO) is unable to demonstrate that its transportation plan, transportation improvement program (TIP), or specific projects meet emissions analysis requirements in the conformity regulation.

Specifically, the CAA requires that MPOs show that the emissions resulting from their 20-year Regional Transportation Plan (RTP) and four-year Regional Transportation Improvement Program (RTIP) investments do not: (1) cause or contribute to any violations of NAAQS; (2) increase the frequency or severity of NAAQS violations; or (3) delay timely attainment of the NAAQS or any

required interim milestone.

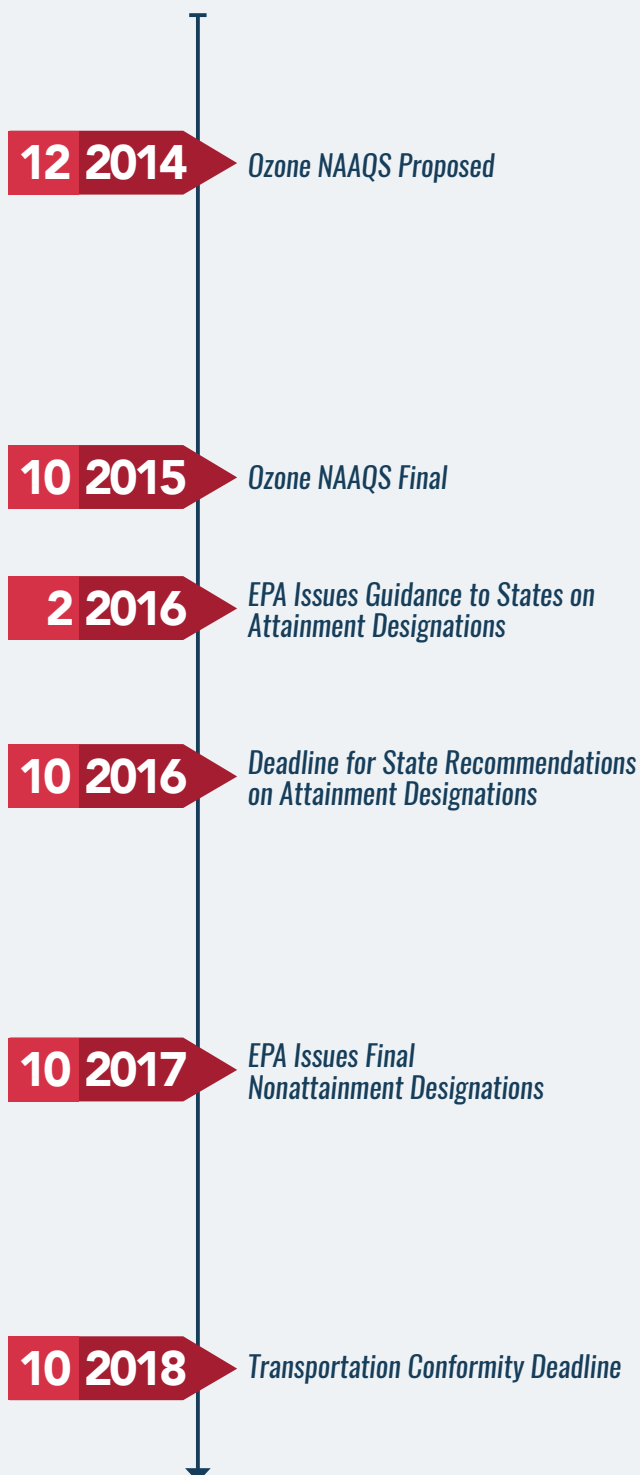
The Transportation Conformity Process

Demonstrating transportation conformity is an elaborate and time-consuming process that uses travel demand and emissions modeling to forecast motor vehicle emissions at various intervals out to at least 20 years into the future. These projections are then compared to "budgets" that act as a ceiling on mobile emissions. Historically, the vast majority of emissions reductions from transportation sources have been from improved vehicle and fuel technologies. Additionally, measures such as HOV lanes, public transportation investments, bicycle lanes, retrofitting or scrapping older vehicles, and restrictions on the use of certain fuels have contributed modest reductions in motor vehicle emissions over the past twenty years. A conformity lapse occurs when a nonattainment area, for one or more of EPA's criteria pollutants (i.e., ozone, carbon monoxide, particulate matter, etc.) cannot show that the transportation-related emissions from their investment plans, programs, and projects, fall below certain upward limits (i.e., "budgets").

Unlike automatic sanctions, a conformity lapse occurs immediately after a determination that an MPO's transportation plan is insufficient. By statute, areas must demonstrate transportation conformity within one year of an EPA nonattainment designation (see ozone rule timeline in table 1). In some cases—specifically, areas previously designated as in nonattainment—localities may get an additional one-year grace period prior to entering a conformity lapse.⁵ Conformity lapses can affect both highway and transit projects, and federally-funded as well as non-federally funded projects in need of federal approvals or permits from



TRANSPORTATION CONFORMITY COMPLIANCE TIMELINE



a host of federal agencies to proceed.⁶ It is important to note that projects slated to receive any federal funding, no matter how small the amount, can be put at risk by a conformity lapse. When an area enters a conformity lapse, only certain projects can proceed. These projects are:

- Projects that are exempt from conformity⁷
- Transportation control measures (TCMs) in an approved SIP⁸
- Projects or project phases already authorized by Federal Highway Administration/Federal Transit Administration
- Non-regionally significant, non-federal projects
- Regionally-significant, non-Federal projects with all approvals secured prior to the lapse

Resolving a Conformity Lapse

Resolving a conformity lapse is just as complicated and burdensome as avoiding one. Typically, a nonattainment area addresses the lapse through two primary means. It reduces projected mobile emissions through programs to take certain vehicles off the road, (i.e., diesel trucks) or modifies the mix of projects in its transportation plan. Additionally, in order to resolve a conformity lapse, in most cases an MPO must also work with state air regulators to revise the SIP by offsetting mobile source emissions with increased restrictions on stationary sources such as industrial facilities or power plants.

Both of these options—modifying the transportation plan and revising the SIP — are difficult, costly, time-consuming, and often unpopular undertakings, particularly in light

of local expectations regarding transportation project development and the inevitable tradeoffs that must be made between various mobile and stationary sources. These challenges are further exacerbated by EPA's requirement that mobile source emissions budgets must be met at least 20 years into the future (i.e., in 2018, areas will have to demonstrate that emissions will remain under limits through at least 2038). For all of these reasons, a conformity lapse — and even entering a conformity lapse grace period — is a very severe penalty that localities must work hard to avoid.

IN THEIR OWN WORDS:

Achievability and Compliance Burdens

"Unfortunately, the Proposed Rule seeks to impose new regulatory standards at or below background ozone levels for many western air quality control regions, meaning that no amount of technological innovation (or costs expended) will allow those regions to reach attainment status."

- States of ND, AL, IN, WY, MS, and WV

"For states and MPOs, the change in the NAAQS will have significant practical implications, including administrative burdens and slowdown in project delivery. The administrative burdens result from the need to make transportation conformity findings for ozone in hundreds of counties where those findings are not currently required. Especially in rural areas and small metropolitan areas, these burdens will be significant in comparison to existing budgets for transportation planning. The effect on project delivery results from the additional time required for transportation conformity determinations. While it is difficult to quantify these administrative burdens and delay impacts, we expect that they will be significant."

- American Association of State Highway Transportation Officials

⁵ Areas that miss the transportation conformity deadline and enter the one-year grace period still have to meet certain requirements, which may have consequences on projects.

⁶ These include the Federal Highway Administration, Federal Transit Administration, EPA, Fish and Wildlife Service, and U.S. Army Corps of Engineers, among others.

⁷ Exempt projects include many categories of projects including safety, some intelligent transportation system (ITS) projects, some transit projects, seismic retrofits, street improvements, freeway service patrol, etc. (See 40 CFR §§93.126, 93.127, 93.128)

⁸ TCMs are listed in section 108(f) (1) (a) of the CAA and are programs designed to reduce vehicle use or change traffic flow or congested conditions. TCMs also include travel demand management (TDM) strategies. In some states TCMs may be included in an EPA - approved State Implementation Plan (SIP).



IN THEIR OWN WORDS:

Impacts of EPA's New Ozone Standard on Transportation Infrastructure and the Economy

"For non-attainment areas, the federal government can withhold federal highway funds for projects and plans. Withholding these funds can negatively affect job creation and critical economic development projects for impacted regions, even when these projects and plans could have a measurable positive effect on congestion relief... Given these financial and administrative burdens on local governments, we urge EPA to delay issuing a new NAAQS for ozone until the 2008 ozone standard is fully implemented."

- U.S. Conference of Mayors, League of Cities, National Association of Counties, and National Association of Regional Councils

"President Obama has pleaded with Congress to help provide the funding to get major roads and bridges improved. Standing under major bridges in Ohio and New York, the President demanded action from Congress to get major projects done. But under a 60 ppb, 65 ppb, or even 70 ppb standard, highway and transit funding for projects like these could be withheld or confiscated in many areas where local planning officials are under the thumb of federal regulators to make their safety and mobility plans conform."

- American Highway Users Alliance

*"Tightening ozone standards could result in the withholding of federal highway funds in areas forced out of compliance with the new standards. This, in turn, would have **negative effects on both employment and development** for impacted counties where transportation improvements are delayed or cancelled. In many instances, these federal-aid projects are intended to improve demonstrated public safety threats. Further, once completed, transportation improvements can reduce congestion and improve air quality. **Such improvements will not be realized if projects cannot go forward.**"*

- American Road Builders and Transportation Association

"Delays on the Interstate Highway System increased operational costs for the trucking industry by \$9.2 billion in 2013. State highway projects that are located in nonattainment areas are subject to additional analyses and review requirements to demonstrate conformity with air quality plans in order to be eligible for federal funding. An increase in the number of nonattainment areas will subject more areas to conformity analyses requirements, likely increasing the costs of highway projects and potentially leading to delays in the construction of important congestion mitigation projects."

- American Trucking Association

TRANSPORTATION FUNDING IS RARELY WITHHELD – WHY WILL THIS TIME BE DIFFERENT?

Historically, the imposition of harsh highway sanctions and conformity lapses have been relatively uncommon under the Clean Air Act. EPA's "sanctions clock" has been triggered 13 times, but clock expiration and the actual imposition of highway sanctions has occurred only once.⁹ According to the Congressional Research Service, conformity lapses—the focus of this report—have occurred 70 times since 1997.¹⁰

Table 1. Ozone standard revisions, 1979 – 2015

Year	Ozone Standard (parts per billion)
1979	120 ¹¹
1997	80
2008	75
2015 (proposed)	65 – 70

Atlanta is often considered the poster child of conformity lapse examples. In 1998, after failing to demonstrate conformity with EPA's 1979 ozone standard, Atlanta entered a lapse that ultimately lasted more than two and a half years. In order to resolve the lapse, Atlanta transportation planners had to redirect funding from highway construction to projects focused on transit, bicycle, and safety measures. In total, about \$700 million in projects that would have

expanded highway capacity were stopped. This two and a half year conformity lapse resulted in lengthy project delays and associated increases in construction costs.

Since incorporation of the conformity lapse grace period in 2007, seven lapses have occurred. However, 34 areas in 18 states have entered the lapse grace period—an indication that significant compliance challenges exist even at past and present regulatory standards which are much more modest than EPA's current proposal.¹²

The limited instances of conformity lapse occurrences since 2007, when the lapse grace period was added to the regulations by Congress, should not be considered an indicator of future compliance ease. In the case of prior rules, targets were set at levels that were initially very challenging but, in conjunction with steady technological advances, allowed for development of SIPs and associated transportation plans that put states on a path to compliance (table 1).

Under EPA's proposed revised standard, however, noncompliance and related transportation funding penalties are likely to rise dramatically. These penalties will be driven by four primary factors that will make compliance especially difficult: (1) technological achievability, (2) background ozone, (3) economic and population growth, and (4) transportation planning burdens and strains on limited government resources.

⁹ http://www.fhwa.dot.gov/environment/air_quality/highway_sanctions/sanctionsclock.cfm

¹⁰ Report on Transportation Conformity Under the Clean Air Act. Available at <http://www.hsdl.org/?view&did=766518>

¹¹ The 1979 ozone standard was a "1-hour standard," meaning that 120 ppb was the maximum allowable average concentration over one hour to remain in attainment. In 1997, EPA transitioned to an 8-hour standard, setting minimum attainment at the fourth-highest 8-hour average concentration over a rolling three-year period.

¹² Note: these lapses pertain to all regulated pollutants, not just ozone (i.e. particular matter, SO₂, etc).



Technological Achievability

To avoid transportation funding penalties, the Clean Air Act requires states with nonattainment areas to specify how they will achieve compliance with a more stringent ozone standard. For example, compliance with prior ozone standards has been achieved in large part through strict requirements on vehicles and motor fuels such as gasoline and diesel. With these avenues largely exhausted, states and localities are left with extremely limited options to comply through implementation of new technologies.

EPA itself explicitly acknowledges this in the proposed rule, noting that current emissions control technologies will not be sufficient to achieve compliance and estimating that, with a 65 ppb standard, over 40 percent of necessary reductions must be met by “unknown controls” currently not in existence. A recent industry report from NERA Consulting estimates that such unknown controls present even greater compliance burdens, comprising more than 60 percent of required reductions.

Because these controls are not known, their technological feasibility, costs, and whether they even could come into existence are unknown—and, by definition, unknowable. Absent a path to compliance, states would quickly exhaust (if they have not already) cost-effective technological control options, leaving them with no choice but to shut down existing industrial facilities or prematurely scrap older vehicles and equipment to avoid penalties.

IN THEIR OWN WORDS:

Transportation Impacts

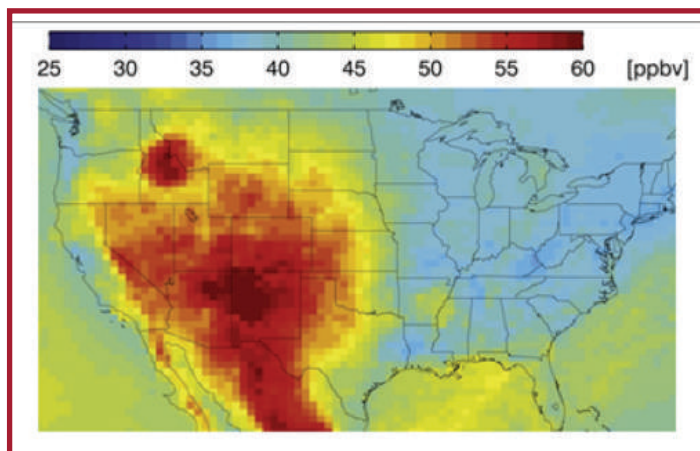
“A major concern for CRPC’s transportation planning responsibilities related to a lower ozone standard is the almost certain inability to meet new conformity requirements for planned transportation projects. It is expected that, given further emissions reductions necessary to meet a new, lower ozone standard, it will be impossible to make a new conformity determination without transportation control measures that the public will not accept. If unable to demonstrate conformity under the new standard, our existing conformity status will lapse and the availability of federal highway funds for our transportation projects will be placed in jeopardy.”

- Baton Rouge, Louisiana Capital
Region Planning Commission

Background Ozone

A second and equally significant factor threatening states’ ability to comply with

Figure 3. Modeled Estimates of Ozone Background Levels, 2006-2008.¹³



¹³ http://www.csg.org/aapca_site/documents/AAPCASurvey-StateEnvironmentalAgencyPerspectivesonBackgroundOzoneandRegulatoryRelief-June201.pdf

more stringent ozone standards is the issue of background ozone. A significant and sometimes predominant fraction of ambient ozone levels are in fact not due to local anthropogenic emissions but to natural-occurring background ozone and ozone transported from locations as far away as Asia and deposited from the stratospheric layer of the atmosphere (where ozone blocks the sun's ultraviolet rays). In the vast majority of the country, background ozone levels exceed 35 parts per billion (figure 2).

Background ozone concentrations in much of the intermountain West exceed 50 ppb or more, which is why even many remote and desolate areas of the country (including national parks such as Yellowstone and the Grand Canyon, Fig.2) exceed EPA's proposed standard. Because EPA's tightened standard brings so many areas closer to background levels, states and localities have greatly reduced ability to devise practical control strategies to achieve compliance.

While this is a less of a problem in the Eastern U.S., D.C. region is about 40 ppb—transportation agencies must take these background levels into account as part of conformity emissions modeling. A recent survey of states by the Association of Air Pollution Control Agencies found that 24 states (including 10 states in the Eastern U.S.) raised concerns with EPA regarding the impact of background ozone levels on their ability to comply with the new standard.¹⁴

Economic Growth and Population Growth

Many areas of the United States—particularly urban areas—have witnessed steady economic growth and population growth over the last 25 years. Since 1990, U.S. economic output has

IN THEIR OWN WORDS:

Background Ozone

"The transportation conformity process will impose a difficult – if not impossible – task in places where background levels are so high that there is little that can be done through transportation planning to reduce ozone."

- Texas Department of Transportation

"As with other states, the Department is concerned about background and transported ozone which may prevent compliance with a more stringent NAAQS. As the economies of Asian countries, such as China and India grow, the problem is expected to only get worse."

- North Dakota Department of Health

"Local contributions are so minor that, if areas within Nevada's jurisdiction are in nonattainment with the new proposed standard, the NDEP will be in the untenable position of having no meaningful control strategies to achieve attainment with the new standard."

- Nevada Department of Environmental Protection

grown by more than 80 percent, and the nation's population has grown by 28 percent. Vehicle travel on U.S. highways has increased 39 percent during this same time period. Similarly, annual transit ridership has grown by nearly 40 percent since 1995. These trends of increased population and business expansion—while undoubtedly positive for local economies—exacerbate ozone standard compliance challenges in areas of rapid and steady growth, particularly those regions with manufacturing and industrial-based economies.

¹⁴ Annual 4th highest policy relevant background ozone, 2006 – 2008. From Zhang et al, 2011. Available at http://dash.harvard.edu/bitstream/handle/1/12712894/Zhang_ImprovedEstimate.pdf?sequence=1



Transportation Conformity Costs and Planning Burdens

A final factor adding to state and local government compliance challenges with EPA's proposed ozone regulations is the substantial and costly regulatory process burdens imposed by the rule and other similar air regulations. As discussed earlier, state departments of transportation and metropolitan planning organizations must undertake extensive analyses and paperwork processes in order to demonstrate conformity. As detailed in Appendix I, these activities include development of planning assumptions (trends in land use, travel, demographics, employment, vehicle fleet mix, etc.), sophisticated modeling of travel demand, emissions forecasting, project-level analyses and modeling, and more. These process requirements must be met each time an MPO revises a transportation plan or Transportation Improvement Program (TIP)—the U.S. Department of Transportation cannot allow an area to obligate funds to a project until and unless an acceptable conforming plan and TIP are in place.

In its proposed rule, EPA dramatically underestimates the cost of these burdens. EPA estimates that the cost annual conformity demonstrations averages about \$30,000 per MPO, and that the entire nationwide cost of meeting the requirements is just \$3.8 million annually.

There are numerous problems with EPA's assumptions. First, EPA assumes that localities undertake conformity analyses only once every four years. In reality, this exercise is done at least once each year in most areas. EPA also underestimates the burden hours and associated costs of these assessments. As a result, the agency has likely underestimated actual conformity process costs by roughly an order of magnitude, and much more in many cases. For example, the Louisiana DOT estimates

annual conformity assessment costs of about \$400,000 per MPO. Louisiana may have as many as eleven nonattainment areas under a new ozone standard which would cost the state about \$1.25 million annually for compliance. The cost of a conformity assessment for two large MPOs in Texas (Houston and Dallas-Fort Worth) averages about \$450,000 annually, which does not include many ongoing planning costs required in addition to the assessment. Similarly, in the Washington, D.C., region, we estimate that, based on public documents, reasonable assumptions, and past experience, annual conformity determination costs are between \$1.3 million and \$2.7 million (appendix I). This represents between 9 and 18 percent of the regional transportation planning board's entire budget—a severe burden for an entity that must undertake planning efforts for all transportation issues (roads, transit, airports, etc.). Other cities are likely to face similar burdens.

It should be noted that the costs of failing to meet these requirements (principally, transportation project delays and the withholding of federal funding) greatly exceed the costs of carrying them out. However, under EPA's proposed lowered standard these requirements are certain to place incredible and potentially insurmountable pressure on many state and local governments. This pressure will be particularly burdensome on the hundreds of generally smaller and less well-funded counties that will be forced to undertake conformity assessments as a result of being pushed into nonattainment status. In those places where counties do not have the resources to conduct required analyses, the state DOTs will bear this additional burden.

CONCLUSION

The severity of EPA's proposed ozone standard and the associated lack of compliance options greatly increases the likelihood that federal transportation funds will be withheld from localities around the country due to conformity lapses. Numerous states and localities are simply not going to have the resources and tools necessary to reduce ozone-forming emissions to meet the new more stringent standard. Compliance in regions with growing populations and high levels of background ozone will be particularly challenging. Local officials could be forced to choose between competing transportation priorities and business and industrial expansion critical to jobs and economic development.

If a region fails to meet transportation conformity requirements at levels set by EPA, the impacts on critical area projects could be very large. These noncompliance penalties would not only directly affect highway and transit projects already funded and under construction, but could also delay permitting and approvals for longer-term projects. Such delays would reverberate across the region's entire planning and investment program and undermine public confidence in the government's ability to deliver badly needed transportation solutions.

These circumstances would serve not only to exacerbate the economic consequences of EPA's proposed rulemaking, they would also impose a literal roadblock on efforts to address the stifling congestion and critical state of disrepair of America's roads, bridges and public transit systems in growing cities around the country.

Accordingly, the Chamber strongly urges EPA to take a more reasonable approach and allow appropriate time for states and localities to make critically needed investments in transportation

infrastructure rather than spend time and money on an ozone standard that EPA itself admits may be impossible to attain without heretofore unknown technological advances.









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