Columbia Law School Scholarship Archive

Sabin Center for Climate Change Law

Research Centers & Programs

6-2024

Cities, E-Commerce & Public Health: 3 Legal Pathways to Limiting Freight Vehicle Emissions

Amy E. Turner

Follow this and additional works at: https://scholarship.law.columbia.edu/sabin_climate_change Part of the Environmental Law Commons, and the Transportation Law Commons Columbia Law School | COLUMBIA CLIMATE SCHOOL SABIN CENTER FOR CLIMATE CHANGE LAW

CITIES, E-COMMERCE & PUBLIC HEALTH

3 LEGAL PATHWAYS TO LIMITING FREIGHT VEHICLE EMISSIONS



JUNE 2024

Amy E. Turner

Columbia Law School, Sabin Center for Climate Change Law, aturner@law.columbia.edu

Columbia Law School | COLUMBIA CLIMATE SCHOOL SABIN CENTER FOR CLIMATE CHANGE LAW

The author wishes to thank Michael Burger and Romany Webb of the Sabin Center for Climate Change Law and Catherine Ittner of C40 Cities for their extremely helpful comments on this work. Any remaining errors are my own.

© 2024 Sabin Center for Climate Change Law, Columbia Law School

The Sabin Center for Climate Change Law develops legal techniques to fight climate change, trains law students and lawyers in their use, and provides the legal profession and the public with up-to-date resources on key topics in climate law and regulation. It works closely with the scientists at Columbia University's Climate School and with a wide range of governmental, non-governmental and academic organizations.

Sabin Center for Climate Change Law Columbia Law School 435 West 116th Street New York, NY 10027 Tel: +(212) 854-8213 Email: columbiaclimate@gmail.com Web: https://climate.law.columbia.edu/ **Twitter:** @ColumbiaClimate **Blog:** http://blogs.law.columbia.edu/climatechange

Disclaimer: This report is the responsibility of The Sabin Center for Climate Change Law alone and does not reflect the views of Columbia Law School or Columbia University. This report is an academic study provided for informational purposes only and does not constitute legal advice. Transmission of the information is not intended to create, and the receipt does not constitute, an attorney-client relationship between sender and receiver. No party should act or rely on any information contained in this report without first seeking the advice of an attorney.

Cover photo by Ivan Bandura on Unsplash.

Table of Contents

Executi	ve Summary	3
I. INTRO	DDUCTION	6
II. THE I	PROLIFERATION OF LAST-MILE DELIVERY WAREHOUSES	9
Α.	The Rise of E-Commerce in Cities	10
В.	E-Commerce Warehouses Have Especially Harmful Impacts to Low-Income Communities and Communities of C	olor11
III. U.S.	FEDERAL LAWS AND LEGAL FRAMEWORKS APPLICABLE TO FREIGHT TRANSPORTATION	14
Α.	U.S. Energy Policy & Conservation Act and U.S. Clean Air Act	15
В.	U.S. Federal Aviation Administration Authorization Act	20
С.	Dormant Commerce Clause	23
D.	U.S. Federal Highway Administration and Road Tolling	25
E.	Local Authority Under State Law	26
IV. CALI	FORNIA'S ADVANCED CLEAN FLEETS (ACF) FULE AND OTHER DRAYAGE TRUCK APPROACHES	27
Α.	Advanced Clean Fleets (ACF) Rule for Drayage Trucks	28
В.	Legal Challenges and CARB Request for USEPA Waiver	29
С.	Avoiding Preemption by Federal Law in the Absence of an EPA Waiver	32
D.	Lawsuit in State Court	34
Ε.	Fee for Containers on Non-ZEV Drayage Trucks at the Ports of Los Angeles and Long Beach	35
F.	South Coast Air Quality Management District (SCAQMD) Drayage Truck Program at Ports of Los Angeles and Lor 36	ng Beach
V. SITE-	BASED EMISISONS STANDARDS: INDIRECT SOURCE RULE FOR WAREHOUSES	38
Α.	South Coast Air Quality Management District's WAIRE Program	39
В.	New York State Indirect Source Bill: The Clean Deliveries Act	40
С.	Legal Considerations for WAIRE-Style Programs, Including New York's Clean Deliveries Act	41
VI. LON	/-EMISISONS DELIVERY ZONES	48
Α.	Santa Monica, CA	49
В.	Portland, OR	50
С.	Los Angeles, CA	51
D.	Legal Considerations for Low Emissions Delivery Zones (LEDZ) or Zero Emissions Delivery Zones (ZEDZ)	52
VII. COI	NCLUSION	54

EXECUTIVE SUMMARY

In recent years, cities have become increasingly defined by e-commerce – the sprawling network of goods delivery from central warehouses to neighborhood distribution centers to residents' front doors. This growing network of warehouses and the freight vehicles that serve them contribute significantly to a community's greenhouse gas emissions and exposure to harmful pollutants like nitrogen oxides (NOx), carbon monoxide and particulate matter. Moreover, so-called last-mile delivery warehouses (or distribution centers) are proliferating, largely in low-income communities and communities of color, where residents are exposed to increasing traffic, pollution, and harmful health impacts.

While a handful of cities have pursued approaches to lessening tailpipe emissions from freight vehicles, such as through electric vehicle and cargo bike pilot programs, there is a clear gap in regulating the emissions attributable to e-commerce warehouses and the vehicles that enter and exit them. In part, cities have had difficulty limiting freight vehicle emissions because federal law preempts certain state and local vehicle restrictions. Three federal statutes stand in the way. The Energy Policy & Conservation Act (EPCA) preempts state and local laws and regulations "relating to fuel economy standards or average fuel economy standards for automobiles."¹ The Clean Air Act (CAA) prohibits states and local governments from "adopt[ing] or attempt[ing] to enforce any standard relating to the control of emissions from new motor vehicles or new motor vehicle engines."² And the Federal Aviation Administration Authorization Act (FAAAA) preempts state and local laws "related to the price, route, or service of any motor carrier... with respect to the transportation of property."³ This white paper discusses these forms of federal preemption, along with exceptions to preemption for certain state and local actions with respect to freight vehicles.

Three policy approaches are discussed herein: (1) rules for drayage trucks within California's Advanced Clean Fleets rule;⁴ (2) site-based emissions standards for warehouses (also known as indirect source rules); and (3) zero-emissions delivery zones in which zero-emissions vehicles (ZEVs) have priority access to loading and unloading areas. Each of these presents legal complexity, but elements of them can be available to cities looking to control emissions associated with e-commerce delivery.

In April 2023, the California Air Resources Board (CARB) adopted the Advanced Clean Fleets (ACF) rule,⁵ which includes rules for drayage trucks operating in the state. The ACF implements Gov. Newsom's Executive Order (EO) N-79-20, which set a goal for 100 percent zero-emission drayage trucks in the State by 2035.⁶ The ACF rule requires the registration of all drayage trucks that operate in California in a CARB Online System, and through

¹ 49 U.S.C. § 32919(a) (1994).

² 42 U.S.C. § 7543(a) (1990).

³ 49 U.S.C. § 14501(c)(1) (2015).

⁴ 13 Cal. Code Regs. § 2014 et. seq. (2023).

⁵ Id.

⁶ Cal. Exec. Order N-79-20 (2020).

2023 allowed only trucks with a model year of 2010 or newer, or trucks with equivalent or better emissions controls, to register. For diesel-fueled trucks registered before 2024, trucks are required to be retired (at least for purposes of use as a drayage truck in California) upon the earlier of when they reach 800,000 miles or when the engine is eighteen years old.⁷ The ACF rule has been the subject of several lawsuits alleging preemption by EPCA, the CAA, and the FAAAA, and violation of the dormant Commerce Clause of the U.S. Constitution,⁸ none of which has been substantively resolved. California is also currently seeking a CAA preemption waiver from the U.S. Environmental Protection Agency (USEPA);⁹ USEPA has not yet ruled on the request and CARB has paused enforcement while the request remains pending. If USEPA grants the requested waiver to CAA preemption, other states would be eligible to adopt the rule.¹⁰ In the absence of a CAA preemption waiver, cities and states looking to enact a policy similar to ACF's drayage truck rules would be well advised to avoid regulating "emissions from *new* motor vehicles or *new* motor vehicle engines" (emphasis added), as preempted by the CAA.¹¹ The risk of preemption can be mitigated but not fully avoided.

In May 2021, California's South Coast Air Quality Management District adopted Rule 2305, which implemented the Warehouse Actions and Investment to Reduce Emissions (WAIRE) Program, with the goal of reducing NO_x and PM emissions from light- and heavy-duty freight vehicles at warehouse facilities.¹² Warehouse operators are required to earn a certain number of "WAIRE Points" to meet their obligations under the WAIRE Program through a range of measures including acquiring or using ZEVs, reducing truck visits, installing ZEV charging or fueling infrastructure, and more.¹³ Alternatively, a warehouse operator and the SCAQMD may agree to a custom compliance plan or the operator may pay a mitigation fee.¹⁴ Legislation contemplating a similar program has twice been introduced in New York State.¹⁵ There are two broad approaches a city might take to avoiding preemption of a warehouse indirect source rule like WAIRE. First, working with the state, a warehouse indirect source rule might be incorporated into the state's State Implementation Plan (SIP) as required by Section 110 of the CAA. Inclusion in a SIP would generally insulate a measure from preemption by other aspects of the CAA. Second, a city or other regulating jurisdiction can ensure enough optionality in compliance pathways such that no regulated party is effectively *required* (including through *de facto* mandates such as significant pricing differentials among compliance options) to acquire a ZEV.

⁷ 13 Cal. Code Regs. § 2014(a)(1)(C) (2023).

⁸ U.S. CONST. art. I, § 8, cl. 3.

⁹ Clean Air Act § 209(b) Waiver And § 209(e) Authorization Request Support Document Submitted by the California Air Resources Board (Nov. 15, 2023), https://www.epa.gov/system/files/documents/2023-12/ca-waiver-carb-req-acf-2023-11-15.pdf. ¹⁰ 42 U.S.C. § 7507 (1990).

¹¹ 42 U.S.C. § 7543 (1990).

¹² S. Coast Air Qual. Mgmt. Dist. Indirect Source Rule, Rule 2305 (2021).

¹³ S. Coast Air Qual. Mgmt. Dist. Indirect Source Rule, Rule 2305(d)(3) and Table 3.

¹⁴ S. Coast Air Qual. Mgmt. Dist. Indirect Source Rule, Rule 2305(d)(4) & (5)).

¹⁵ Senate Bill S2127B, THE NEW YORK STATE SENATE, https://www.nysenate.gov/legislation/bills/2023/S2127/amendment/B (last visited June 9, 2024).

Finally, over the last several years, a small number of cities, including Portland, Oregon¹⁶ and Los Angeles¹⁷ and Santa Monica, California,¹⁸ have advanced policy approaches to limiting the ability of non-ZEV delivery trucks to load or unload in certain areas of the city. Thus far, ZEDZs in the US have been largely voluntary; they offer incentives like priority loading zones and chargers for ZEV delivery vehicles and involve pilot approaches to low-emissions freight transport, but they do not require any particular action on the part of delivery vehicles, nor do they exclude non-ZEVs from driving through the zone. The zones are relatively small – a few city blocks to on the order of a square mile – and non-ZEV trucks can drive through the zones and load or unload just outside of them. The lawfulness of these approaches – which can face preemption questions under the CAA, EPCA and the FAAAA, generally depends on whether the benefits offered to ZEV trucks or the disincentives to non-ZEV trucks can be considered mandates, incentives, or an in-between category of *de facto* mandates that effectively compel the purchase of ZEVs even if they do not expressly require it. State law can be more permissive here – cities often have authority under state law to pursue ZEDZ or curb management strategies through parking, stopping and standing rules, idling rules, signage rules, and more, though fewer of them have authority to toll (or charge for access to) public roads. The analysis under both federal and state law is factspecific; the particular restrictions, techniques, and route will all play into whether a ZEDZ comports with applicable law.

Despite the relatively recent nature of e-commerce proliferation, last-mile delivery warehouses perpetuate longstanding patterns of environmental injustice, exposing low-income communities and communities of color to significant and harmful truck pollution. And though the federal law landscape can be murky, the CAA, EPCA and the FAAAA allow some room for local governments to place limits or otherwise address pollution and other e-commerce impacts. The legal tools available to address their impacts are necessarily evolving, and they offer significant promise, particularly for jurisdictions willing to calibrate an approach carefully to applicable legal frameworks and to their local context. For many cities, addressing the impacts of e-commerce is a necessity, through one approach or another. Last-mile delivery has once again laid the pollution burden with low-income communities and communities of color. Fortunately, cities have a range of imperfect but promising legal tools to mitigate its harm.

 ¹⁶ Strengthening Mobility and Revolutionizing Transportation Fiscal Year 2022 Planning and Prototyping Grants by State, U.S. DEP'T OF TRANSP. (Mar. 2023), https://www.transportation.gov/sites/dot.gov/files/2023-03/FY22%20SMART%20Project%20List.pdf.
¹⁷ Los Angeles Ord. No. 187117 (2021) sec. 1.

¹⁸ Santa Monica Zero Emissions Delivery Zone Pilot, Los ANGELES CLEAN TECH INCUBATOR, https://laincubator.org/zedz/ (last visited June 9, 2024).

I. INTRODUCTION

I. INTRODUCTION

Over the last several years, two opposing trends have come to shape cities in the United States. On the one hand: the imperative to reduce greenhouse gas (GHG) emissions from vehicles, the first or second largest source of carbon pollution in each major U.S. city,¹⁹ along with associated tailpipe emission of harmful pollutants of nitrogen oxides (NOx), carbon monoxide, particulate matter (PM) and more, with particularly noxious effects for low-income communities and communities of color.²⁰ On the other hand: increasing reliance on e-commerce with its concomitant rise in warehouses and freight vehicles large and small, which can stymie city GHG-reduction targets for the transportation sector and bring more traffic, pollution, and harmful health impacts to the already overburdened communities where warehouses are often sited. These conflicting realities have led to some local policy innovation in the space, including e-bike delivery pilot projects, voluntary zero-emissions zones, and dedicated charging infrastructure for zero-emissions trucks.²¹

However, many of these city-led policy innovations have sought to address impacts of last-mile delivery near a parcel's end destination, rather than the impacts felt by neighbors living closer to last-mile delivery warehouses. Moreover, they have mostly been without the force of law, in large part due to a lack of clarity around the preemptive scope of federal law, especially preemption by the U.S. Clean Air Act (CAA), the U.S. Energy Policy & Conservation Act (EPCA), and the Federal Aviation Administration Authorization Act (FAAAA). This white paper explores the preemptive scope of these federal laws while positing how city legal and regulatory authority could be leveraged to regulate or otherwise limit emissions of GHGs and other harmful air pollutants from freight delivery vehicles that enter and depart last-mile delivery warehouses. In other words, it seeks to answer the question: What legal tools do local governments have to counteract rising emissions from freight vehicles given federal law limitations?

Following a discussion of the rise in e-commerce, warehouses, and freight vehicles in cities, with particularly harmful impacts to low-income communities and communities of color (Part II), and a discussion of the federal law landscape for regulation of vehicles by local governments (Part III), this white paper explores three legal and regulatory tools that local governments might use to address emissions from freight transportation vehicles, and how each of these approaches interacts with or will need to take into account federal law. (State law issues are also addressed briefly in each instance, but given the nationwide applicability of this publication, a full accounting of state legal issues is out of scope.) The three legal tools discussed below are: "clean fleet" or

¹⁹ See, e.g., *Greenhouse gas emissions interactive dashboard*, C40 (Feb. 2024), https://www.c40knowledgehub.org/s/article/C40-cities-greenhouse-gas-emissions-interactive-dashboard?language=en_US.

²⁰ Mary Angelique G. Demetillo et al., *Space-Based Observational Constraints on NO2 Air Pollution Inequality From Diesel Traffic in Major US Cities*, 48 GEOPHYSICAL RSCH. LETTERS Issue 17 (Aug. 25, 2021),

https://agupubs.onlinelibrary.wiley.com/doi/10.1029/2021GL094333.

²¹ See Building healthy cities in the doorstop-delivery era: Sustainable urban freight solutions from around the world, NAT'L ASS'N OF CITY TRANSP. OFF. (NACTO) (June 2021), https://nacto.org/wp-

content/uploads/2021/06/BuildingHealthyCities_UrbanFreightReportJune2021.pdf.

drayage truck rules modeled on those enacted in California (Part IV); site-based emissions standards, or "indirect source rules" for warehouses (Part V); and low-emissions freight zones (Part VI). Part VII concludes.

The purpose of this white paper is to frame out for local and state policymakers and the advocates who work at those scales the federal legal landscape that will inform policy approaches to limiting freight vehicle emissions. (Emissions herein refers to both greenhouse gas emissions and harmful local air pollutants like particular matter and NO_x, both of which are caused by diesel freight trucks, though they have different impacts.) Undoubtedly, the legal tools explored in this white paper are not the only ones that a city might use to address the spread of e-commerce warehouses. For example, some cities have explored use of their zoning or land use authority to limit or disallow warehouses in certain areas.²² This paper focuses on the ways that cities can regulate or act to limit emissions from freight vehicles – in particular those entering and exiting last-mile delivery warehouses – in light of broad federal preemption of direct air emissions standards and other limitations on vehicles.

²² See, e.g., María Paula Rubiano A., *A 'Warehouse' By Any Other Name*, GRIST (May 25, 2022), https://grist.org/buildings/a-warehouse-by-any-other-name/.

II. THE PROLIFERATION OF LAST-MILE DELIVERY WAREHOUSES

II. THE PROLIFERATION OF LAST-MILE DELIVERY WAREHOUSES

A. The Rise of E-Commerce in Cities

The e-commerce industry – in particular the sale of commercial goods²³ on the internet – has expanded rapidly over the last several years, in part due to the decline of in-store retail shopping during the height of the Covid-19 pandemic, but also due to broader market trends.²⁴ Amazon, which has the largest market share in the e-commerce industry, at 38 percent,²⁵ saw sales spike 36 percent from 2019 to 2020.²⁶ The industry's growth is expected to continue, with the World Economic Forum projecting increases in emissions and traffic congestion of 36 percent by 2030 in many world cities.²⁷

When it comes to e-commerce impacts, the warehouses where goods are stored, sorted, and dispatched are a major contributor to emissions of GHGs and dangerous local air pollution, traffic congestion, and harmful health effects, especially in low-income communities and communities of color.²⁸ While a warehouse building can itself be a source of GHG and other pollution, much of a last-mile delivery warehouse's environmental impact is attributable to the trucks and other vehicles that enter and exit the warehouse site, causing air pollution, increased rates of asthma and other health conditions, noise, traffic, and other harmful effects in surrounding neighborhoods.²⁹

While warehouses are critical jump-off points for "last-mile" deliveries, their impacts are distinct from the lastmile delivery vehicles that travel through residential and commercial areas, which can increase traffic and

²⁷ Id. at 6.

²³ The sale of services on the internet is also considered e-commerce but is not discussed herein because it does not involve physical delivery.

²⁴ See, e.g., Arielle Feger, *How deal-seeking, digital grocery shopping, and other 2023 grocery trends shaped ecommerce in 5 charts,* EMARKETER (Dec. 7, 2023), https://www.insiderintelligence.com/content/how-deal-seeking-digital-grocery-shopping-other-2023trends-shaped-ecommerce-5-charts. See also Mohamed Elhawary, *Top 6 Ecommerce Trends You Need to Know in 2023,* ENTREPRENEUR (Jun. 15, 2023), https://www.entrepreneur.com/growing-a-business/6-ecommerce-trends-you-need-to-know-this-year/452998.

²⁵ Lauren Rosenblatt, Neighborhoods Near Amazon Warehouses Experience More Pollution, GOVERNING (Dec. 20, 2023),

https://www.governing.com/climate/neighborhoods-near-amazon-warehouses-experience-more-pollution, citing INSIDER INTELLIGENCE. ²⁶ The Future of the Last Mile Ecosystem: Transition Roadmaps for Public- and Private-Sector Players, WORLD ECON. FORUM (Jan. 2020), https://www3.weforum.org/docs/WEF_Future_of_the_last_mile_ecosystem.pdf.

²⁸ Aileen Nowlan, *Making the Invisible Visible: Shining a Light on Warehouse Truck Air Pollution*, ENVT'L DEF. FUND (Apr. 2023), https://globalcleanair.org/wp-content/blogs.dir/95/files/2023/04/EDF-Proximity-Mapping-2023.pdf.

²⁹ Kaveh Waddell, When Amazon Expands, These Communities Pay the Price, CONSUMER REPORTS (Dec. 9, 2021),

https://www.consumerreports.org/cars/corporate-accountability/when-amazon-expands-these-communities-pay-the-price-a2554249208/.

emissions but which also have been the subject of electrification efforts and other policy interventions.³⁰ Indeed, many of the city-led and corporate efforts to "green" the e-commerce industry have focused on the actual last-mile delivery rather than on environmentally-harmful warehouses where these trips originate. For example, a handful of U.S. cities have piloted the use of e- cargo bikes for parcel delivery.³¹ In addition, some cities and organizations within them have sought to augment logistics infrastructure through delivery microhubs (or smaller package consolidation centers located closer to delivery destinations) and parcel lockers where residents can pick up packages.³²

More recently, some policy interventions have targeted freight vehicles entering warehouse sites and the warehouses themselves. New rules in California are set to phase out the sale of diesel-powered drayage trucks, among other medium and heavy-duty vehicles over the 2020s and 2030s.³³ Two ports in California - the Ports of Los Angeles and Long Beach – now assess fees for cargo carried on diesel-fueled drayage trucks, and also have voluntary programs in place to scale up ZEV drayage trucks. And in the South Coast Air Quality Management District (SCAQMD) in southern California, a new regulatory regime requires warehouse operators to reduce emissions through a variety of potential compliance measures applicable to the warehouses, the trucks entering and exiting them, and the broader community. Each of these are discussed in more detail herein.

Though California has innovated in this policy space, other jurisdictions are primed to follow suit. Local governments still face legal questions about measures to limit or mitigate environmental impacts from lastmile warehouses and freight delivery vehicles. An explication of the legal hurdles and how to navigate them is necessary to provide cities the confidence and knowledge they need to develop policies that work in their local contexts. This white paper seeks to fill that knowledge gap.

B. E-Commerce Warehouses Have Especially Harmful Impacts to Low-Income Communities and Communities of Color

E-commerce may have ripple effects across the entirety of the urban fabric, but the most acute impacts are felt in the communities surrounding the industry's warehouses and distribution centers. Often, last-mile distribution warehouses are sited in predominantly low-income communities and communities of color – environmental justice communities that experience higher than average levels of environmental and health

³⁰ See discussion of delivery microhubs, parcel lockers, curbside management tactics, and more in *Building healthy cities...*, supra note 21.

³¹ See, e.g., *Mayor Wu Announces "Boston Delivers", an E-Cargo Bike Delivery Pilot Program*, CITY OF BOSTON (Aug. 15, 2023), https://www.boston.gov/news/mayor-wu-announces-boston-delivers-e-cargo-bike-delivery-pilot-program, and *Cargo E-Bike Delivery Pilot Test in Seattle*, URBAN FREIGHT LAB, UNIV. OF WASH. (Aug. 2020), https://urbanfreightlab.com/wp-content/uploads/2023/04/Cargo-E-Bike-Delivery-Report.pdf.

³² Building healthy cities..., supra note 21.

³³ Cal. Advanced Clean Trucks (ACT) Rule, 13 Code Cal. Regs. § 1963 et. seq. (2020).

burden.³⁴ Similar to the clustering of other harmful land uses such as power plants³⁵ and highways³⁶ in or near communities of color and of low-income, the proliferation of last-mile delivery warehouses has followed patterns common in the environmental justice context.³⁷ That is to say, historic practices of interstate highway construction,³⁸ redlining, and discriminatory land use rules has and continues to attract industrial land uses, such as last-mile delivery warehouses, to areas that have become home to communities of color and low-income.³⁹ As ever, the harmful environmental and health impacts of these facilities are disproportionately borne by residents who least reap their benefits.⁴⁰

A growing body of research bears out the disparate siting of last-mile delivery warehouses in low-income communities and communities of color (some of these studies use Amazon warehouses as a proxy for e-commerce warehouses⁴¹ given its 38 percent market share of U.S. e-commerce).⁴² A review of U.S. Census Bureau and U.S. Environmental Protection Agency data by CONSUMER REPORTS found that most Amazon warehouses – 69 percent – "have a greater share of people of color living within a mile radius than the median, or typical, neighborhood in their metro areas."⁴³ Moreover, 57 percent of Amazon warehouses are located in neighborhoods with more low-income residents than the metro area average.⁴⁴ A 2024 report by the Environmental Defense Fund (EDF) found that, in New York State, "Black, Hispanic/Latino and low income populations live near warehouses at rates that are more than 59%, 48% and 42% higher, respectively, than would be expected based on statewide statistics."⁴⁵ This echoes national research by EDF finding that "[n]o state distributed the risk from warehouse[s] evenly," and that in "Illinois, Massachusetts and Colorado, the concentration of Black and Latino residents around warehouses is double what would be expected, given the

https://globalcleanair.org/wp-content/blogs.dir/95/files/EDF-NY1.pdf at 1.

³⁴ Nowlan, *supra note* 28 at 7.

³⁵ Lara J. Cushing et al., *Historical red-lining is associated with fossil fuel power plant siting and present-day inequalities in air pollutant emissions*, NATURE ENERGY (Dec. 15, 2022), https://www.nature.com/articles/s41560-022-01162-y.

³⁶ Gregory M. Rowangould, A census of the US near-roadway population: Public health and environmental justice considerations, 25 TRANSP. RESEARCH PART D: TRANSPORT & ENV'T 59-67 (Dec. 2013).

³⁷ Travis Fried, Rishi Verma & Anne Goodchild, *Ecommerce and environmental justice in metro Seattle*, RSCH. IN TRANSP. ECON. (Mar. 2024) at 2, https://doi.org/10.1016/j.retrec.2023.101382.

³⁸ An E-Commerce Warehouse Boom Imperils Communities of Color. Here's How to Protect Them, THE NEW SCH. CTR. FOR N.Y. CITY AFFAIRS (Nov. 30, 2022), https://www.centernyc.org/urban-matters-2/an-e-commerce-warehouse-boom-imperils-communities-of-color-heres-how-to-protect-them.

³⁹ Warehouse Boom Places Unequal Health Burden on New York Communities, ENV'T DEF. FUND (Jan. 2024),

⁴⁰ See, e.g., "...marginalized populations disproportionately bear ecommerce's environmental costs unequally in metropolitan Seattle despite receiving less home deliveries." Fried et. al., supra note 37.

⁴¹ See, e.g., "Although not the only ecommerce player, Amazon's position as the largest online retailer in Western markets presents a microcosm of logistical strategies that have transformed the last-mile delivery space. Amazon's logistical land use and operations are representative of the whole U.S. ecommerce ecosystem." Id. at 3 citing *Amazon's Share of US eCommerce Sales Hits All-Time High of 56.7% in 2021*, PYMNTS (Mar. 14, 2022), https://www.pymnts.com/news/retail/2022/amazons-share-of-us-ecommerce-sales-hits-all-time-high-of-56-7-in-2021/.

⁴² Rosenblatt, supra note 25.

⁴³ Waddel, supra note 29.

⁴⁴ Id.

⁴⁵ Warehouse Boom, supra note 39, at 1.

state population.⁴⁶ And in metro Seattle (an area that includes Tacoma, Bellevue, and Everett, Washington), a research team at the University of Washington found that "[census] tracts with majority people of color face the highest median concentration of delivery vehicle activity and emissions despite ordering less packages than white populations."⁴⁷

In recent years, advocates have pushed back against the disparate siting48 of last-mile delivery warehouses in cities across the country, from New York (in Sunset Park and Red Hook Brooklyn, the South Bronx, and Queens)⁴⁹ to Chicago (in Bridgeport and Chinatown)⁵⁰ to the far outskirts of Los Angeles (where significant attention has been raised about the proliferation of last-mile warehouses in the area's Inland Empire). In one instance, a dissenting judge on the U.S. Court of Appeals for the Ninth Circuit wrote that the approval of an Amazon warehouse in San Bernardino, California "reek[ed] of environmental racism,"⁵¹ but much of the advocacy around these warehouses has stayed out of the courts, focusing instead on administrative,⁵² legislative,⁵³ and public relations efforts.⁵⁴

⁴⁶ Nowlan, supra note 28 at 7.

⁴⁷ Fried et al., supra note 37 at 1.

⁴⁸ Id. at 2.

⁴⁹ See, e.g., An E-Commerce Warehouse Boom..., supra note 38.

⁵⁰ Courtney Cobbs, *Racial justice and environmental groups hope to block Amazon warehouse in Bridgeport*, CHICAGO STREETSBLOG (Nov. 17, 2020), https://chi.streetsblog.org/2020/11/17/racial-justice-and-environmental-groups-hope-to-block-amazon-warehouse-in-bridgeport.

⁵¹ Dan Churney, *Split appeals panel says Amazon warehouse at San Bernardino airport won't harm air quality; dissenting judge calls out 'environmental racism'*, S. CAL. REC. (Feb. 27, 2023), https://socalrecord.com/stories/639882597-split-appeals-panel-says-amazon-warehouse-at-san-bernardino-airport-won-t-harm-air-quality-dissenting-judge-calls-out-environmental-racism. ⁵² Cobbs, supra note 50.

⁵³ N.Y. Assembly Bill A01718/Senate Bill S02127 (2023).

⁵⁴ See, e.g., BREAKING: Amazon's Air Hub at Newark Airport is Cancelled, CLEAN WATER ACTION (Jul. 7, 2022),

https://cleanwater.org/releases/breaking-amazons-air-hub-newark-airport-cancelled.

III. U.S. FEDERAL LAWS AND LEGAL FRAMEWORKS APPLICABLE TO FREIGHT TRANSPORTATION

III. U.S. FEDERAL LAWS AND LEGAL FRAMEWORKS APPLICABLE TO FREIGHT TRANSPORTATION

U.S. cities have had difficulty regulating freight vehicles and shipments of goods. First, federal law is broadly preemptive of state and local efforts to regulate vehicle fuel economy; air emissions from vehicle tailpipes; and the transportation of goods by motor carriers like freight vehicles under the Energy Policy and Conservation Act⁵⁵ (EPCA), the Clean Air Act (CAA), and the Federal Aviation Administration Authorization Act (FAAAA),⁵⁶ respectively. Each of these sources of federal law preemption can be quite broad, with the contours delineated in case law. In addition, the dormant Commerce Clause of the U.S. Constitution⁵⁷ can limit how states and local governments may regulate in ways that affect interstate commerce; while local governments retain some latitude, they must be mindful of the guardrails set by federal courts. And federal law also sets the terms of tolling federal highways, with potential implications where state or local strategies may seek to toll or otherwise charge for road use.

In other words, federal law considerations shape state and local options for regulating freight shipments, whether through requirements applicable to warehouses, freight vehicles, or last-mile delivery vehicles. As the body of federal law applicable to vehicles, including freight vehicles, is so comprehensive, this white paper begins with a primer on these legal parameters.

A. U.S. Energy Policy & Conservation Act and U.S. Clean Air Act

Federal law may preempt state or local regulation or pricing of freight deliveries on the basis of vehicle fuel economy or air emissions characteristics. In particular, two federal statutes are relevant: EPCA and the CAA. Local requirements that delivery or freight vehicles be electric, or that the drivers or fleet owners of such vehicles purchase electric vehicles (EVs) would be preempted by EPCA, the CAA, or both. In addition, local requirements, incentives or other policy approaches that change the mix of incentives for EVs and other low-emissions vehicles (LEVs) should be considered through the lens of possible federal preemption. While policies will be upheld where they are viewed as true *incentives* for EV or LEV use, policies that are viewed by courts as *de facto mandates* for drivers or fleet owners to purchase EVs or LEVs likely will not be. Despite these two laws' broad preemptive effects, states and local governments do retain significant authority over the emissions characteristics of in-use (i.e., not new) vehicles.

⁵⁵ U.S. Energy Policy & Conservation Act, Publ. L. 94-163, as amended (2022).

⁵⁶ U.S.C. § 14501(c)(1) (2015).

⁵⁷ U.S. CONST. art. I, § 8, cl. 3.

A.1 Local EPCA Preempts State and Local Vehicle Fuel Economy Standards, Including Standards for Vehicle Engine Technology as a Proxy for Fuel Economy

According to Section 509(a) of the EPCA, "a State or political subdivision of a State may not adopt or enforce a law or regulation relating to fuel economy standards or average fuel economy standards for automobiles covered by an average fuel economy standard under this chapter."⁵⁸ In other words, a city could not require delivery or freight vehicles to achieve a minimum mile-per-gallon standard.

Federal case law makes clear that this limitation bars not only numerical fuel economy minimums, but also state and local laws that require the purchase of new hybrid vehicles. Preemption of such standards has been well-explored with respect to municipal requirements that taxicabs be hybrid vehicles (the cases that follow are referred to collectively as the "taxicab cases"). In Boston, city officials mandated that "[e]very vehicle put into service as a taxi" be a hybrid vehicle,⁵⁹ and in New York City, the City set a minimum mile-per-gallon standard for its new taxis.⁶⁰ Both were held to be preempted (or likely preempted, depending on the procedural posture of the case). On the other hand, a King County, Washington program set aside 50 taxicab licenses for use by "hybrid electric vehicles 'with a minimum rating of 40 miles per gallon in the city'" was held by a federal district court to be a "voluntary incentive program," and therefore not a preempted standard.⁶¹ In sum, these federal courts – in Massachusetts, New York and Washington – are in clear agreement that local requirements that taxicabs be hybrids or meet minimum mile-per-gallon standards are not permissible. A court would similarly hold that such a requirement with respect to delivery or freight vehicles are not permissible. No courts have yet considered similar requirements that vehicles be electric, but they would attract significant EPCA preemption scrutiny and would very likely be held preempted by a court.

Moreover, the prohibition on local fuel economy mandates, including mandates that vehicles have hybrid engines, extends to standards that are structured as incentives but that leave vehicle "owners with no rational alternative" to purchasing a hybrid and therefore amount in the court's view to a *de facto* mandate.⁶² In *Metro. Taxicab Bd. of Trade v. City of New York (Metro. Taxicab II)*, the U.S. Court of Appeals for the Second Circuit upheld a preliminary injunction barring from going into effect a New York City program establishing pricing differentials in the maximum lease amount taxicab owners could charge to taxicab operators based on whether or not a taxicab was a hybrid or "clean diesel" vehicle. Although the terms "fuel efficiency" and "fuel economy" did not appear in the law, the court explained that the "equivalency of the term 'hybrid' with 'greater fuel efficiency'... is self-evident."⁶³ *The Green Alliance Taxi Cab Ass'n Inc. v. King County (Green Alliance Taxi)* court (the federal court in Washington state discussed in the previous paragraph) compares the two cases, making clear why the taxi license program at issue in King County did not constitute a *de facto* mandate, noting that the rule there did not require a "taxicab owner to do anything – they can choose to enter the

⁵⁸ 49 U.S.C. § 32919(a) (1994).

⁵⁹ Ophir v. City of Boston, 647 F. Supp. 2d 86, 88 (D. Mass. 2009).

⁶⁰ Metro. Taxicab Bd. of Trade v. City of N.Y., 2008 WL 4866021 (S.D.N.Y. Oct. 31, 2008) (Metro. Taxicab I).

⁶¹ Green All. Taxi Cab Ass'n Inc. v. King Cnty., 2010 WL 2643369 (W.D. Wash. June 29, 2010).

 ⁶² Metro. Taxicab Bd. of Trade v. City of N.Y., 615 F.3d 152, 157 (2d Cir. 2010), cert. denied, 562 U.S. 1264 (2011) (Metro. Taxicab II).
⁶³ Metro. Taxicab II at 157.

program and follow the fuel efficiency rule or refrain from entering the program and not be bound by the rule. Plaintiffs have other means of obtaining taxi licenses, namely purchasing or otherwise transferring them on the open market." The *Metro. Taxicab II* pricing differential, on the other hand, was significant enough to "amount[] to a mandate."⁶⁴

These "taxicab cases" offer important lessons for freight regulation strategies. First, any local requirement that freight or delivery vehicles meet or exceed a fuel economy threshold would be preempted by EPCA. Second, any local requirement that mandates one or more engine-technology types as a proxy for fuel economy would also likely be preempted. Though the existing applicable case law considers requirements for hybrid engines, a requirement that freight or delivery vehicles be electric would, at the very least, attract significant legal scrutiny, and would likely be held preempted by EPCA on the basis of the case law established by the taxicab cases. Third, any incentive aimed at scaling up EVs among delivery or freight vehicles would need to be carefully tailored to not cross the line into a *de facto* mandate. That is, if the rules of an EV program aimed at such vehicles "effectively mandate[s] the use of fuel efficient vehicles through their economic impact,"⁶⁵ they will likely be held preempted by EPCA.

A.2 The Clean Air Act Preempts State and Local Vehicle Air Emissions Standards, Including Standards That Use Vehicle Engine Technology as a Proxy for Air Emissions

The CAA preempts state and local standards limiting air pollution from new motor vehicles. While the CAA relates to air emissions and EPCA to fuel economy, the two laws involve a similar legal analysis. The prohibition on relying on an engine technology proxy and the incentive/mandate dichotomy are present in both laws. Therefore, while it is important to consider separately whether any proposed policy is preempted by EPCA or the CAA, courts often reference both statutes in the applicable case law.

The relevant limitation in Section 209 of the CAA is as follows: "[N]o state or political subdivision thereof shall adopt or attempt to enforce any standard relating to the control of emissions from new motor vehicles or new motor vehicle engines subject to this part."⁶⁶ Section 209(a) is clear on its face that a local government cannot enact a standard – including one relating only to freight or delivery vehicles – that specifically sets an emissions standard for new vehicles. Moreover, applicable case law has held that standards that rely on vehicle engine technology as a proxy for vehicle air emissions are subject to scrutiny under Section 209(a).⁶⁷

The relevant question in determining whether a local law sets an impermissible vehicle or emissions standard or vehicle technology standard is whether such standard is a "command, accompanied by sanctions" to compel the purchase of new low-emissions vehicles (LEVs) or zero-emissions vehicles (ZEVs).⁶⁸ The U.S. Court of Appeals for the Fifth Circuit applied this test in considering whether a Dallas ordinance allowing compressed

⁶⁴ Green All. Taxi at *4.

⁶⁵ Metro. Taxicab II at 158.

⁶⁶ 42 U.S.C. § 7543(a) (1990).

⁶⁷ See, e.g., Engine Mfrs. Ass'n v. S. Coast Air Quality Mgmt. Dist., 541 U.S. 246, 255 (2004).

⁶⁸ Engine Mfrs. Ass'n at 255.

natural gas (CNG) taxis to cut to the head of the airport pick-up line was preempted by CAA Section 209(a).⁶⁹ The court held the Dallas ordinance not preempted. Because the Dallas ordinance "alter[ed] the 'shopping decisions' for traditional cab drivers in determining where in the City to operate... [but did not] effectively compel a particular course of action," the Dallas ordinance amounted to an incentive for taxicabs to transition to CNG vehicles, not a mandate.⁷⁰ While the court upheld the local Dallas law, its saving was not in its use of CNG technology as a proxy for air emissions, but rather that the local law lacked the element of compelling vehicle purchasing behavior based on emissions characteristics.

The lessons to be drawn from Section 209 of the CAA and the related case law are similar to those from the EPCA analysis. First, any local requirement that freight vehicles stay below a maximum emissions threshold would likely be preempted by the CAA. Second, any local requirement that mandates one or more engine technology types as a proxy for air emissions would likely also be preempted by the CAA. Third, any incentive aimed at scaling up EVs among freight vehicles would need to be carefully tailored not to cross the line into a *de facto* mandate, thus inviting preemption under the CAA.

A.2.a State and Local Governments DO Retain Some Authority Over Emissions of In-Use (i.e., Not New) Vehicles

Despite the broad preemptive effect of the CAA, states and local governments have some latitude to limit vehicle emissions. In particular, CAA § 209(d) states that, despite the preemption language, "nothing in this part shall preclude or deny to any State or political subdivision thereof the right to control, regulate, or restrict the use, operation, or movement of registered or licensed motor vehicles."⁷¹ As the Fifth Circuit noted in *Ass'n of Taxicab Operators*, "the longstanding scheme of motor vehicle emissions control has always permitted the states to adopt in-use regulations – such as carpool lanes, restrictions on car use in downtown areas, and programs to control extended idling of vehicles – that are expressly intended to control emissions."⁷²

States and cities therefore retain some authority over local air emissions, particularly through in-use restrictions on vehicles, and a city may want to consider what incentives and in-use restrictions it can offer or enforce for freight vehicles. For example, a designated roadway lane for EVs (on streets where a city has such authority) or access to charging space may have the effect of scaling up electric freight vehicles without mandating a specific engine technology. In addition, it is worth noting that Section 209(a) only states that the CAA preempts state and local standards relating to *new* motor vehicles and motor vehicle engines. Requirements that freight vehicles older than a certain model year be phased out – which in other contexts are used as an imperfect proxy for engine emissions – would not fall under the scope of Section 209(a)

⁶⁹ Ass'n of Taxicab Operators USA v. City of Dallas, 720 F.3d 534 (5th Cir. 2013).

⁷⁰ Ass'n of Taxicab Operators at 542.

⁷¹ 42 U.S.C. § 7543(d) (1990).

⁷² Ass'n of Taxicab Operators at 538 fn. 6.

preemption.⁷³ Similarly, periodic emissions tests for already in-use engines would not be preempted by the CAA (though local authority for this is a question of state law). Despite these allowances, any such in-use restrictions could not be more stringent than federal standards for new vehicles without significant preemption risk.

A.2.b California Waiver to CAA Preemption

Another exception to CAA preemption is for vehicle air emissions standards for which the U.S. Environmental Protection Agency (USEPA) has granted a waiver, an avenue available by statute only to the state of California.⁷⁴ California may set is own vehicle emissions standards more stringent than federal standards and seek a waiver of Clean Air Act preemption from the USEPA under Section 209 of the CAA. Importantly, once California has received such a waiver for one of its standards, any other state with a State Implementation Plan (SIP) in effect under the Clean Air Act for nonattainment areas may adopt the same standard.⁷⁵ Other states who do so do not need USEPA approval. According to CARB, seventeen states (inclusive of California) have adopted one or more of California's standards.⁷⁶ This option is not available to local governments directly.

A.2.c CAA & EPCA: Incentives, Mandates, and De Facto Mandates

While the CAA and EPCA preemption provisions, along with the taxicab cases, offer clear guardrails for states or local governments considering, for example, setting a miles-per-gallon or tailpipe emissions standard for newly sold vehicles within their jurisdictions, for the most part the questions states and local governments encounter are less black-and-white.

A key guiding principle in interpreting CAA and EPCA preemption is whether the government action can reasonably be considered an *incentive* for a driver (or fleet owner or operator) to use low- or zero-emissions vehicles. *Mandates* are clearly and expressly preempted by the applicable CAA and/or EPCA preemption provisions; *incentives* will not be. At the same time, if a court finds a measure that a city intends to be an incentive actually amounts to, in its view, a *de facto* mandate, the measure will be preempted. As discussed above, courts will look to whether the measure leaves vehicle "owners with no rational alternative" to purchasing a ZEV or LEV,⁷⁷ and at whether the measure is a "command, accompanied by sanctions" to compel the purchase of new LEVs or ZEVs.⁷⁸ Merely "alter[ing] the 'shopping decisions'" for drivers or fleet owners and

⁷³ This white paper does not discuss such an age requirement with respect to <u>all</u> vehicles, which could under some circumstances be held to be a taking. Rather, the discussion addresses the strategy's potential to be used with respect to use of vehicles as freight vehicles in a given area.

^{74 42} U.S.C. § 7507 (1990).

⁷⁵ Id.

⁷⁶ States that have Adopted California's Vehicle Regulations, CAL. AIR RES. BD., https://ww2.arb.ca.gov/our-work/programs/advancedclean-cars-program/states-have-adopted-californias-vehicle-regulations (last updated May 2024).

⁷⁷ Metro. Taxicab II at 157.

⁷⁸ Engine Mfrs. Ass'n at 255.

operators is not unlawful,⁷⁹ nor is an optional program that vehicle owners "can choose to enter... and follow the fuel efficiency rule or refrain from entering the program and not be bound by the rule," where other options to use the vehicle for its intended purpose are available.⁸⁰ On the other hand, a city measure that is described as an incentive but effectively requires the purchase of a ZEV or LEV would be pre-empted. In *Ass'n of Taxicab Owners*, it was implicit but presumably important was that taxicabs could still be used as taxicabs, even if they could not cut to the front of the airport line. It would be disingenuous to say that delivery vehicles could be used, for example, as school buses.

As the taxicab cases are the main source of guidance on the mandate/incentive/*de facto* mandate divide, it is not entirely clear where the lines would be drawn for the policy approaches a city might consider with respect to freight vehicles or warehouses. It will be helpful in any policy to ensure that there are reasonably accessible options available for drivers to use fossil-fueled freight vehicles. For example, a zone in which charging or loading access was offered to ZEV trucks in certain areas, but which fossil-fueled vehicles could still drive through, would likely be viewed as an incentive if reviewed by a court. In addition, and as described below in connection with California's Advanced Clean Fleets Rule, there is some interplay between the CAA's preemption provisions,⁸¹ and California's ability under the CAA to obtain a waiver to CAA preemption and effectively share it with other states.⁸² For some policies, mitigating preemption risk will involve both reliance on the California waiver *and* balancing the mandate/incentive distinction for policy aspects not subject to the waiver.

B. U.S. Federal Aviation Administration Authorization Act

The Federal Aviation Administration Authorization Act (FAAAA or F4A) is a broadly preemptive statute that could have implications for any state or local law "related to the price, route, or service of any motor carrier... with respect to the transportation of property."⁸³ Any program considered by a city for controlling freight delivery emissions will need to be considered through the lens of FAAAA preemption; almost by definition city policies will "relate[] to the price, route, or service of... motor carrier[s]" transporting property. As a very general matter, a city may seek to mitigate FAAAA preemption concerns by (1) regulating something other than the price, route, or service of motor carriers or (2) in some instances, relying on a waiver to CAA preemption or including a regulation in a SIP, either of which would bolster the case that the requirement or program is enforceable as a matter of federal law. Neither of these will be fully protective from preemption, but may limit preemption scrutiny.

⁷⁹ Ass'n of Taxicab Operators at 542.

⁸⁰ Green All. Taxi at *4.

⁸¹ 42 U.S.C. § 7543 (1990).

⁸² 42 U.S.C. § 7543(b) (1990) and 42 U.S.C. § 7507 (1990).

⁸³ 49 U.S.C. § 14501(c)(1) (2015).

The FAAAA preempts any "State [or local] law, regulation, or other provision having the force or effect of law related to a price, route, or service of any motor carrier... with respect to the transportation of property."⁸⁴ A "motor carrier" is defined as a "person providing motor vehicle transportation for compensation."⁸⁵ The FAAAA further preempts any state or local "law, rule, regulation, standard, or other provision having the force and effect of law relating to intrastate rates, intrastate routes, or intrastate services of any freight forwarder or broker."⁸⁶ In effect, these provisions mean that cities and states are preempted from many direct and indirect requirements with respect to freight carriers. The FAAAA may preempt state and local rules relating to freight transport and deliveries. Importantly, freight vehicles are subject to overlapping legal requirements and preemption limitations in a way that taxicabs are not (taxicabs do not, for the most part – setting aside services like DoorDash or Uber Eats, for which no firm legal analysis is available – engage in the "transportation of property"). State and local requirements for freight trucks may be subject to EPCA, CAA and FAAAA preemption.

Courts have held local requirements with respect to freight vehicles preempted, including where those requirements were ostensibly contractual and were applicable only within a limited port area. For example, the Port of Los Angeles (an arm of the City) began requiring trucking companies operating within the Port to post placards in their trucks and to develop parking plans for their vehicles.⁸⁷ Those who failed to comply could face fines and even – at least per the terms of the contracts – time in prison. The U.S. Supreme Court held that this related to the "price, route, or service of" motor carriers and was therefore preempted by section 14501(c)(1) of the FAAAA.⁸⁸ The fact that the requirements only attached as part of a Port concession agreement did not save them from preemption because the agreement "functions as part and parcel of a governmental program wielding coercive power over private parties, backed by the threat of criminal punishment. That counts as action 'having the force or effect of law' if anything does."⁸⁹ It appears unlikely that freight decarbonization strategies under consideration by cities and states would involve prison time, but sub-federal jurisdictions will need to consider how "voluntary" their contracts really are.

In another case looking at FAAAA preemption, the Supreme Court struck down a Maine law requiring shippers of tobacco to use a delivery company that would verify the recipients' age and otherwise prohibiting unlicensed tobacco shipments.⁹⁰ More broadly, the Court held that the FAAAA (1) preempts state (and local) actions that have a "connection with" carrier "rates, routes, or services," (2) that preemption may occur even if a state (or local) law has only an "indirect effect on rates, routes, or services," and (3) that preemption occurs

⁸⁴ 49 U.S.C. § 14501(c)(1) (2015).

⁸⁵ 49 U.S.C. § 113102(14) (2018).

⁸⁶ 49 U.S.C. § 14501(b)(1) (2015). A "freight forwarder" "provide[s] transportation of property for compensation and in the ordinary course of its business – (A) assembles and consolidates, or provides for assembling and consolidating , shipments... (B) assumes responsibility for the transportation from the place of receipt to the place of destination; and (C) uses for any part of the transportation a carrier subject to jurisdiction under this subtitle." 49 U.S.C. § 13102(8) (2008).

⁸⁷ Am. Trucking Ass'ns, Inc. v. City of Los Angeles, 569 U.S. 641 (2013).

⁸⁸ Id. ⁸⁹ Id. at 650-51.

⁹⁰ Rowe v. N.H. Motor Transp. Ass'n, 552 U.S. 364 (2008).

where laws have a "significant impact" on Congress' preemption-related aims.⁹¹ Other cases have similarly held the FAAAA to preempt state and local laws, as when a federal district court struck down a Massachusetts state law setting forth when a person delivering property was an employee or an independent contractor, because "the logical effect of [the state law] would at least force a delivery company to charge higher prices that would allow it to recoup these costs and to alter routes that formerly would begin and end at the courier's own residence."⁹² The court there further noted that the "Supreme Court has instructed that 'related to' language... is meant to be construed broadly" and that "[n]either the Supreme Court nor the First Circuit has expressed a view as to 'where it would be appropriate to draw the line' between an impact that is 'significant' as opposed to 'tenuous, remote or peripheral."⁹³

On the other hand, the Second Circuit upheld a state law against FAAAA claims, though in a very limited way that does not have precedential value. In *Omya, Inc. v. Vermont*, the Second Circuit upheld a state permit restriction on the number of daily trips a truck could make to a quarry, holding that it was a land use statute aimed at protecting environmental resources rather than one aimed at economic protectionism.⁹⁴ While the Second Circuit is a federal appellate court, court opinions that are "unpublished" – as *Omya* is – may generally not be relied on as precedent, though a court may take such an opinion to have persuasive value. Further, the court's *Omya* reasoning is not one that appears broadly in case law – it emphasizes that the FAAAA's preemption provisions were meant to "target[] state economic regulation – i.e., regulation designed to regulate competition" based on the court's reading of the FAAAA's legislative history.⁹⁵ Though *Omya's* value is limited, a city or state may consider whether it wishes to structure a law as a "land use statute intended 'to protect [the state's] environmental resources," where such law[] do[es] "not speak directly to prices, routes, or services of motor carriers."⁹⁶ Note that this holding is limited – the Supreme Court has held that state and local laws that only indirectly affect prices, routes or services of motor carriers can be preempted by the FAAAA.⁹⁷

The FAAAA has a preemption savings clause for state and local size and weight restrictions: the law "shall not restrict... the authority of a State to impose highway route controls or limitations based on the size or weight of the motor vehicle or the hazardous nature of the cargo."⁹⁸ Courts have upheld restrictions relating to vehicle size and weight on this basis.⁹⁹ This size-and-weight authority means that states and local governments (subject to state law if relevant) can set truck routes, tolls, or other traffic restrictions based on weight. This gives a city some flexibility to regulate deliveries, but relatively little.

⁹¹ Id.

⁹² Mass. Delivery Ass'n v. Healey, 177 F. Supp. 3d 86, 92 (2015).

⁹³ Id. at 90, quoting Tobin v. Fed. Express Corp., 775 F.3d 448, 454 (1st Cir. 2014) and Morales v. Trans World Airlines, Inc., 504 U.S. 374 (1992).

⁹⁴ Omya, Inc. v. Vt., 33 Fed. Appx. 581 (2d Cir. 2002).

⁹⁵ Id. at 583.

⁹⁶ Id. at 584.

⁹⁷ Rowe v. N.H. Motor Transp. Ass'n.

⁹⁸ U.S.C. § 14501(c)(2)(A) (2015).

⁹⁹ E.g., California Dump Truck Owners Ass'n v. Davis, 302 F. Supp. 2d 1139 (E.D. Cal. 2002).

The FAAAA represents a significant legal framework that bears on any freight regulation proposals. Each of the three policy approaches discussed below – phasing out fossil-fueled drayage trucks, an indirect source rule targeting warehouses, and, if sufficiently "mandatory," a zero-emissions delivery zone has the potential to "relate[] to the price, route, or service of [a] motor carrier... with respect to the transportation of property."¹⁰⁰ For example, a requirement that a drayage truck be retired earlier than its owner might otherwise choose, and replaced with a zero-emissions truck at a potentially greater cost could run afoul of the "price" aspect of FAAAA preemption under Section 601. Similarly, if a warehouse were to turn certain trucks away in order to comply with an indirect source rule, this could change the "route, or service" of those trucks. In order to defend these rules against FAAAA preemption challenges, the regulating party will need to consider the impacts such rules could have with respect to the price, route, or service of motor carriers. In some instances, framing regulations as size or weight restrictions could be a viable option for avoiding FAAAA preemption, though such restrictions will not exclude fossil-fueled vehicles.

C. Dormant Commerce Clause

The Constitution's Commerce Clause assigns authority to "regulate commerce… among the several states" to the federal government.¹⁰¹ The flip side of the Commerce Clause is the implied "dormant" Commerce Clause (dCC), which prohibits states (and by extension localities) from discriminating against interstate commerce with "regulatory measures designed to benefit in-state economic interests by burdening out-of-state competitors."¹⁰² As used in the dCC context, "discrimination' simply means differential treatment of in-state and out-of-state economic interests that benefits the former and burdens the latter."¹⁰³ A few points of analysis relevant to the policy approaches discussed in this white paper are below.

C.1 Main dCC Tests: Per Se Invalidity and Pike Balancing

When courts assess whether a state or local law violates the dCC, they conduct a two-part inquiry. First, if a state or local policy discriminates against interstate commerce (as defined above) with more than "incidental" effects on interstate commerce, it will be presumed "per se invalid."¹⁰⁴ For example, in *Or. Waste Systems, Inc. v. Department of Envtl. Quality of Or.*, the Supreme Court found an Oregon surcharge on waste generated out-of-state and disposed of in Oregon to be per se invalid.¹⁰⁵ Second, if a law is presumed discriminatory, the presumption of invalidity may be overcome by showing that (1) the law is not related to economic protectionism and (2) there are no nondiscriminatory alternatives available.¹⁰⁶ Where there is no "per se discrimination," but an "evenhanded[]" regulation has incidental effects on interstate commerce, the court will

¹⁰⁰ 49 U.S.C. § 14501(c)(1) (2015).

¹⁰¹ U.S. Const. art. I, § 8, cl.3.

¹⁰² Wyoming v. Oklahoma, 502 U.S. 437, 454 (1992).

¹⁰³ Or. Waste Sys., Inc. v. Dep't. of Env't Quality of Or., 511 U.S. 93, 99 (1994).

¹⁰⁴ Or. Waste Sys. at 99.

¹⁰⁵ Id.

¹⁰⁶ Wyoming v. Oklahoma, 502 U.S. at 454.

apply what is termed the "*Pike* balancing test," sustaining the law "unless the burden imposed on such commerce is clearly excessive in relation to the putative local benefits."¹⁰⁷ This is the kind of analysis to which many state and local policies are subject. (Notably, if a city were to regulate freight or trucks originating out of state more harshly than local trucks, or to regulate *only* out-of-state freight or trucks, the less permissive per se invalidity test would likely apply.)

C.2. State or local Government-Imposed User Fees and the dCC: Variation of the Pike Balancing Test

Many types of user fees have been upheld in the face of dCC scrutiny. Road tolls are ubiquitous and usually do not give rise to dCC claims. Where they do, many have been upheld.¹⁰⁸ When assessing the constitutionality of fees, courts apply a version of the *Pike* balancing test applicable when a state or local government charges for the use of facilities it provides to those engaged in interstate commerce: "a levy is reasonable... if it (1) is based on some fair approximation of the use of the facilities, (2) is not excessive in relation to the benefits conferred, and (3) does not discriminate against interstate commerce."¹⁰⁹ In light of this case law, any efforts to price freight transportation by out-of-state entities or trucks must be tied to the value provided; that is, a fee should generally compensate a state or local government for the services it provides (e.g., use of the roadway).

An example of a fee that was struck down on the basis that it failed to satisfy prongs (1) and (2) was a fee for passenger trips on a ferry from Bridgeport, Connecticut to Port Jefferson, New York. While the U.S. Court of Appeals for the Second Circuit deemed the ferry trip fee non-discriminatory, it held that because the fee funded other port district activities like harbor dredging, it was both excessive and funded services completely unrelated and unavailable to the fee payers."¹¹⁰ While a fee should be based on "some fair approximation" of the value of the service provided, it needn't be a perfect match: "so long as the toll is based on some fair approximation of use or privilege for use... it will pass constitutional muster, even though some other formula might reflect more exactly the relative use of the state facilities by individual users."¹¹¹ For example, the Supreme Court upheld user fees even though they did not perfectly apportion fee amounts among airlines and airport concessionaires.¹¹² Fees or charges for freight transport could arguably be tied to a "fair approximation of use" if they internalize freight transportation externalities.

C.3. "Flat" road use taxes subject to different dCC test under American Trucking Ass'ns v. Scheiner

Fees on freight transportation that are not assessed as tolls need to be carefully structured to avoid offending interstate commerce. In particular, courts have taken issue with "flat" taxes – that is, taxes or fees that trucks

¹⁰⁷ Pike v. Bruce Church, Inc., 397 U.S. 137, 142 (1970).

¹⁰⁸ Cohen v. R.I. Turnpike & Bridge Auth., 775 F. Supp. 2d 439, 447 (D.R.I. 2011); Janes v. Triborough Bridge & Tunnel Auth., 97 F. Supp. 2d 320 (S.D.N.Y. 2013).

¹⁰⁹ Nw. Airlines, Inc. v. Cnty. of Kent, Mich., 510 U.S. 355, 369 (1994); Evansville-Vanderburgh Airport Auth. Dist. v. Delta Airlines, Inc., 405 U.S. 707, 716-17 (1972).

¹¹⁰ Bridgeport & Jefferson Steamboat Co. v. Bridgeport Port Auth., 567 F.3d 86, 88 (2d Cir. 2009).

¹¹¹ Evansville-Vanderburgh Airport, 405 U.S. at 716-17, quoted in Nw. Airlines, 510 U.S. at 362-63.

¹¹² Nw. Airlines.

or other vehicles must pay to access a state's roads. Even where these flat taxes are identical for in-state and out-of-state vehicles, they may violate the dCC because an in-state vehicle, which presumably drives much more on the state's roads, gets more value for the same price (in other words, the flat fee is not tied to the service provided, road usage, because out-of-state vehicles pay more on a per-mile basis). For example, in American Trucking Ass'ns v. Scheiner, the U.S. Supreme Court struck down a marker fee (a sort of registration fee for any truck – registered in Pennsylvania or elsewhere – to drive on Pennsylvania's roads) and a per-axle fee paid annually for each truck that drove through the state. While these charges were facially the same for trucks registered in Pennsylvania and those registered elsewhere, the Court struck them down because the privilege exchanged for the taxes were "several times more valuable to a local business than to its out-of-state competitors."¹¹³ The Court also held that the Pennsylvania charges did not pass the "internal consistency test," which considered the impacts on interstate commerce if multiple jurisdictions were to enact the same type of requirement, writing, "[i]f each State imposed flat taxes for the privilege of making commercial entrances into its territory, there is no conceivable doubt that commerce among the States would be deterred."¹¹⁴ The Court's ruling does not disallow flat taxes in all circumstances, noting that they may be imposed "when they are the only practicable means of collecting revenues from users and the use of a more finely gradated user fee schedule would pose genuine administrative burdens."¹¹⁵ Measuring road usage was not deemed to pose such an administrative burden.

What this "flat" tax case law means for freight pricing is that legal risks might attach to, for example, the charging of an annual fee (beyond perhaps a nominal registration amount) for a truck to access certain warehouses or to deliver freight to a city's streets within a ZEDZ. Doing so would expose a local or state government to legal risk under the dCC because such a fee treats local trucks that make frequent deliveries more favorably than those that are based far away and make use of the Zone's streets only sporadically.

D. U.S. Federal Highway Administration and Road Tolling

Tolls or other projects on federal-aid highways (roads eligible for Federal Highway Administration (FHWA) funding, "other than local road[s] or rural minor collector[s]")¹¹⁶ must comply with U.S.C. Title 23 (Highways). A key question, therefore, is whether any area subject to a planned freight program falls or encompasses all or part of any "federal-aid highway." If this is the case, federal law considerations will become an issue – in particular, with respect to the ability to toll federal roads. Local authority to toll federal-aid highways is limited without express approval from the FHWA, whether or not through a special program like the (no longer funded

¹¹³ Am. Trucking Ass'ns v. Scheiner, 483 U.S. 266, 267 (1987).

¹¹⁴ Id. at 284.

¹¹⁵ Id. at 296.

¹¹⁶ 23 U.S.C. §101(a)(6) defines a "Federal-aid highway" as "a public highway eligible for assistance under this chapter other than a highway functionally classified as a local road or rural minor collector." "Highway" is a broad term that includes roads, streets, parkways, rights-of-way, bridges, tunnels, and more. *Id.* §101(a)(11). Federal-aid highways comprise approximately one-quarter of public roads in the *United States. Federal-Aid Highway Program (FAHP): In Brief* R44332, *Cong. RscH Serv.* at 1 (Mar. 1, 2021), https://fas.org/sgp/crs/misc/R44332.pdf.

but still operational) Value Pricing Pilot Program¹¹⁷ and other statutory grant programs.¹¹⁸ Otherwise, states may assess tolls on federal-aid highways only allowed upon their construction or reconstruction and only in accordance with federal law.¹¹⁹

This brief discussion is included because some strategies to regulate freight trucks could involve tolling on federal highways, including those that are technically designated as federal highways but effectively function as city streets. Note that many states also have jurisdiction over road tolling, effectively limiting or preempting local governments from charging for road use. In such a case, the tolling of a city's streets would need state enabling legislation. In all instances the viability of road tolling will need to be assessed through the lens of applicable federal and state laws.

E. Local Authority Under State Law

Where a local government, rather than a state, is the jurisdiction seeking to regulate or limit freight vehicle pollution, questions of legal authority under state law will arise alongside the more universal federal law considerations. Because there are fifty different states' bodies of law, with even more variation among local jurisdictions within each state, this subpart discusses in only very general terms the relevant state law questions.

For one, a local government must determine what authority it has vis-à-vis state law to regulate air pollution. If a state retains all authority over air pollution regulation, localities will likely be unable to regulate the air emissions characteristics of warehouses (though state law should be reviewed carefully to determine if there are pathways forward). Many states, however, delegate some level of authority over air emissions to local governments, or establish (or allow for the establishment of) regional air authorities. Similar questions will arise with respect to whether a local government has authority to impose taxes and fees and whether a state court would view a WAIRE-style mitigation fee as a fee rather than a tax or other charge for which a local government may not have authority. Local governments, along with states, will also need to determine whether their existing law allows them to establish a WAIRE-style program through regulatory action or if legislation will be needed.

¹¹⁷ Value Pricing Pilot Program, U.S. DEP'T OF TRANSP. FED. HIGHWAY ADMIN., https://ops.fhwa.dot.gov/congestionpricing/value_pricing/ (last visited June 6, 2024).

¹¹⁸ See, e.g., the 23 U.S.C. § 133 surface transportation blog grant program and 23 U.S.C. § 149, a congestion mitigation and air quality improvement program.

¹¹⁹ 23 U.S.C. § 129 (2021).

IV. CALIFORNIA'S ADVANCED CLEAN FLEETS (ACF) RULE AND OTHER DRAYAGE TRUCK APPROACHES

IV. CALIFORNIA'S ADVANCED CLEAN FLEETS (ACF) RULE AND OTHER DRAYAGE TRUCK APPROACHES

One category of approaches a state or city might take to reduce the impact of warehouses or e-commerce distribution centers involves reducing GHG and local air pollution from the drayage vehicles that serve these facilities. Drayage trucks are (often) short-haul vehicles that transport freight from its point of arrival at a seaport or railyard to the next phase of its (generally over-road) journey, or vice-versa to its point of departure at such a seaport or railyard following its domestic over-road journey.¹²⁰ Generally, local governments will not be the primary regulators for drayage trucks; if California's Advanced Clean Fleets Rule (ACF) rule is granted a waiver from preemption by the USEPA (as discussed below), only states will be able to adopt it under Section 177 of the CAA. A city seeking to have ACF in place within its jurisdiction would have to work with the state to adopt the rule statewide.

This Part looks at part of ACF aimed at phasing out fossil-fueled drayage trucks at ports and railyards in California, along with a few other efforts to limit drayage truck emissions, also in California. These regulatory programs (with the exception of JETSI, described in subpart IV.F, which is purely voluntary) involve transitioning these vehicle fleets from diesel-powered to electric or hydrogen. Such measures may be viewed by courts as a proxy for vehicle emissions and, possibly, fuel economy standards. Accordingly, the potential for preemption by the CAA, EPCA, and the FAAAA must be considered. While federal preemption concerns cannot be ruled out entirely, strategic policy design can mitigate preemption scrutiny. Two aspects of program design that can help mitigate preemption scrutiny include (1) pursuing a Clean Air Act waiver from the USEPA for ACF (which, if granted, may also adopted by other states); and (2) avoiding the regulation of new (as opposed to in-use) vehicles.

A. Advanced Clean Fleets (ACF) Rule for Drayage Trucks

In April 2023, the California Air Resources Board (CARB) adopted the Advanced Clean Fleets (ACF) rule,¹²¹ which includes rules for drayage trucks operating in the state.¹²² The ACF implements Gov. Newsom's Executive Order (EO) N-79-20, which set a goal for 100 percent zero-emission drayage trucks in the State by 2035 and ordered CARB to develop "regulations requiring increasing volumes of new zero-emissions trucks... sold and

¹²⁰ See Advanced Clean Fleets Regulation - Drayage Truck Requirements, CAL. AIR RES BD. (Sept. 22, 2023),

https://ww2.arb.ca.gov/resources/fact-sheets/advanced-clean-fleets-regulation-drayage-truck-requirements.

¹²¹ 13 Cal. Code Regs. § 2014 et. seq. (2023).

¹²² The others are (1) requirements for state and local government fleets, 13 Cal. Code Regs. § 2013 (2023) ; (2) requirements for certain "high-priority fleets," 13 Cal. Code Regs. § 2015 (2023); and (3) a mandate that, as of 2036, medium- and heavy-duty vehicle manufacturers sell only ZEVs, 13 Cal. Code Regs. § 2016 (2023).

operated in the State... [and] for all drayage trucks to be zero-emission by 2035."¹²³ CARB points to the environmental justice benefits of the drayage rules, noting that the affected ports and railyards are "all located within about 1 mile of a disadvantaged community,"¹²⁴ though this does not appear to have any particular legal significance here.

The ACF rule requires the registration of all drayage trucks that operate in California in a CARB Online System, and through 2023 allowed only trucks with a model year of 2010 or newer, or trucks with equivalent or better emissions controls, to register. Per the terms of the Rule, as of January 1, 2024, only zero-emissions drayage trucks (either battery electric or hydrogen) may be registered as new vehicles in the Online System.¹²⁵ (As discussed later, CARB is presently declining to enforce this restriction).¹²⁶ For diesel-fueled trucks registered before 2024, trucks are required to be retired (at least for purposes of use as a drayage truck in California) upon the earlier of when they reach 800,000 miles or when the engine is eighteen years old (engines may be used for a minimum of thirteen years of useful life under the CARB system, further establishing that the ACF Rule does not regulate new motor vehicles or motor vehicle engines, as expressly preempted by the CAA).¹²⁷ Beginning in 2035, all diesel-fueled trucks will have been phased out of the CARB system and only zeroemission drayage trucks will be permitted.¹²⁸ Other requirements include that trucks visit a California railyard or seaport once per year to remain in good stead under the California system.¹²⁹ Failure to make one such visit each year results in the removal of the vehicle from the CARB system, such that it can no longer be used at these sites.¹³⁰ Certain exceptions apply: vehicles damaged beyond repair in an accident may be replaced by a diesel engine of the same or newer model year and stay in place until the original vehicle would have been retired;¹³¹ limited extensions are available for ZEVs that have been ordered but not yet delivered;¹³² and extensions are available for delays in construction of needed charging infrastructure.¹³³

B. Legal Challenges and CARB Request for USEPA Waiver

B.1. Litigation and Regulatory Activity with Respect to CAA Preemption in 2023 and 2024

¹²⁴ See Advanced Clean Fleets Regulation - Drayage Truck Requirements, supra note 120.

¹²³ Cal. E.O. N-79-20 (Sept. 23, 2020). This Executive Order also set goals that "100 percent of in-state sales of new passenger cars and trucks will be zero-emission by 2035" and that "100 percent of medium- and heavy-duty vehicles in the State be zero-emission by 2045 for all operations where feasible" and directs CARB to develop regulations in accordance with these goals.

¹²⁵ 13 Cal. Code Regs. § 2014.1(a)(1)(A) (2023).

¹²⁶ Advanced Clean Fleets Regulation: ENFORCEMENT NOTICE, CAL. AIR RES. BD. (Dec. 28, 2023), https://ww2.arb.ca.gov/sites/default/files/2023-12/231228acfnotice ADA.pdf.

¹²⁷ 13 Cal. Code Regs. § 2014.1(a)(1)(C) (2023).

¹²⁸ 13 Cal. Code Regs. § 2014.1(a)(2)(A) (2023).

¹²⁹ 13 Cal. Code Regs. § 2014.1(a)(1)(B) (2023).

¹³⁰ Id.

¹³¹ 13 Cal. Code Regs. § 2014.1(a)(8)(H) (2023).

^{132 13} Cal. Code Regs. § 2014.1(a) (2023).

¹³³ 13 Cal. Code Regs. § 2014.2(b) (2023).

The ACF Rule has the potential to be preempted by the CAA or the FAAAA,¹³⁴ in whole or in part. The question of federal preemption is playing out before the USEPA and in court. In October 2023, the California Trucking Association (CTA) sued CARB in the U.S. District Court for the Eastern District of California seeking to invalidate ACF. In its complaint, the suit outlines four broad ways in which plaintiffs allege ACF is unlawful: (1) preemption by the CAA; (2) preemption by the FAAAA; (3) violation of the dormant Commerce Clause; and (4) violation of due process rights under the Fifth and Fourteenth Amendments.¹³⁵

The following month, November 2023, CARB submitted a request to USEPA to issue a CAA Section 209 waiver for ACF or to clarify that no waiver is needed.¹³⁶ While Section 209 preempts a broad swath of state and local standards "relating to the control of emissions from new motor vehicles or new motor vehicle engines,"¹³⁷ California's unique ability to obtain a waiver from USEPA and share that waiver with other states on an opt-in basis shields standards for which a waiver from preemption has been granted.¹³⁸ However, even if the USEPA grants the requested waiver, local governments in states that do not also adopt ACF will not be able to rely on that waiver, and any analogous requirements adopted by local governments in those states could be subject to preemption scrutiny.

For the time period before a waiver is granted (or USEPA determines no waiver is required), CARB appears to be insulating itself from preemption challenges by declining to enforce many aspects of ACF. The agency issued an enforcement notice in the last days of December 2023 stating that it "will not take enforcement action as to the drayage fleet reporting requirements or registration prohibitions until USEPA grants a preemption waiver or determines a waiver is not necessary."¹³⁹ Despite this period of non-enforcement, CARB has not suspended the ACF Rule itself and "reserves all of its rights to enforce the ACF regulation in full for any period for which a waiver is granted or for which a waiver is determined to be unnecessary, including (but not limited to) the right to remove non-compliant vehicles added to fleets while the waiver request is pending."¹⁴⁰ Further, the notice "encourages fleets to voluntarily report and comply while the waiver request is pending" and notes that fleet owners that add new internal combustion engine vehicles to their drayage fleets beginning in 2024 will receive

¹³⁴ See, e.g., Am. Trucking Ass'ns, Inc. v. City of Los Angeles, 569 U.S. 641 (2013).

¹³⁵ COMPLAINT FOR DECLARATORY JUDGMENT AND INJUNCTIVE RELIEF, Cal. Trucking Ass'n v. Cal. Air Resources Bd., No. 2:23-cv-02333-TLN-CKD (E.D. Cal. Oct. 16, 2023).

¹³⁶ Clean Air Act § 209(b) Waiver And § 209(e) Authorization Request Support Document Submitted by the California Air Resources Board, submitted to U.S. Env't Protection Agency (Nov. 15, 2023) (hereinafter referred to as "CAA § 209(b) Waiver Support Document"), available at https://www.epa.gov/system/files/documents/2023-12/ca-waiver-carb-req-acf-2023-11-15.pdf. CARB's waiver request was accompanied by a request for an authorization under CAA § 209(e) for certain elements of the ACF that are not relevant here, and are therefore not discussed.

^{137 42} U.S.C. § 7543(b) (1990).

¹³⁸ According to CARB, seventeen states (inclusive of California), plus Washington, D.C., have adopted one or more of California's standards: California, Colorado, Connecticut, Maine, Maryland, Massachusetts, Minnesota, Nevada, New Jersey, New Mexico, New York, Oregon, Pennsylvania, Rhode Island, Vermont, Virginia and Washington. *States that have Adopted Cal.'s Vehicle Regs*, Cal. Air Resources Bd. (last updated May. 2024), https://ww2.arb.ca.gov/our-work/programs/advanced-clean-cars-program/states-have-adopted-californias-vehicle-regulations. Also according to CARB, Colorado, Maryland, Massachusetts, New Jersey, New Mexico, New York, Oregon, Rhode Island, Vermont and Washington have adopted the most recent of such standards, the ACT Rule. Id. ¹³⁹ *Advanced Clean Fleets Regulation: ENFORCEMENT NOTICE*, supra note 126.

a notice stating that such vehicles "may be restricted from performing drayage services once the U.S. Environmental Protection Agency grants California a waiver."¹⁴¹

CARB appears to rely on two broad theories in defending the lawfulness of ACF. For one, CARB is seeking a waiver for the aspects of ACF that USEPA determines require one. Second, CARB has asserted that it is within its authority to promulgate ACF, and while it is seeking a Section 209 waiver it continues to maintain that elements of ACF – particularly the drayage rules – do not require one.¹⁴² Thus, CARB is approaching preemption from both sides – insisting that the drayage truck rules are lawful but seeking a Section 209 waiver from USEPA in case the agency or a court disagrees.

In February 2024, CTA had its suit voluntarily dismissed without prejudice.¹⁴³ While secondhand reporting on these events is limited, it stands to reason that CTA may challenge ACF once again if USEPA grants the rule a waiver, this time arguing that any such waiver is unlawful. In the meantime, two additional suits have been filed in federal court challenging the ACF rule. In April 2024, the American Free Enterprise Chamber of Commerce sued the CARB administrator in the U.S. District Court for the Eastern District of California alleging that ACF is preempted by the CAA, EPCA (referred to in the complaint by a law that amended EPCA, the Energy Independence and Security Act of 2007¹⁴⁴), and the FAAAA.¹⁴⁵ The complaint also contends that an EPA waiver "would have no operative effect on the validity of the drayage rule [because the] rule was adopted as a state law without a waiver, and so is void *ab initio*."¹⁴⁶ In May 2024, seventeen states, led by Nebraska, and the Nebraska Trucking Association filed suit – also in the Eastern District of California – against CARB's administrator. This suit alleged preemption by the CAA and FAAAA and violation of the dormant Commerce Clause. Each of these suits are in their very early stages and may evolve as the USEPA reviews CARB's waiver request.¹⁴⁷

B.2. Implications of a Potential USEPA Waiver to CAA Section 209 Preemption

A waiver under Section 209(b) of the CAA would mitigate preemption concerns under other federal statues as well. When USEPA grants a waiver to a California standard, the standard takes the effect of federal regulation, meaning that preemption (i.e., the bar on a lower level of law by a higher level of law) is no longer the apposite question. Federal courts that have considered the issue have held that preemption by federal law "is not implicated when federal laws conflict with one another. In such a case courts have a duty to give effect to

¹⁴¹ Id.

¹⁴² CAA § 209(b) Waiver Support Document at 19-20, supra note 136.

¹⁴³ NOTICE OF VOLUNTARY DISMISSAL OF DEFENDANT CAL. AIR RES. BD., Cal. Trucking Ass'n v. Cal. Air Res. Bd. ("CTA v. CARB"), No. 2:23-cv-02333-TLN-CKD (E.D. Cal. Feb. 29, 2024).

^{144 42} U.S.C. ch. 152 § 17001 et seq.

¹⁴⁵ COMPLAINT FOR DECLARATORY JUDGMENT AND INJUNCTIVE RELIEF, Am. Free Enterprise Chamber of Commerce v. Cliff, 2:24-at-0040 (E.D. Cal. Apr. 1, 2024).

¹⁴⁶ Id. at 50.

¹⁴⁷ COMPLAINT FOR DECLARATORY JUDGMENT AND INJUNCTIVE RELIEF, Neb. v. Cliff, 2:24-cv-10364-JAM-CKD (E.D. Cal. May 15, 2024).

both provisions, if possible."¹⁴⁸ Moreover, "[i]n *Massachusetts v. EPA* the Supreme Court found overlap but no conflict between EPA's authority to regulate greenhouse gases from new motor vehicles under the CAA... and [the National Highway Traffic Safety Administration (NHTSA)'s] authority under EPCA to promote energy efficiency by setting mileage standards."¹⁴⁹ While the harmonization of CAA Section 209(b) and FAAAA Section 14501(c)(1) does not appear to have been considered in significant case law, the analysis regarding preemption – that regulations that have obtained Section 209(b) waivers have the effect of federal regulation and therefore should not be preempted by another federal statute – would apply here as well. It is worth noting that the applicability of Section 209(b) waivers and their relation to EPCA Section 509(a) preemption is the subject of litigation presently before multiple federal courts, as described in the next paragraph. For the moment, however, the law remains that a waiver of CAA Section 209 preemption is likely to protect from preemption by at least some other federal laws.

The ACF Rule will likely face future litigation if the USEPA grants the requested waiver. In that case, a different set of claims may result – specifically, parties opposing the ACF Rule would likely challenge the granting of USEPA's waiver. The CTA previewed some of these claims in its 2023 complaint, where it argued that ACF does not meet the requirements for a Section 209 waiver and posited that a waiver for ACF would run afoul of the "major questions doctrine."¹⁵⁰ Similar questions relating to the validity of separate California waivers, for the state's Advanced Clean Cars Rule¹⁵¹ and Advanced Clean Trucks Rule,¹⁵² are at issue in *Ohio v. EPA*¹⁵³ and *Western States Trucking Ass'n v. EPA*,¹⁵⁴ respectively. (*Western States Trucking* is presently held in abeyance pending Supreme Court decisions in Ohio v. EPA and another case, Texas v. EPA.¹⁵⁵)¹⁵⁶ It stands to reason that, if USEPA grants the requested waiver for ACF, a larger number of plaintiffs would join in litigation efforts seeking to invalidate it.

C. Avoiding Preemption by Federal Law in the Absence of an EPA Waiver

C.1. Strategies to Avoid the Regulation of New Trucks

¹⁴⁸ Green Mountain Chrysler Plymouth Dodge Jeep v. Crombie, 508 F. Supp. 2d 295, 343–44 (D. Vt. 2007), citing U.S. v. Borden Co., 308 U.S. 188, 198 (1939); and Radzanower v. Touche Ross & Co., 426 U.S. 148, 155 (1976).

¹⁴⁹ Green Mountain Chrysler Plymouth Dodge Jeep v. Crombie at 344.

¹⁵⁰ COMPLAINT FOR DECLARATORY JUDGMENT AND INJUNCTIVE RELIEF, CTA v. CARB (Oct. 16, 2023).

¹⁵¹ California State Motor Vehicle Pollution Control Standards; Advanced Clean Car Program; Reconsideration of a Previous

Withdrawal of a Waiver of Preemption; Notice of Decision, ENV'T PROTECTION AGENCY, 87 Fed. Reg. 14332 (Mar. 14, 2022).

¹⁵² Cal. Advanced Clean Trucks (ACT) Rule, 13 Code Cal. Regs. § 1963 et. seq. (2020).

¹⁵³ Ohio v. U.S. Envt. Protection Agency, No. 22-1081. (D.C. Cir. 2022). Opinion issued Apr. 9, 2024.

¹⁵⁴ Western States Trucking Ass'n v. Env't Protection Agency, No. 23-1143 (D.C. Cir. 2023).

¹⁵⁵ State of Tex. v. U.S. Envt. Protection Agency, No. 22-1031, et. al. (D.C. Cir. 2022).

¹⁵⁶ ORDER, Western States Trucking Ass'n v. Env't Protection Agency (Dec. 21, 2023). See also Alex Nieves, *Court pauses suit challenging Cal. Truck emissions waiver*, GREENWIRE (Dec. 22, 2023).

As discussed above, the Clean Air Act preempts state and local standards "relating to the control of emissions from *new* motor vehicles or *new* motor vehicle engines" (emphasis added).¹⁵⁷ The ACF Rule's provisions on drayage trucks are careful to, at least facially, regulate only trucks and truck engines already in use. Any drayage truck could have been registered in the CARB system before the December 31, 2023 deadline. Once registered, a truck has between thirteen and eighteen years of useful life. During those years, truck operators are subject to relatively non-substantive requirements like reporting and making one visit to a California port or intermodal railyard each year. The Clean Air Act specifies that its preemption provisions do not "preclude or deny to any State or political subdivision thereof the right otherwise to control, regulate, or restrict the use, operation, or movement of registered or licensed motor vehicles,"¹⁵⁸ and the ACF Rule drayage requirements are not unlike other state and local requirements for in-use vehicles like yearly registration and tailpipe emissions tests. Moreover, the ACF Rule has several exceptions to its prohibition on new fossil-fueled trucks and truck engines, including for damage and for delays in vehicle delivery. These exceptions likely do not offer legal protection from preemption claims, but they may ease concerns from the regulated parties.

While the ACF Rule has been somewhat insulated from preemption challenge by primarily regulating and phasing out existing vehicles, one aspect does appear more vulnerable: the prohibition on registering any diesel-fueled drayage trucks in the CARB online system as of 2024. This could be viewed as a "control of emissions from new motor vehicles," as expressly preempted by CAA Section 209. Preemption concerns may be mitigated by the several months' lead time drayage operators of existing diesel-power trucks have to register their trucks in the CARB system, truck owners' ability to use their non-ZEV trucks for activities other than drayage (in other words, the ability to use a truck for drayage purposes could potentially be viewed as an incentive), and by the Rule's overall regulatory focus on in-use trucks rather than new ones, but such concerns cannot be eliminated.

C.2. FAAAA Considerations

The FAAAA jurisprudence can be quite broad, having held preempted even seemingly minor requirements like verifying the age of recipients of tobacco shipments.¹⁵⁹ The fullest form of protection against FAAAA preemption would be to obtain a CAA Section 209 waiver, which would require courts to harmonize the FAAAA with CAA Section 209, if possible, rather than find preemption by the FAAAA.¹⁶⁰ An ACF-style program with respect to drayage trucks could be designed to pass muster under the FAAAA, but the analysis will be fact-specific, and potentially subject to significant FAAAA scrutiny. In particular, a 2013 U.S. Supreme Court decision in American Trucking Associations, Inc. v. City of Los Angeles¹⁶¹ is likely to loom large in the event of a challenge. There, the Port of Los Angeles – a division of the city – required trucking companies operating in the

¹⁵⁷ 42 U.S.C. § 7543(a) (1990). "The term 'new motor vehicle' means a motor vehicle the equitable or legal title to which has never been transferred to an ultimate purchaser; and the term 'new motor vehicle engine' means an engine in a new motor vehicle or a motor vehicle engine the equitable or legal title to which has never been transferred to the ultimate purchaser." 42 USC § 7550(3). ¹⁵⁸ 42 U.S.C. § 7543(d) (1990).

¹⁵⁹ Rowe v. N.H. Motor Transp. Ass'n, 552 U.S. 364 (2008).

¹⁶⁰ Green Mountain Chrysler Plymouth Dodge Jeep v. Crombie, 508 F. Supp. 2d 295, 343–44 (D. Vt. 2007).

¹⁶¹ Am. Trucking Ass'ns, Inc. v. City of Los Angeles, 569 U.S. 641 (2013).

Port to post placards in their trucks and to develop parking plans for their vehicles.¹⁶² Though the requirements at issue in American Trucking Associations were contractual, the Court dispensed with any notion that such requirements were voluntary due to the imposition of potential fines and even up to six months in prison for noncompliance. Requirements to post a placard with a contact telephone number and provide a plan for vehicle parking cannot be called anything more than administrative, and yet the Supreme Court held that they related to the "price, route, or service of" motor carriers and were therefore preempted by Section 14501(c)(1) of the FAAAA.¹⁶³ An ACF-style policy enacted at the local level is unlikely to impose prison sentences, but the case highlights that non-voluntary measures for drayage vehicles may fall in the FAAAA's crosshairs.

In the absence of a CAA waiver, the FAAAA demands careful consideration of both how mandatory a policy is and whether it "relate[s] to the price, route, or service of [a] motor carrier... with respect to the transportation of property."¹⁶⁴ For example, a requirement that a drayage truck be retired earlier than its owner might otherwise choose and replaced with a zero-emissions truck at a potentially greater cost could run afoul of the "price" aspect of FAAAA preemption under Section 601. A prohibition on diesel-fueled drayage trucks in certain locations could change the "route, or service" of those trucks. In any instance, the analysis will heavily depend on the facts at hand, and on whether any exceptions to FAAAA preemption (as discussed in Part III.B) apply.

D. Lawsuit in State Court

There have also been challenges to the ACF rule in state court. The Western States Petroleum Association (WSPA) sued CARB in the Superior Court of the State of California, County of Fresno, seeking invalidation of the ACF Rule.¹⁶⁵ The plaintiff's claims are mostly under California state law; the only claim touching on federal law alleges violation of the dormant Commerce Clause because ACF "forces manufacturers to contend with non-uniform standards..., effectively exclude[s] out-of-state-truckers from the California trucking market..., [and] effectuate[s] a nationwide transformation of the trucking industry."¹⁶⁶ WSPA did not claim preemption by the Clean Air Act or any other federal law. The state law claims assert that the ACF violates a provision of California law that disallows requiring "the retirement [or] replacement... of a self-propelled commercial motor vehicle;"¹⁶⁷ violates the California Environmental Quality Act¹⁶⁸ due to inadequate environmental review; fails to consider cost-effectiveness and economic impact as required by California's Health & Safety Code and Administrative Procedures Act; falls outside CARB's authority; and deprives California businesses of vested

¹⁶² Am. Trucking Ass'ns, Inc. v. City of Los Angeles, 569 U.S. 641 (2013).

¹⁶³ Id.

¹⁶⁴ 49 U.S.C. § 14501(c)(1) (2015).

¹⁶⁵ W. States Petroleum Ass'n v. Cal. Air Res. Bd., Case No. 23CEG02976 (Cal. Super. Ct. July 21, 2023).

¹⁶⁶ FIRST AMENDED VERIFIED PETITION FOR WRIT OF MANDATE AND COMPLAINT FOR DECLARATORY AND INJUNCTIVE RELIEF ("W. States Petroleum Complaint"), 52, W. States Petroleum Ass'n v. Cal. Air Res. Bd., Case No. 23CEG02976 (Oct. 5, 2023).

¹⁶⁷ Cal. SB-1 § 18.

¹⁶⁸ Cal. Pub. Res. Code §21000 et seq.

rights to continue operating.¹⁶⁹ The case is still in its relatively early stages, and its status should be monitored by cities and other jurisdictions looking to implement ACF-style programs.

E. Fee for Containers on Non-ZEV Drayage Trucks at the Ports of Los Angeles and Long Beach

In addition to statewide regulation of drayage trucks, in 2022 the Ports of Los Angeles and Long Beach (both departments of their respective cities) began charging cargo owners a fee of up to \$20 per loaded container to enter the ports.¹⁷⁰ Containers carried on zero-emissions drayage trucks and some low-NOx trucks are exempt from the fee.¹⁷¹ As discussed earlier in this white paper, the CAA and EPCA (and the incentive vs. *de facto* mandate distinction) and the FAAAA could all theoretically be at play here. There are two main aspects of the Ports' charge that can help mitigate it from federal preemption challenge. It does not appear that the Ports' charge has been challenged in court; the analysis that follows is intended to guide other jurisdictions who may take a similar approach in the future.

First, a fee of \$20 per container is arguably small enough to amount to an incentive to have cargo hauled on ZEV trucks rather than on diesel-powered vehicles. The argument here is that \$20 does not "effectively compel a particular course of action" with respect to ZEVs,¹⁷² or leave vehicle "owners with no rational alternative" to purchasing lower-emitting or more fuel efficient vehicles.¹⁷³ While there is no hard-and-fast rule as to size of fee or mix of factors that would make a fee an incentive as opposed to a *de facto* mandate, it would appear that the Ports consider the \$20 fee to fall on the incentive side of the spectrum.

Second, the fee is charged to the *owner of the cargo*, not to the truck owner or operator, nor to a freight hauling company (i.e., a "motor carrier"). This is relevant because it bolsters an argument that the fee does not "relate to the price, route, or service of any motor carrier," as is prohibited by the FAAAA.¹⁷⁴ The overall cost to the cargo owner is increased, but the price of the motor carrier's services is not affected.

For the Ports and any other local or state jurisdiction considering a similar fee, neither of these two arguments is fully protective against preemption; the analysis is fact-dependent and would depend on what impact a \$20 (or another amount) fee had both on the mix of factors that might compel purchasing a ZEV and the impact it had on the "price, route, or service" of motor carriers. Together, though, these two factors – the limited dollar

¹⁶⁹ W. States Petroleum Complaint at 4-6.

¹⁷⁰ Port of Long Beach Launches Clean Truck Fund Rate, PORT OF LONG BEACH (Apr. 1, 2022), https://polb.com/port-info/news-and-press/port-of-long-beach-launches-clean-truck-fund-rate-04-01-2022/ and *Clean Truck Program*, PORT OF Los ANGELES, https://www.portoflosangeles.org/environment/air-quality/clean-truck-program (last visited June 9, 2024).

¹⁷² Ass'n of Taxicab Operators at 542.

¹⁷³ Metro. Taxicab II at 157.

¹⁷⁴ 49 U.S.C. § 14501(c)(1) (2015).

amount of the fee and that it applies to cargo owners – paint the picture of a relatively minor fee that does not significantly impact the freight industry.

Another legal question relevant to the validity of the fee has to do with the legal parameters within which local government units may assess fees. (The Ports of Los Angeles and Long Beach are both arms of their respective local governments.) This is a question of state law, and local governments will need to consider what charges they are permitted to impose under state law, as well as the line between those for which one does have authority (for example, a fee) and those for which it does not (for example, many states do not allow cities to impose taxes without state authorization).

F. South Coast Air Quality Management District (SCAQMD) Drayage Truck Program at Ports of Los Angeles and Long Beach

Voluntary measures are also helping to scale up non-diesel freight trucks in southern California. In 2021, the SCAQMD announced the Joint Electric Truck Scaling Initiative (JETSI) to deploy 100 battery-electric drayage and short haul trucks largely across two ports—Los Angeles and Long Beach—and nearby distribution centers.¹⁷⁵ SCAQMD states that the "project is poised to reduce five tons of pollutants such as nitrogen oxides (NOx) and particulate matter (PM) annually... as well as eliminate 8,247 metric tons of greenhouse gas emissions."¹⁷⁶

JETSI is grant-funded by CARB with \$14.5 million from California's cap-and-trade program, as well as with \$47 million in funds from SCAQMD and from private project partners.¹⁷⁷ Two fleet operators, NFI and Schneider, will each deploy 50 battery-electric trucks (from Volvo and Daimler) and install DC fast chargers, and NFI will install 1 MWh of solar generation and 5 MWh of battery energy storage.¹⁷⁸ In addition to trucks and chargers, "ancillary support services such as networking software for charger management, demand response, and fleet uptime and reliability, [and] complete [Battery Electric Truck] maintenance service plans... will enable fleets to utilize these trucks to meet revenue service needs."¹⁷⁹ Press articles about JETSI boast that NFI "will operate the first 100% zero-emission freight logistics fleet in California" at one of its facilities."¹⁸⁰

¹⁷⁵ South Coast AQMD Leads North America's Largest Deployment of Class 8 Battery-Electric Trucks, S. COAST AIR QUALITY MGMT. DIST. PRESS RELEASE (Aug. 31, 2021), http://www.aqmd.gov/docs/default-source/news-archive/2021/JETSI-aug31-2021.pdf. ¹⁷⁶ Id.

¹⁷⁷ *LCTI: Joint Electric Truck Scaling Initiative (JETSI)*, Cal. Air. Res. Bd., https://ww2.arb.ca.gov/lcti-joint-electric-truck-scaling-initiative-jetsi (last visited June 9, 2024). Project partners include the Port of Los Angeles, the Port of Long Beach, Southern California Edison, National Freight Industries (NFI), Schneider, Daimler, Volvo, CALSTART, the California Energy Commission, and several other academic, nonprofit, and other partners. Id.

¹⁷⁸ Id.

¹⁷⁹ Id.

¹⁸⁰ New project deploys 100 electric Class 8s in California, FLEETOWNER (Aug. 31, 2021), https://www.fleetowner.com/emissionsefficiency/electric-vehicles/article/21173995/new-project-deploys-100-electric-class-8s-in-california.

JETSI is a purely voluntary program, grant-funded by CARB and led by SCAQMD. It contains no mandates and therefore legal issues associated with it are limited to more routine matters of permitting (for chargers) and contracting and funding agreements; it does not involve complex questions of federal law.¹⁸¹ Given the cost of a program akin to JETSI, it is likely that a city would need to work with a state entity or other funder, but this is a question of funding availability and largely not a legal question.

¹⁸¹ In consultation with the relevant agencies with jurisdiction over sites where chargers or solar panels would be installed, SCAQMD determined JETSI to be exempt from California Environmental Quality Act (CEQA) review. *Notice of Exemption From CEQA*, S. COAST AIR QUALITY MGMT. DIST. (Feb. 12, 2021), http://www.aqmd.gov/docs/default-source/ceqa/notices/notices-of-exemption/2021/noe_south-coast-aqmd-california-joint-electric-truck-scaling-initiative.pdf?sfvrsn=6. See also *Cal. Joint Elec. Scaling* Initiative, CAL. ENV'T. QUALITY ACT (Feb. 16, 2021), https://ceqanet.opr.ca.gov/2021020278.

V. SITE-BASED EMISISONS STANDARDS: INDIRECT SOURCE RULE FOR WAREHOUSES

V. SITE-BASED EMISSIONS STANDARDS: INDIRECT SOURCE RULE FOR WAREHOUSES

This Part V looks at an emerging regulatory¹⁸² approach that seeks to avoid regulating directly the air emissions or fuel economy characteristics of freight vehicles: air pollution rules for warehouses in their capacity as "indirect sources" of freight vehicle emissions. In other words, warehouse operations necessarily involve the movement of freight vehicles, emissions from those freight vehicles, and emissions from on-site sources. The "indirect source rule" approach allows warehouse operators to choose how to reduce overall emissions attributable to their on- and off-site operations.

This Part reviews California's South Coast Air Quality Management District's (SCAQMD's) Rule 2305, which establishes an indirect source rule called the Warehouse Actions and Investments to Reduce Emissions (WAIRE) Program. It also addresses current New York State legislation that would have similar effect. Indirect source rules for warehouses raise the potential for federal preemption under the CAA and the FAAAA. California has submitted a revision to the SCAQMD portion of its State Implementation Plan (SIP) under Section 110 of the CAA;¹⁸³ if USEPA approves the inclusion of WAIRE in California's SIP, WAIRE will become federally enforceable and will therefore not be subject to federal preemption. If USEPA declines to approve California's SIP revision, and for other local or state governments that develop WAIRE-like programs, CAA and FAAAA preemption remain risks. With respect to the CAA, a flexible approach to compliance obligations that incentivizes, but does not require, the deployment of ZEV delivery trucks can mitigate but not eliminate preemption risk. From an FAAAA perspective, the fact that an indirect source rule regulates warehouses, not freight companies, is helpful in mitigating FAAAA preemption claims; for instance, a district court in California held that the indirect source rule in place in southern California was not preempted by the FAAAA.¹⁸⁴ Whether a city would have the authority under state law to pursue major aspects of an indirect source regulation on its own, or if it would require state legislation, is a question of state law.

A. South Coast Air Quality Management District's WAIRE Program

In May 2021, SCAQMD adopted Rule 2305, which aims to reduce NO_x and PM emissions produced by light- and heavy-duty freight vehicles by regulating the *indirect sources* of those emissions, the warehouse facilities to and from which the trucks travel.¹⁸⁵ Rule 2305 establishes the Warehouse Actions and Investments to Reduce

¹⁸² Depending on applicable law, such regulation may require or benefit from state or local enabling legislation.

¹⁸³ Air Plan Approval; Cal.; S. Coast Air Quality Mgmt. Dist., 88 Fed. Reg. 70,616 (Oct. 11, 2023) (proposed; to be codified at 40 C.F.R. pt. 52).

¹⁸⁴ Cal. Trucking Ass'n v. S. Coast Air. Quality Mgmt. Dist. (CTA v. SCAQMD), No. 2:21-cv-6341 (C.D. Cal. 2021).

¹⁸⁵ S. Coast Air Qual. Mgmt. Dist. Indirect Source Rule, Rule 2305 (May 7, 2021), https://www.aqmd.gov/docs/default-source/rule-book/reg-xxiii/r2305.pdf?sfvrsn=15.

Emissions (WAIRE) Program, a multi-faceted set of requirements and compliance pathways intended to reduce emissions that originate t or are attributable to the operations of warehouses. The WAIRE Program applies to "owners and operators of warehouses located in [SCAQMD's] jurisdiction with greater than or equal to 100,000 square feet of indoor floor space in a single building."¹⁸⁶

The overall gist of the WAIRE program is that warehouse operators must earn a certain number of "WAIRE Points" to meet their obligations.¹⁸⁷ These points are calculated based on a formula that multiplies weighted annual truck trips¹⁸⁸ to and from the warehouse times a "stringency" factor of 0.0025 WAIRE Points times an "annual variable" that increases over time.¹⁸⁹ WAIRE points may be earned by a range of measures listed in a "WAIRE Menu," including but not limited to acquiring or using ZEVs and near-zero emission vehicles (NZEVs); reducing truck visits; installing ZEV charging or fueling infrastructure; using ZEV charging or fueling infrastructure; installing or using onsite solar power; and installing air filtration in homes, schools, hospitals and other offsite spaces.¹⁹⁰ Alternatively, a warehouse operator and the SCAQMD may agree to a "Custom WAIRE Plan" that sets out a more tailored compliance pathway.¹⁹¹ Adding further flexibility, WAIRE points can effectively be purchased through the payment of a mitigation fee equaling \$1,000 per WAIRE Point,¹⁹² and WAIRE Points may be transferred between warehouses and compliance periods (but not both at once).¹⁹³ Warehouse owners are not directly required to earn WAIRE Points (they do have reporting obligations), but they can choose to do so on behalf of their operator tenants if they wish.

B. New York State Indirect Source Bill: The Clean Deliveries Act

A bill – A01718/S02127 – was proposed in January 2023 in New York State that would have directed the New York State Department of Environmental Conservation (NYSDEC) to adopt an approach similar to the WAIRE Program. The bill did not advance out of committee in the 2023 legislative session, and though it was rereferred to the Senate and Assembly committees on environmental conservation in January 2024, the 2024 legislative session ended with the bill having passed only in the Senate.¹⁹⁴ Referred to by advocates as the

¹⁸⁶ S. Coast Air Qual. Mgmt. Dist. Indirect Source Rule, Rule 2305 (b).

¹⁸⁷ S. Coast Air Qual. Mgmt. Dist. Indirect Source Rule, Rule 2305 (d)(1).

¹⁸⁸ Determined via another formula that weighs vehicle and warehouse size and whether the warehouse has a cold storage area. S. Coast Air Qual. Mgmt. Dist. Indirect Source Rule, Rule 2305 (d)(1)(b).

¹⁸⁹ S. Coast Air Qual. Mgmt. Dist. Indirect Source Rule, Rule 2305 (d)(1)(a) and Table 2.

¹⁹⁰ S. Coast Air Qual. Mgmt. Dist. Indirect Source Rule, Rule 2305(d)(3) and Table 3.

¹⁹¹ S. Coast Air Qual. Mgmt. Dist. Indirect Source Rule, Rule 2305(d)(4).

¹⁹² S. Coast Air Qual. Mgmt. Dist. Indirect Source Rule, Rule 2305(d)(5).

¹⁹³ S. Coast Air Qual. Mgmt. Dist. Indirect Source Rule, Rule 2305(d)(6).

¹⁹⁴ Senate Bill S2127B, THE NEW YORK STATE SENATE, https://www.nysenate.gov/legislation/bills/2023/S2127/amendment/B (last visited June 9, 2024).

"Clean Deliveries Act," A01718 has been supported by a coalition of local and national environmental and environmental justice groups.¹⁹⁵

The Clean Deliveries Act would "establish[] an indirect source review for certain warehouse operations,"¹⁹⁶ and while the bill leaves many of the details to NYSDEC, it specifies that NYSDEC "shall promulgate rules and regulations providing for the... adoption of measures to reduce air pollution associated with emissions relating to qualifying warehouse operations, including mobile source emissions."¹⁹⁷ In particular, the regulations to be developed by NYSDEC are to "creat[e] a points system in which warehouse operators must gain a certain number of points, based on the amount of truck traffic that results from their operations, [along with] mitigation measures such as acquiring and using zero-emissions vehicles, installing and using on-site electric vehicle charging equipment, using alternatives to truck or van trips... and/or installing solar electric power generation and battery storage systems; and requiring enhanced mitigation measures for warehouses located near sensitive receptors."¹⁹⁸ In addition, the legislation would direct new warehouse facilities and those undergoing a "major modification" to "obtain a permit demonstrating that any additional traffic resulting from construction and operation will not result in a violation of national ambient air quality standards [(NAAQS)] established by [the USEPA] or... will not exacerbate" an existing NAAQS violation.¹⁹⁹ The bill would also direct NYSDEC to "establish ongoing monitoring and reporting requirements for warehouse operators," including with respect to the "average daily number of inbound and outbound vehicle trips by vehicle weight and class;" the "average daily vehicle miles traveled" for those same vehicles; EV charging stations; on-site renewable energy generation; and more.²⁰⁰ The legislation also would have required fees for registration in the eventual warehouse program and for noncompliance.²⁰¹

In other words, the Clean Deliveries Act would require NYSDEC to adopt a program similar in structure to the WAIRE Program in Southern California, at least as far as the compliance points system, reporting requirements, and fees go. The two programs (one existing, one contemplated) involve similar legal considerations, even though they are at different phases of development.

C. Legal Considerations for WAIRE-Style Programs, Including New York's Clean Deliveries Act

¹⁹⁵ Isabel Song Beer, *Lawmakers say influx of e-commerce warehouses has spiked greenhouse gas emissions in Red Hook, urge regulation*, BROOKLYN PAPER (Nov. 29, 2023), https://www.brooklynpaper.com/lawmakers-e-commerce-regulation-red-hook/. See also *Who We Are*, ELECTRIFYNY, https://electrifyny.org/about/ (last visited June 9, 2024).

¹⁹⁶N.Y. A01718 at proposed N.Y. Env't Conserv. L. § 74-0105. See https://legiscan.com/NY/bill/A01718/2023.

¹⁹⁷ Id. at proposed N.Y. Env't Conserv. L. § 74-0103(1).

¹⁹⁸ Id. at proposed N.Y. Env't Conserv. L. § 74-0103(2). The bill would also direct NYSDEC to "conduct a study regarding zero emissions zones."

¹⁹⁹ Id. at proposed N.Y. Env't Conserv. L. § 74-0103(3)(a).

²⁰⁰ Id. at proposed N.Y. Env't Conserv. L. § 74-0103(4).

²⁰¹ Id. at proposed N.Y. Env't Conserv. L. § 74-0103(5).

The WAIRE Program is structured to consider and limit exposure to federal preemption challenges, and though risk of legal challenge cannot be reduced to zero, a recent federal district court decision in litigation challenging the WAIRE rule²⁰² helps clarify the legal analysis with respect to the contours of an indirect source rule that conforms to applicable legal parameters. This subpart first discusses that litigation briefly, and then turns to questions of federal (and to a lesser extent state) law, imbuing the discussion throughout with analysis from the district court's decision. The Clean Deliveries Act does not actually develop an emissions-reducing program or enact any requirements for parties other than NYSDEC, and therefore the bill itself would likely not be subject to a ripe legal challenge, but an eventual program developed by NYSDEC could be. Therefore, the following legal analysis focuses mostly on the WAIRE Program; the implications for a New York State or any other state or local program would be similar.

C.1. WAIRE Litigation & District Court Decision

In August 2021, the California Trucking Association (CTA) filed suit against the SCAQMD challenging the lawfulness of Rule 2305 by alleging that the WAIRE Program was preempted by the CAA, the FAAAA, and state law (the litigation is referred to herein as *"CTA v. SCAQMD"*).²⁰³ The plaintiffs challenged the WAIRE program on several grounds. First, CTA pointed to Section 209(a) of the Clean Air Act, which preempts state and local *"standard[s] relating to the control of emissions from new motor vehicles or new motor vehicle engines."*²⁰⁴ CTA argued that "the language of [the CAA] is categorical. There is no exception for the indirect regulation the [SCAQMD] purports to undertake."²⁰⁵ In short, CTA contended that "[t]he only economically viable way to avoid triggering Rule 2305 (the rule through which the WAIRE program is implemented) sanctions is to acquire, and/or mandate that others acquire, ZE or NZE trucks on an accelerated basis."²⁰⁶ CTA further argued that the allowance of indirect source rules in SIPs permit only rules relating to "new or modified indirect source[s]," while the WAIRE program would apply to new and existing warehouses.²⁰⁷

In addition to invoking the CAA, CTA raised claims of FAAAA preemption. In CTA's view, the WAIRE program "will fundamentally redefine the economics of warehouse operation in the South Coast Basin," thus implicating the "price, route, or service" of motor carriers.²⁰⁸ In particular, CTA asserted, the cost to comply with the WAIRE rule "would impact contractual relationships between motor carriers and good owners/warehouses," "will... drive many warehouses to shut down or move... will interfere with existing contracted routes, distribution channels, and pricing, [and] cost hundreds if not thousands of local jobs... For those who stay, the additional operational costs will be borne by truck owner/operators, who in turn will need to increase freight

 ²⁰² Cal. Trucking Ass'n v. S. Coast Air. Quality Mgmt. Dist. (CTA v. SCAQMD), No. 2:21-cv-6341 (C.D. Cal. 2021).
²⁰³ Id.

²⁰⁴ COMPLAINT FOR DECLARATORY JUDGMENT AND INJUNCTIVE RELIEF, 4, CTA v. SCAQMD ("CTA v. SCAQMD Complaint")(Aug. 8, 2021).

²⁰⁵ Id. quoting Engine Mfrs. Ass'n v. S. Coast Air Quality Mgmt. Dist., 541 U.S. 246, 256 (2004). Internal quotation marks and citation omitted.

²⁰⁶ CTA v. SCAQMD Complaint at 28.

²⁰⁷ Id. at 10 citing CAA § 110(a)(5)(C).

²⁰⁸ Id. at 24.

charges."²⁰⁹ The CTA also made arguments relating to the authority delegated by the state of California to SCAQMD to enact (or not) the WAIRE program and alleges that the program's mitigation fees amount to an unlawful tax.²¹⁰

As defendant, the SCAQMD contested that the WAIRE rule offers flexible options for compliance through the WAIRE Menu, and thus is not preempted by CAA Section 209; that its indirect source rule is further not preempted by CAA Section 110 because Section 110 refers to existing authority within the state and local police power to enact indirect source rules, rather than delegating a limited power to enact such rules relating to new or modified sources only; and that the limited (in its calculation) compliance costs do not reach the threshold for preemption by the FAAAA.²¹¹

In December 2023, the U.S. District Court for the Central District of California dismissed the CTA's complaint, rejecting both the CAA and FAAAA claims. With respect to the CAA, the District Court held that Section 209 does not preempt indirect source rules allowable under Section 110, writing that "a rule that regulates indirect sources, but indirectly affects new motor vehicles and new motor vehicle engines, does not relate to the control of emissions from new motor vehicles or new motor vehicle engines."²¹² The decision also clarified the scope of an indirect source rule permitted by Section 110, writing that a "rule does involve a 'facility-by-facility' review as long as it operates '[b]y measuring emissions by, and requiring emissions reductions from, development sites as a whole,"²¹³ as the WAIRE program does. In response to plaintiffs' FAAAA preemption arguments, the Court wrote that "the Rule contains no express references to... services, rates, or routes;" "it is immaterial that 'a motor carrier must take into account a state regulation when planning services'... unless [the rule] interferes with the relationship between [motor]²¹⁴ carriers and their customers;" and "[r]ather than affecting a motor carrier's relationship with its customers, the Rule regulates the motor carriers' trucks, which are among the economic 'inputs' used by those businesses."²¹⁵ The decision differentiates between the FAAAA and environmental laws like the CAA, saying plaintiffs could not "support an inference that [the FAAAA] disrupt[s] the balance of federal and state authority over pollution control established in the CAA and other statutes."²¹⁶ The court's decision sheds light on the lawfulness of a WAIRE-style program, though a decision in the Central District of California is not binding precedent elsewhere in the country, and the matter was not appealed to the U.S. Court of Appeals for the Ninth Circuit. Therefore, the analysis that follows threads the District Court ruling throughout.

²⁰⁹ Id.

²¹⁰ CTA v. SCAQMD Complaint at 29-33.

²¹¹ Joshua Bledsoe, Nick Cox & Jennifer Garlock, *US Warehouse Regulation Lawsuit Reaches Critical Stage*, LATHAM & WATKINS (Apr. 20, 2023), https://www.globalelr.com/2023/04/us-warehouse-regulation-lawsuit-reaches-critical-stage/.

²¹² CTA v. SCAQMD Decision at p. 23 (Dec. 14, 2023).

²¹³ CTA v. SCAQMD Decision at 28, quoting Nat'l Ass'n of Home Builders v. San Joaquin Valley Unified Air Pollution Control Dist., 627 F.3d 730, 737 (9th Cir. 2010).

²¹⁴ The original quote refers to "air carriers," as the court considers the FAAAA and the ADA in the same analysis.

²¹⁵ CTA v. SCAQMD Decision at 33.

²¹⁶ CTA v. SCAQMD Decision at 34.

C.2. Federal Law Considerations as Applied to a Warehouse Indirect Source Rule

As previewed in the CTA litigation, there are two main aspects of the federal Clean Air Act to consider in developing an indirect source rule that can withstand CAA preemption scrutiny: (1) structuring the overall requirement to avoid mandating any one or more specific actions the requirement of which would itself be preempted by Section 209 of the Clean Air Act; and (2) embedding the rule in the state's State Implementation Plan under Section 110 of the Clean Air Act. Either one of these approaches, if viewed by a court as done appropriately, can insulate an indirect source rule from preemption; both are not required though together they provide an extra layer of protection. SCAQMD has integrated both approaches into buffeting WAIRE from preemption.

C.2.a. Clean Air Act Section 209 Preemption and the Mandate/Incentive Distinction – Using Flexible Compliance Options

Simply put, SCAQMD and other state and local jurisdictions would be preempted from requiring that the owners and operators of trucks that enter and leave warehouses be ZEVs – federal laws including the Clean Air Act,²¹⁷ EPCA,²¹⁸ and possibly the FAAAA,²¹⁹ preempt such requirements at the state and local level. While there is no case law directly on point, it is likely that these laws would also preempt an indirect source rule that expressly prohibits warehouse facilities from allowing diesel-fueled trucks onto their premises. What the WAIRE Program does, then, is to offer optionality in how regulated parties comply – they can deploy zero-emissions trucks, but they could also install EV chargers, solar panels, or off-site air filters, or simply pay a mitigation fee.²²⁰ To put it another way, no individual is ever *required* to purchase a new ZEV truck.

Whether or not such an approach would be preempted under CAA Section 209 is fact dependent. Part III.A of this memorandum, above, discusses the mandate/incentive/*de facto* mandate distinction at length. For example, it would be possible to weight a points system or other flexible approach such that the purchase of ZEVs was effectively mandatory, or at least a very expensive "option" to avoid. A court could view such a system or approach as a *de facto* mandate to purchase ZEVs. On the other hand, a points system could be designed with sufficient optionality to avoid such a result, as SCAQMD appears to have attempted to do.

California uses flexible approaches to regulation in other areas at risk of federal preemption. In 2018, the state legislature passed S.B. 1014, which established the California Clean Miles Standard and Incentive Program (California Clean Miles) to reduce vehicle emissions from transportation network company (TNC) vehicles.²²¹ Under S.B. 1014, CARB was required to develop "annual targets and goals... for the reduction... of emissions of

²¹⁷ 42 U.S.C. § 7543(a) (1990).

²¹⁸ 49 U.S.C. § 32919(a) (1994).

²¹⁹ 49 U.S.C. § 14501(c)(1) (2015).

²²⁰ S. Coast Air Qual. Mgmt. Dist. Indirect Source Rule, Rule 2305 (d)(3) and Table 3.

²²¹ Cal. S.B. 1014 (2018).

greenhouse gases per passenger-mile driven on behalf of a transportation network company."²²² Under the California Clean Miles program, TNCs like Lyft and Uber are required to submit biannual plans for reducing greenhouse gas emissions for approval by CARB. Plans can employ a variety of approaches, including increasing ZEV deployment among TNC drivers' vehicles, increasing ZEV vehicle-miles as a proportion of all vehicle-miles, decreasing gram-per-mile emissions rates and increasing passenger-miles in proportion to vehicle-miles.²²³

Similar to the WAIRE program, California Clean Miles was meant to offer the regulatory flexibility to TNCs such that, arguably and at least for now, no one is *required* to purchase or deploy ZEVs, even if they *choose* to do so as part of their plan. TNCs can include in their plans and use as tools for compliance methods such as adopting ZEVs and other more efficient vehicles, increasing ridesharing, and reducing the "deadhead" miles that occur when a driver drives their vehicle without a passenger. They can also earn optional extra credits by investing in sidewalk or bikeway projects or by demonstrating that their trips were used to connect to public transit.²²⁴ Both the WAIRE and the California Clean Miles programs also have an element that involves the regulated party developing its own compliance plan. Under California Clean Miles they are required to do so and under WAIRE a custom plan is one compliance pathway – meaning that if the regulatory framework still doesn't work for them, there is additional flexibility.

There can be no guarantee that a flexible approach similar to WAIRE's and the TNC program will avoid federal preemption or preemption scrutiny under the CAA. The District Court's decision in *CTA v. SCAQMD* considered an indirect source rule permitted under Section 110 of the CAA (i.e., included in a SIP). However, these programs are structured to, ideally, withstand any such scrutiny. A well-calibrated points-based approach would allow sufficient flexibility for regulated parties to cobble together a compliance plan that works for them.

C.2.b. Inclusion in a State Implementation Plan (SIP) Under the Clean Air Act

Another way to shield an indirect source rule from CAA preemption scrutiny is to make it enforceable under federal law through inclusion in a USEPA-approved state implementation plan (SIP) under Section 110 of the CAA. While a federal statute, the CAA delegates to the states much of the authority for developing a plan to attain standards for six air pollutants, including ozone, fine particulate matter (PM2.5) and NOx.²²⁵ States are required to adopt SIPs that include enforceable emissions limits on the air pollutants for which the state, or areas of it, are deemed in "nonattainment" with federal standards.²²⁶ States submit these plans to the USEPA, including any new rules (or "revisions"), for approval.²²⁷ After an opportunity for USEPA to deem any state

²²² See *R.21-11-014: Clean Miles Standard Phase 1 Supplemental Protocol*, CAL. PUB. UTIL. COMM'N CONSUMER PROT. & ENFORCEMENT DIV. (May 10, 2023), https://docs.cpuc.ca.gov/PublishedDocs/Efile/G000/M508/K571/508571416.PDF.

²²³ Cal. Pub. Utils. Code § 5450(c).

²²⁴ 13 Cal. Code of Regs. § 2490.2 (2022).

²²⁵ 42 U.S.C. § 7407 (1990).

²²⁶ 42 U.S.C. §§ 7401(a)(1), (a)(2)(A); 7502(c)(6) (1990).

²²⁷ 42 U.S.C. § 7401(a)(1) (1990).

submission as "complete" (and therefore ready for review) or "incomplete," the USEPA must act to approve or disapprove (in whole or part) the state's submission within a specified timeframe.²²⁸ If USEPA approves the state's submission, the rules and requirements in the approved SIP become enforceable under federal law, both by the USEPA and through citizen suits.²²⁹ The CAA allows an indirect source rule to be included in a SIP, so long as it is a "facility-by-facility review of indirect sources of air pollution."²³⁰ The District Court in *CTA v. SCAQMD* held that the WAIRE Program allows for such a "facility-by-facility" review.²³¹ Thus, a city, working with its state, could include an indirect source rule in a SIP revision with the goal of having it approved by the USEPA.

SCAQMD submitted Rule 2305 (which establishes the WAIRE Program) to the USEPA for approval in the SCAQMD portion of the California SIP. On October 12, 2023, USEPA published notice in the Federal Register that it proposes to approve Rule 2305 as part of California's SIP.²³² The comment period closed on November 13, 2023, but USEPA has yet to make a final determination.²³³ Until finalization, Rule 2305 and the WAIRE Program currently remains enforceable only by the SCAQMD as a state-level program, not as a USEPA-approved program backed by federal law.

Having an indirect source rule embedded in an approved SIP would be the gold standard for shielding it from preemption scrutiny. Once it is in an approved SIP, it is federally enforceable and likely not subject to preemption.²³⁴ However, it is not *necessary*, as a matter of law, to achieve this; any such requirement could be structured as a flexible program (or an incentive) to avoid preemption under the CAA, as discussed previously in subpart a.

C.2.c. FAAAA Preemption

While FAAAA jurisprudence can at times be quite broad, seemingly capturing measures that raise the costs of goods or freight transportation, the District Court in *CTA v. SCAQMD* held that SCAQMD's WAIRE program was not preempted. The court sited the lack of express references to freight companies' "services, rates, or routes" as a significant factor in its finding of no FAAAA preemption, and generally rejected the notion that state and local regulations that have purposes other than regulating the price, route, or service of motor carriers are meant to be preempted.²³⁵ The District Court further distinguishes between regulating a motor carrier's relationship to its customers, which could be preempted, with regulating "the economic inputs' used by those

²²⁸ 42 U.S.C. §7401(k) (1990).

²²⁹ 42 U.S.C. §§ 7413; 7604(a) & (f) (1990)

²³⁰ 42 U.S.C. §§ 7410(a)(5)(A)(i) & 7410(a)(5)(C) (1990).

²³¹ ORDER RE PLAINTIFF'S MOTION FOR SUMMARY JUDGMENT AS TO PLAINTIFF'S COMPLAINT FOR DECLARATORY JUDGMENT AND INJUNCTIVE RELIEF, 28, CTA v. SCAQMD ("CTA v. SCAQMD Decision") (Dec. 14, 2023).

²³² Air Plan Approval; Cal.; S. Coast Air Quality Mgmt. Dist., 88 Fed. Reg. 70,616 (Oct. 12, 2023), available at

https://www.federalregister.gov/documents/2023/10/12/2023-22518/air-plan-approval-california-south-coast-air-quality-management-district.

²³³ Id.

²³⁴ Id. at p. 23.

²³⁵ Id. at 33.

businesses."²³⁶ Essentially, the fact that some of the freight companies' costs might rise due to the WAIRE Program was not sufficient to render it preempted. Notably, the District Court did not tie its holding to inclusion in a SIP.

The District Court decision lends credibility to the notion that a flexible, points-based approach that regulates an indirect, stationary source without placing direct obligations on freight companies or vehicle owners or operators is not the sort of state or local regulation meant to be preempted by the FAAAA. However, it is possible that another court could view the question differently, particularly if an indirect source rule were designed to more directly alter the prices, routes or services of motor carriers. As ever, the details are important; each analysis will be case-specific. For indirect source rules embedded in a state's SIP, a court would likely (and more appropriately) view FAAAA questions as a matter of harmonization with the SIP, rather than a matter of potential preemption of the SIP requirement by the FAAAA.

²³⁶ Id. at 33.

VI. LOW-EMISISONS DELIVERY ZONES

VI. LOW-EMISSIONS DELIVERY ZONES

A third approach to regulating emissions from goods delivery – at least from last-mile delivery trucks and vans if not drayage and other larger freight vehicles – involves incentivizing on-street delivery vehicles towards zeroemissions engines. Because of the preemption provisions in the CAA and EPCA, where local governments have pursued such approaches, they have not fully disallowed fossil-fueled vehicles, but rather taken more positive, proactive approaches to driving ZEVs into an area rather than forcing internal combustion engine vehicles out.

Two U.S. cities – Santa Monica and Portland – have implemented or are in the process of implementing "zero emissions delivery zones," or ZEDZs. Both of these are largely voluntary; they offer incentives like priority loading zones and chargers for ZEV delivery vehicles and involve pilot approaches to low-emissions freight transport, but they do not require any particular action on the part of delivery vehicles, nor do they exclude non-ZEVs from driving through the zone. The zones are relatively small – a few city blocks to on the order of a square mile – and non-ZEV trucks can drive through the zones and load or unload just outside of them. A third city, Los Angeles, has implemented curbside management loading zones, a less comprehensive approach that is effectively piloting limiting certain loading zones to use by ZEV trucks.²³⁷ Cities often have authority under state law to pursue ZEDZ or curb management strategies through parking, stopping and standing, idling, signage, and other rules, though fewer of them have authority to toll (or charge for access to) public roads. If a local government were to consider a mandatory approach to a ZEDZ, it would need to consider the limits of federal preemption under the CAA, EPCA and the FAAAA alongside state law. States would have more latitude vis-à-vis state law but would still need to take federal law limitations into account.

A. Santa Monica, CA

In 2020²³⁸ and 2021,²³⁹ the City of Santa Monica, California and the Los Angeles-affiliated nonprofit organization Los Angeles Cleantech Incubator launched a voluntary Zero-Emissions Delivery Zone (ZEDZ) in a one-square mile area within Santa Monica, including two main commercial districts.²⁴⁰ The primary function of the delivery zone is to "provide priority access to zero-emissions delivery vehicles, including electric vans, e-cargo scooters, and remote-controlled small delivery bots, within certain loading zones."²⁴¹ In addition, the ZEDZ used (or planned to use) technologies such as "micromobility for food and parcel delivery... electric

²³⁷ Los Angeles Ord. No. 187117 (2021).

²³⁸ Chris Teale, Santa Monica, CA to pilot zero emissions delivery zone, SMARTCITIES DIVE (Jun 17, 2020),

https://www.smartcitiesdive.com/news/santa-monica-LACI-pilot-voluntary-zero-emissions-delivery-zone/579937/.

²³⁹ Cailin Crowe, Santa Monica, CA aims to create zero-emissions delivery zone playbook, SMARTCITIES DIVE (Mar. 3, 2021),

https://www.smartcitiesdive.com/news/santa-monica-LACI-zero-emission-delivery-zone-cities/595919/.

²⁴⁰ Santa Monica Zero Emissions Delivery Zone Pilot, Los ANGELES CLEAN TECH INCUBATOR, https://laincubator.org/zedz/ (last visited June 9, 2024).

²⁴¹ Crowe, supra note 239.

delivery vehicles; commercial electric vehicle car sharing; [and] mobile charging applications for delivery."²⁴² According to the City of Santa Monica, goals associated with the ZEDZ included "creat[ing] benefits to the local community such as reduced air pollution, GHG emissions, noise and congestion, as well as improved safety" and "offer[ing] economic opportunity to small businesses and individuals through access to zone benefit."²⁴³

Though the Santa Monica ZEDZ was and still is a novel approach to the reduction of air pollution associated with the delivery of goods, it is important to note that the program involved only voluntary measures. Therefore, it did not give rise to the structural legal questions under federal law that a mandatory low emissions zone would. (It could have involved more day-to-day legal questions about permitting for certain aspects of the program, but given the nature of the project it is likely that any such permits, if required, were routine.) However, the Santa Monica program could be considered a precursor to the Portland, Oregon Zero-Emission Delivery Zone pilot, discussed next.

B. Portland, OR

In 2023, Portland, Oregon announced its plans to pilot a Zero-Emission Delivery Zone as part of a nearly \$2 million U.S. Department of Transportation Strengthening Mobility and Revolutionizing Transportation (SMART) grant to the Portland Bureau of Transportation (PBOT).²⁴⁴ The Portland ZEDZ expands slightly upon the structure of the Santa Monica ZEDZ in that there is a *regulatory* component to it – vehicles parked in areas of the ZEDZ that they are not entitled to use can receive a traffic citation. There are three main aspects to the 16-block Portland ZEDZ: (1) three "zero-emission delivery" loading areas located at or near public-sector (city, county, and federal) office buildings; (2) a partnership with a logistics company to designate areas where fossilfueled delivery vehicles can transfer goods to ZEVs for delivery in the zone; and (3) evaluation of the ZEDZ pilot using "data from logistics companies, sensors, and third-party logistics companies."²⁴⁵ The initial SMART grant period lasts 18 months, and Portland may decide to apply for a Stage Two SMART grant of up to \$15 million.²⁴⁶ The ZEDZ is not up and running yet; its anticipated launch is in summer or fall of 2024.²⁴⁷ Portland cites a range of climate, air pollution, public health, safety, and curb management rationales for its ZEDZ program.²⁴⁸

²⁴² Santa Monica Zero Emissions Delivery Zone Pilot, Los ANGELES CLEAN TECH INCUBATOR, https://laincubator.org/zedz/ (last visited June 9, 2024). Punctuation and capitalization adapted from original.

²⁴³ Zero Emission Delivery Zone, CITY OF SANTA MONICA, https://www.santamonica.gov/zero-emission-delivery-zone (last visited June 9, 2024).

²⁴⁴ Other cities to receive SMART grants at the same time were Los Angeles, Minneapolis, Philadelphia, San Francisco, San Jose, Seattle, and Miami-Dade County, for projects including a range of curb management, smart traffic signals, and sensors. *Strengthening Mobility and Revolutionizing Transportation Fiscal Year 2022 Planning and Prototyping Grants by State*, U.S. DEP'T OF TRANSP. (Mar. 2023), https://www.transportation.gov/sites/dot.gov/files/2023-03/FY22%20SMART%20Project%20List.pdf.

 ²⁴⁵ About the Zero-Emission Delivery Zone, CITY OF PORTLAND, https://www.portland.gov/transportation/planning/zero-emission-delivery-zone (last visited June 9, 2024).
²⁴⁶ Id.

 ²⁴⁷ Skip Descant, *Data in Driver's Seat for Portland, Ore., Zero-Emission Delivery*, Gov'τ. TECH. (May 8, 2024), https://www.govtech.com/transportation/data-in-drivers-seat-for-portland-ore-zero-emission-delivery.
²⁴⁸ Id.

Though Portland's ZEDZ "is off-limits to gas-powered vehicles for loading and unloading, with violators subject to a parking citation,"²⁴⁹ the program is otherwise similarly voluntary as Santa Monica's. Vehicles that are not ZEVs, including delivery vehicles, are not banned from the zone; they merely lack access to certain amenities like the loading zones and charging. Therefore, Portland would have needed to consider its authority to use or regulate certain curb spaces (and to issue parking citations), but did not have to consider broader questions of federal preemption. Whether a city has authority to issue parking citations is a question of state law. In some instances, local governments would need to work with their states to allow for the use of parking citations in this manner or at all, whether through enabling legislation or otherwise.

C. Los Angeles, CA

Los Angeles has taken a slightly different approach – one that focuses on specific loading and unloading areas but that is codified in local law. In 2021, the City Council enacted Ordinance No. 187117, which authorized the city's Department of Transportation (LADOT) "to install, operate, and regulate Zero-Emission Vehicle (ZEV) Commercial Loading Zones for the exclusive use and access by zero-emission commercial delivery vehicles" – a category that included both trucks and electric bikes.²⁵⁰ The ordinance further restricted non-ZEVs from using a ZEV commercial loading zone.²⁵¹ The law also indicated how curbs at ZEV Commercial Loading Zones should be painted.²⁵² A memo from LADOT indicated that it would identify curbside areas appropriate for the zones enabled by Ord. No . 187117 by prioritizing areas that are "high density; subject to high commercial loading zone demands; disproportionately burdened by air pollution; [and] under LADOT's administrative authority to install, enforce, and monitor."²⁵³ In implementing the ordinance, the city cited its authority under state law ("The California Vehicle Code (CVC) Section 21458(a) allows municipalities to enact local parking regulations and to demarcate the parking regulations through the use of painted curbsides") and local code ("Los Angeles Municipal Code Section 80.56 authorizes LADOT to establish commercial loading zones").²⁵⁴ Despite this legislative authorization, ZEV Commercial Loading Zones have not yet been widely implemented in Los Angeles.

²⁴⁹ Max Garland, Portland, Oregon to pilot zero-emission delivery zone, SUPPLYCHAINDIVE (May 9, 2023),

https://www.supplychaindive.com/news/portland-oregon-launch-zero-emission-delivery-zone-pilot-program/649710/. ²⁵⁰ Los Angeles Ord. No. 187117 (2021) sec. 1.

²⁵¹ Id. at sec. 2.

²⁵² Id. at sec. 3

²⁵³ City of Los Angeles Inter-departmental Correspondence from Seleta J. Reynolds, Gen. Mrg. Los Angeles Dept. of Transp., 2, 2Zero Emission Delivery Zones (CF 21-0147) (Apr. 28, 2021), https://clkrep.lacity.org/onlinedocs/2021/21-0147_rpt_dot.pdf. Punctuation and capitalization altered from the original.

D. Legal Considerations for Low Emissions Delivery Zones (LEDZ) or Zero Emissions Delivery Zones (ZEDZ)

While the mostly voluntary nature of the Santa Monica, Portland and Los Angeles delivery zones largely insulates them from federal preemption scrutiny, there are two broad legal issues for state or local policymakers to consider in developing similar programs. First, a city will need to work within the bounds of its state law authority to regulate streets, sidewalks, and other areas. And second, if a jurisdiction opts to pursue a non-voluntary program, or if it uses more aggressive incentives or disincentives, it will need to consider its latitude to do so under the federal CAA and EPCA preemption rubrics. In either instance, FAAAA considerations may come into play as well. This part discusses legal considerations associated with LEDZ and ZEDZ approaches. This Part V does not discuss further the state law questions but rather goes directly to a discussion of the more broadly applicable federal law considerations.

D.1. Mandates & Incentives Within Federal CAA and EPCA Preemption Rubric

Though a city's authority to regulate many aspects of its streets is frequently relatively clear under state law, the city must also abide by federal law limitations on actions that make use of ZEVs less than voluntary, including where any city-offered incentives might amount to a *de facto mandate*. Part I.A.3 of this memorandum, above, discusses the mandate/incentive/*de facto* mandate distinction in detail. A city or state enabling a ZEDZ would generally want to ensure that non-ZEVs could still drive through the ZEDZ and that any pricing differentials were not so large as to amount to a *de facto* mandate. This would be a fact-specific analysis. The jurisdiction would also want to take care that any ZEDZ program avoided regulating the "price, route, or service" of motor carriers transporting property, as is preempted by the FAAAA.²⁵⁵ Presumably, allowing some access to freight trucks to operate on their normal routes would suffice for this purpose.

One likely exception is for activities on a public entity's *own* property – the land and buildings that it holds for its operations. Many of the federal law considerations outlined in Part I of this memorandum have *market participant exceptions* that allow governmental entities to use their own property or funds in ways that would be preempted if they were regulatory actions. For example, a city acts in its role as a market participant when it procures ZEVs for its fleet or installs EV chargers for its city buildings. EPCA has a statutory market participant exception,²⁵⁶ and federal courts have read a market participant exception into the CAA,²⁵⁷ though these both have to do with procurement of vehicles, not use of property.

D.2. FAAAA Considerations

²⁵⁵ 49 U.S.C. § 14501(c)(1) (2015).

²⁵⁶ 49 U.S.C. § 32919(a) (1994).

²⁵⁷ Engine Mfrs. Ass'n vs. South Coast Air Quality Mgmt. Dist., 498 F.3d 1031, 1040 (2007).

As established above, the FAAAA preempts state and local laws that are "related to the price, route, or service of any motor carrier... with respect to the transportation of property,"²⁵⁸ and can do so even where the relationship is indirect.²⁵⁹ That is to say, local and state laws that have indirect impacts on the price, route, or service of motor carriers can be disallowed by the FAAAA, even if those impacts were not intended. Size and weight restrictions for vehicles (like mapped truck routes) and a state or city's actions as a market participant are carved out from FAAAA preemption.

Without more specificity as to the mechanisms a city might use within a LEDZ or ZEDZ, it is difficult to assess whether those measures would "relate[] to the price, route, or service" of freight-transporting vehicles, but they could. For example, if companies were required to replace delivery vehicles with ZEVs in order to enter a place they needed to access to do business, that could change the price of freight delivery services. If some freight transport or delivery vehicles had to shift their activities to warehouses outside of the LEDZ or ZEDZ, that would by definition change the route of that freight transportation or delivery service. If non-ZEVs had to pay significantly more to enter a LEDZ or ZEDZ, that would "relate[] to the price... of a motor carrier." If, on the other hand, those non-ZEVs could still largely use the LEDZ or ZEDZ, the arguments against FAAAA preemption would be stronger. The size-and-weight carveout from preemption might offer some protection depending on the design of the zone, but would be less useful if a city is still trying to attract larger zero-emissions freight vehicles. All of this is highly detail dependent.

²⁵⁸ 49 U.S.C. § 14501(c)(1) (2015).

²⁵⁹ Rowe v. N.H. Motor Transp. Ass'n, 552 U.S. 364 (2008).

VII. CONCLUSION

VII. CONCLUSION

The widespread nature of e-commerce warehouses is a relatively new phenomenon. So, too, is the work by cities to address the truck pollution attributable to these sources. It takes some effort to overlay state and local regulation of e-commerce warehouses with existing federal law, but it can be done. Tools embedded in the CAA itself reflect a federalist approach and allow state (and by extension, some local) controls on air pollution through SIPs and Section 209 implementation waivers. Even where these tools are not available, the CAA, EPCA and the FAAAA allow some room for local governments to place limits or otherwise address pollution and other e-commerce impacts.

In particular, tools that are novel for the purposes of regulating emissions associated with freight transportation but that are well-used features of the Clean Air Act can help both advance approaches to control freight transportation emissions and act as cudgels to preemption by federal law. California's Advanced Clean Fleets Rule, which is poised to allow for significant reductions in emissions from drayage trucks, among other vehicles, may in the coming years be widely available for adoption by states across the country, allowing cities to benefit from its promise in reducing transportation GHG emissions and communities to experience less local tailpipe pollution. Waivers under Section 209 of the CAA have long helped seed ambitious policies to reduce tailpipe pollution across the country, and – pending CARB's waiver request – may yet serve the same purpose here.

Section 110 of the CAA can also offer a pathway for rules to regulate the indirect sources of freight vehicle emissions by placing requirements on last-mile warehouses and distribution centers. The CAA expressly allows indirect source rules as a component of SIPs for states with nonattainment areas, and USEPA appears poised to approve California's inclusion of SCAQMD's indirect source rule as an element of the state's SIP. Local or regional jurisdictions, working with their states, may be able to develop similar approaches for eventual inclusion their states' SIPs as well.

Even where a Section 209 waiver or a SIP approval by USEPA is not available or appropriate, local governments often still have options to advance elements of these policies in carefully tailored ways. An indirect source rule for warehouses, for example, can be crafted to offer sufficient optionality that it does not compel the purchase of ZEVS and thereby invite preemption by the CAA and EPCA, and such that it does not impose significant costs or route or service changes on motor carriers. Similarly, elements of ACF, particularly as relate to registration for the limited purpose of entering certain areas, could be structured to avoid CAA preemption.

In cities where, for reasons legal, political, financial, or otherwise, indirect source rules or drayage truck requirements aren't near-term options, several voluntary or lightly enforced (as through a parking ticket) approaches remain to shape zero-emissions delivery zones. As with all of the approaches covered in this paper, the details are important. What mix of options can shape a ZEDZ without imposing a *de facto* mandate for drivers or freight companies to purchase EVs (as could be preempted by the CAA or EPCA) depends on what other options remain for them.

Despite the relatively recent nature of e-commerce proliferation, last-mile delivery warehouses perpetuate longstanding patterns of environmental injustice, exposing low-income communities and communities of color to significant and harmful truck pollution. The legal tools available to address their impacts are necessarily evolving, and they offer significant promise, particularly for jurisdictions willing to calibrate an approach carefully to applicable legal frameworks and to their local context. For many cities, addressing the impacts of e-commerce is a necessity, through one approach or another. Last-mile delivery has once again laid the pollution burden with low-income communities and communities of color. Fortunately, many cities have a range of imperfect but promising legal tools to mitigate its harm.