



Dallas-Fort Worth
CLEAN CITIES

Dallas-Fort Worth Clean Cities Coalition: Networking for Solutions

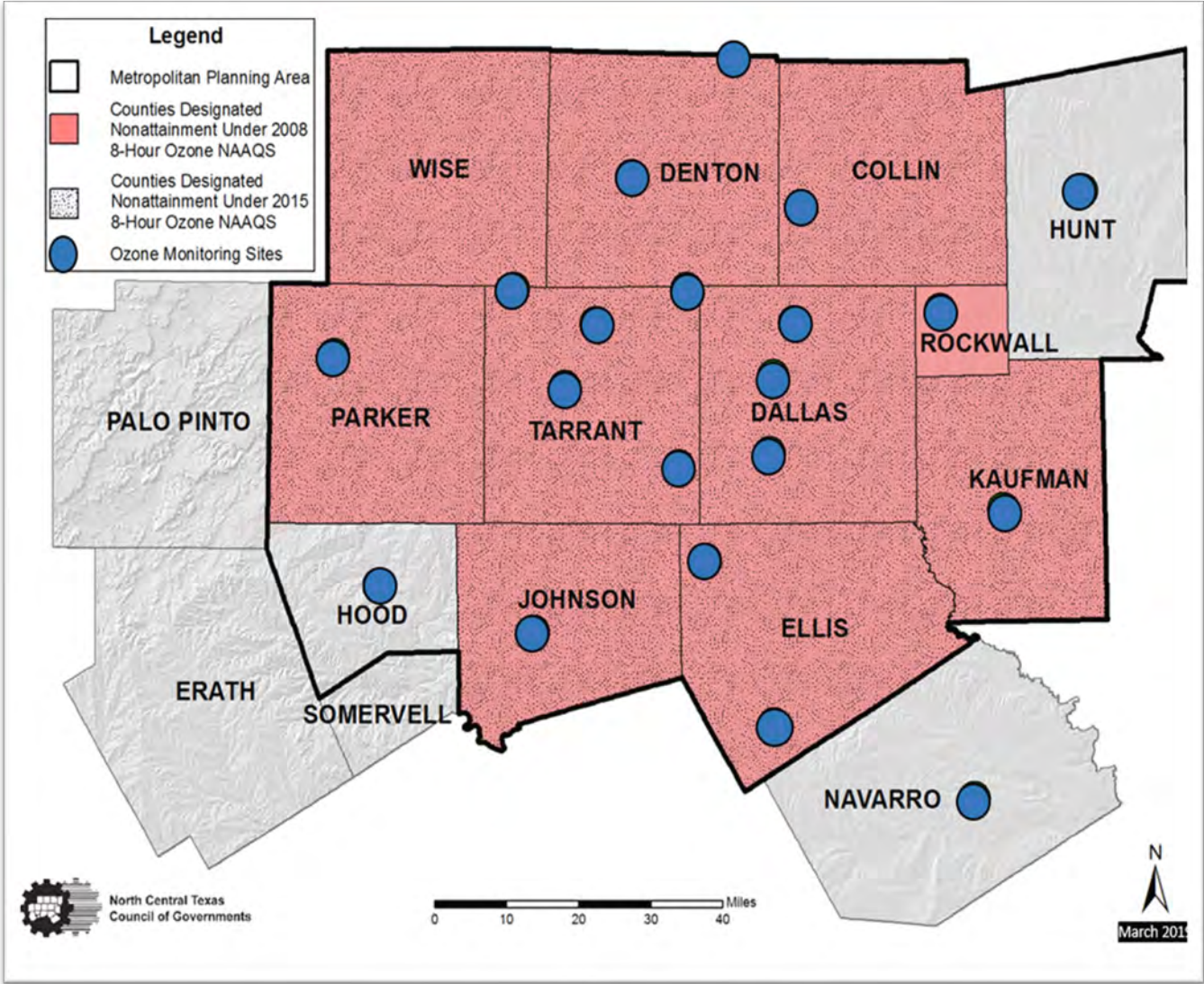
Lori Clark

Program Manager & DFW Clean Cities Director

**RCE North Texas Annual Summit
SDG 9 Panel: Industry, Innovation, and
Infrastructure**

November 9, 2022

Who We Are



Regional Planning Agency



Metropolitan Planning Organization (MPO)

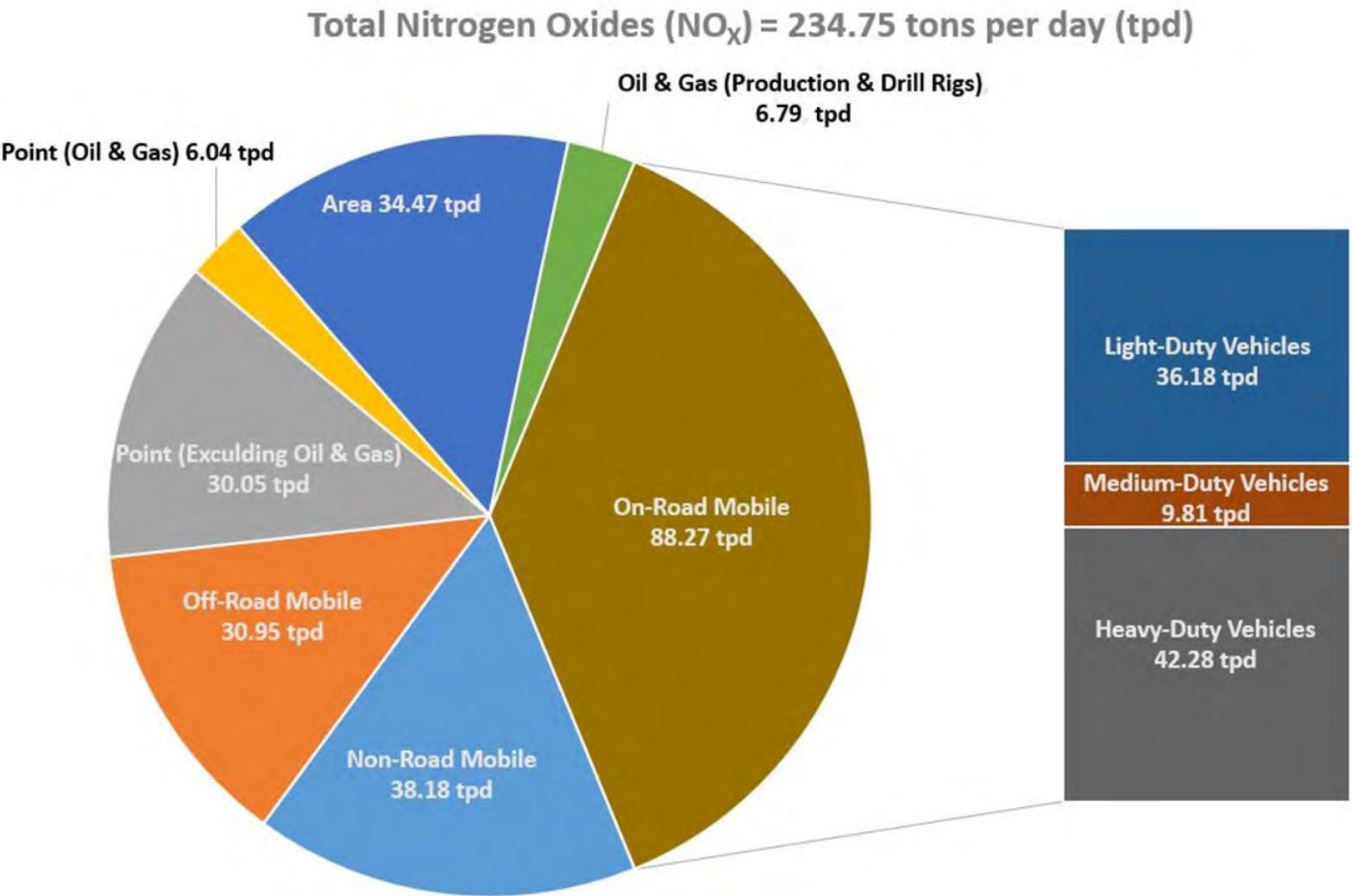


Local Clean Cities Coalition



DFW Clean Cities Coalition:
Networking for Solutions

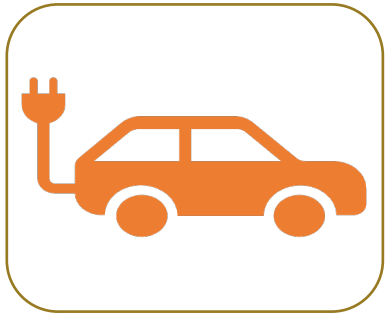
Nitrogen Oxides Emissions Sources



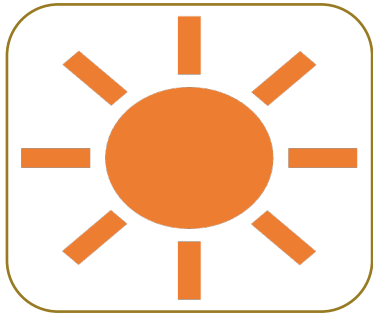
Source: Dallas-Fort Worth Serious Classification Attainment Demonstration State Implementation Plan Revision for the 2008 Eight-Hour Ozone National Ambient Air Quality Standard, September 2019



Clean Cities Portfolio



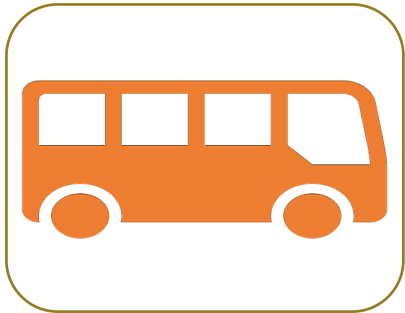
Light-, Medium-, and Heavy-Duty Vehicles



Alternative and Renewable Fuels and Infrastructure



Idle Reduction Measures and Fuel Economy Improvements



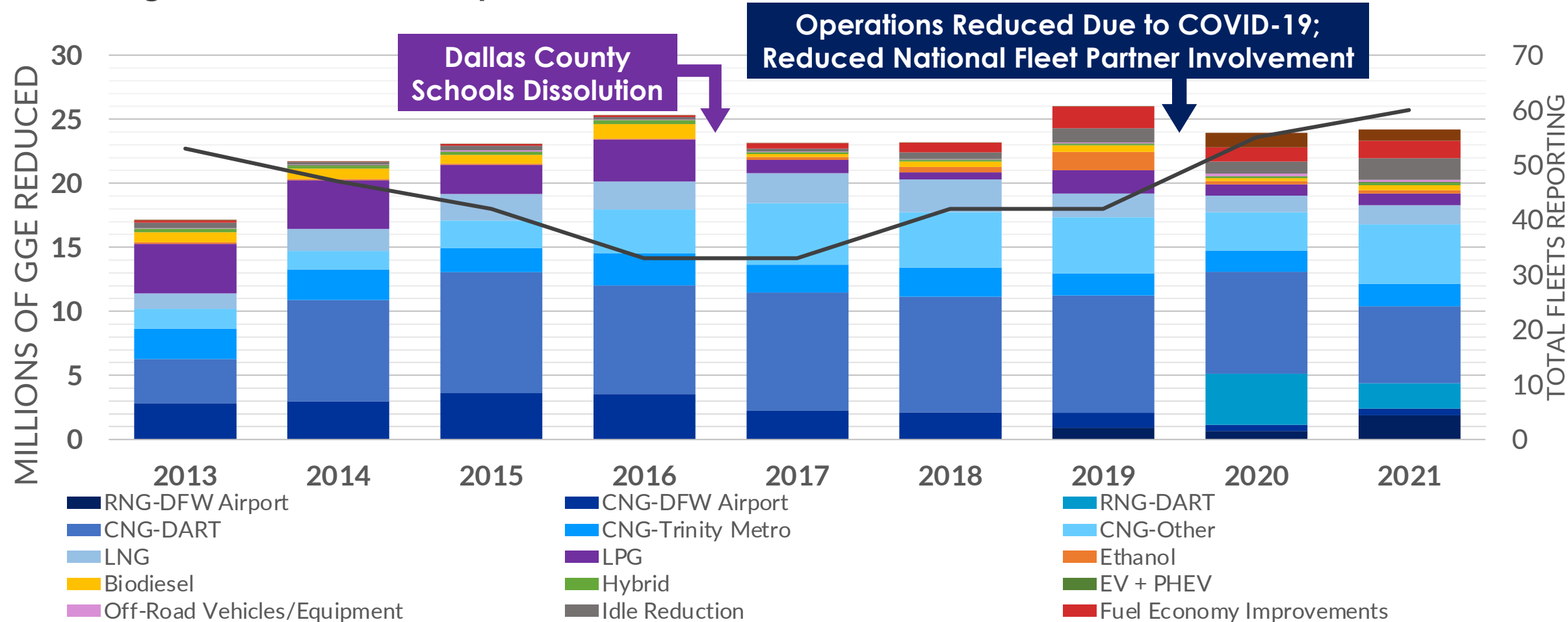
New Mobility Choices and Emerging Transportation Technologies

 Electricity	 Hydrogen	 Fuel Economy
 Natural Gas	 Propane	 Idle Reduction
 Ethanol	 Biodiesel	



Trends in Annual Energy Impact

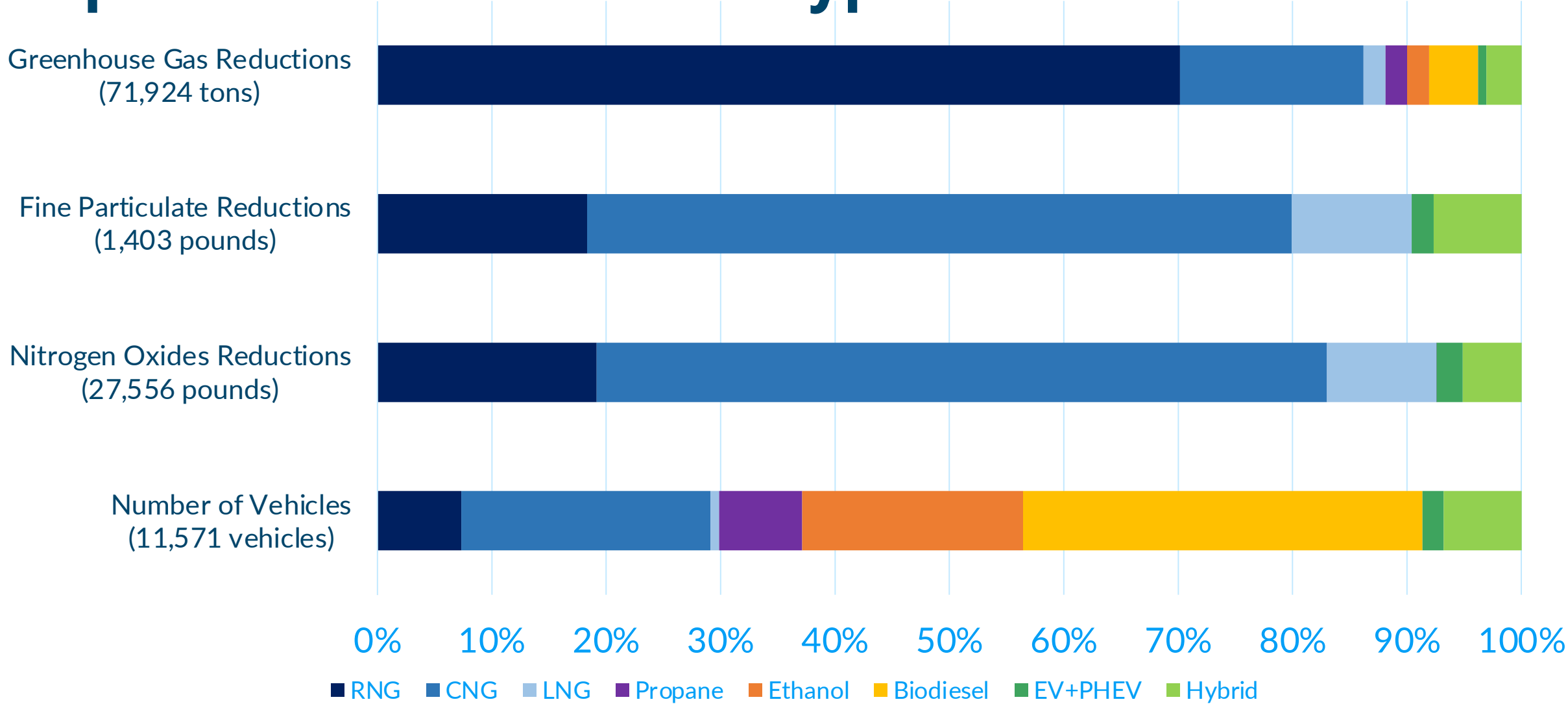
Department of Energy Goal: Increase GGE Reductions 16% Year Over Year
2021 Target: 27.79M, 2021 Reported: 24.19M



RNG-Renewable Natural Gas; CNG- Compressed Natural Gas; LNG- Liquified Natural Gas; LPG- Liquified Petroleum Gas; EV- Electric Vehicle; PHEV-Plug-In Hybrid Electric Vehicle



Impact of Various Fuel Types



RNG-Renewable Natural Gas; CNG- Compressed Natural Gas; LNG- Liquified Natural Gas; LPG- Liquified Petroleum Gas; EV- Electric Vehicle; PHEV-Plug-In Hybrid Electric Vehicle



What We Do



Funding Support

Assist with
Navigating
Programs and
Developing Grant
Applications

Administer
Funding



Technical Assistance

Maintain and Analyze
Data

Hold Webinars,
Workshops, Peer
Exchange

Develop Best Practices
and Template Resources



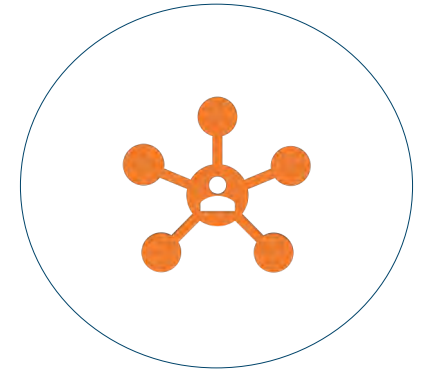
Planning the Future

Alternative Fuel
Corridors

Texas EV Charging
Plan

ZEV Infrastructure

Organic Waste to RNG
Feasibility Study



Raising Awareness

Facilitating
Relationships

National Drive
Electric Week

Fleet Recognition

Success Stories and
Community Events



Electric Vehicle Market Trends

Over half of new vehicle sales forecasted to be electric by 2030

-[Bloomberg New Energy Finance](#), September 2022

42% of medium- or heavy-duty truck sales forecasted to be zero emissions by 2030, assuming **economics** drive adoption

-National Renewable Energy Laboratory, [Decarbonizing Medium- and Heavy-duty On-ad Vehicles: Zero-Emission Vehicles Cost Analysis](#); March 2022

To serve projected 22 million electric vehicles by 2030, need 10-fold increase in charging stations

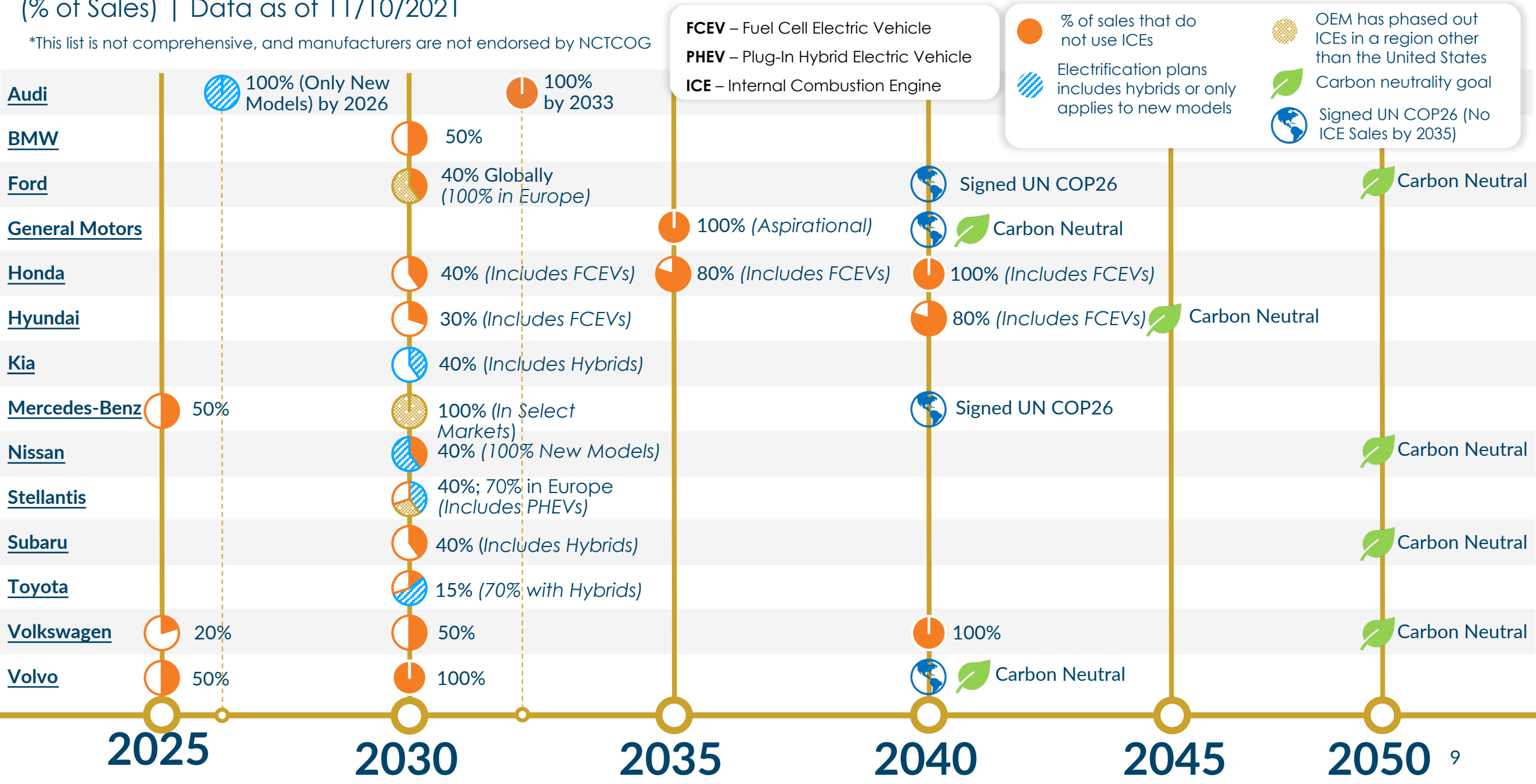
-[Governing.com](#), December 2021



Electrification Transition Goals Of Manufacturers

(% of Sales) | Data as of 11/10/2021

*This list is not comprehensive, and manufacturers are not endorsed by NCTCOG



EV Data And Trends

EV Registration Data

www.dfwcleancities.org/evnt -> EVs and Texas

As of October 31, 2022:

~155K EVs in Texas

September 2021:

~93K EVs in Texas

Charging Station Dashboard

https://txdot.mysocialpinpoint.com/tx_ev_pla

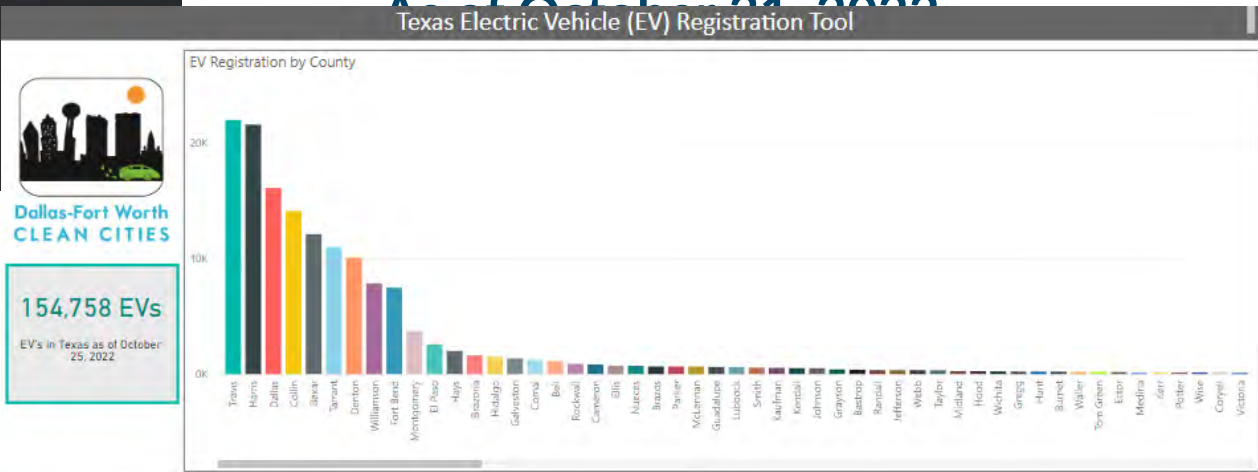
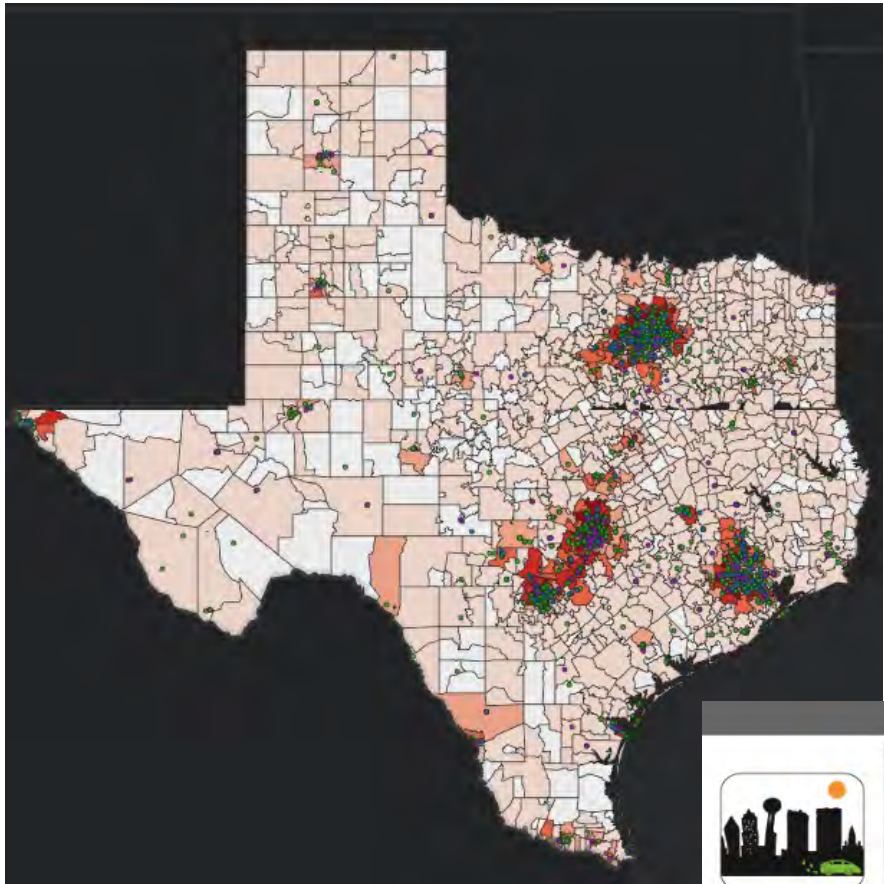
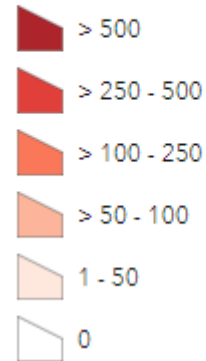
As of October 31, 2022

EV Charging Type

- DC Fast Charge
- Tesla
- Level 2

Zip Code EV Registration

Electric Vehicles



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EV Adoption and Infrastructure Availability

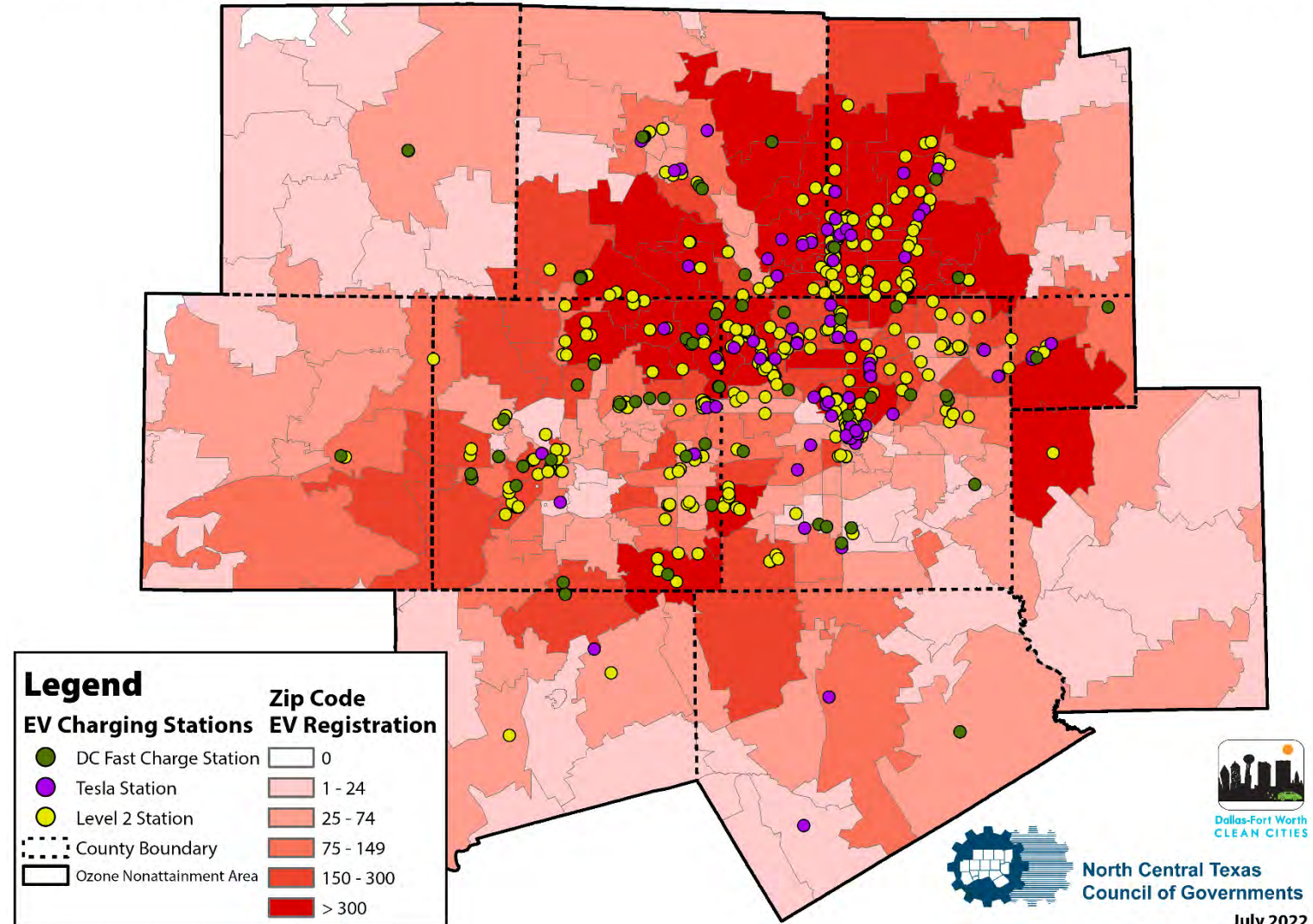
County	Level 2 Plugs*	DC Fast Charge Plugs*
Collin	217	2
Dallas	529	18
Denton	78	15
Ellis	0	4
Johnson	5	1
Kaufman	2	0
Parker	2	1
Rockwall	9	5
Tarrant	313	28
Wise	2	0

*As of July 2022;
Excludes Tesla Stations



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EV Registration and EVSE in Ozone Nonattainment Area

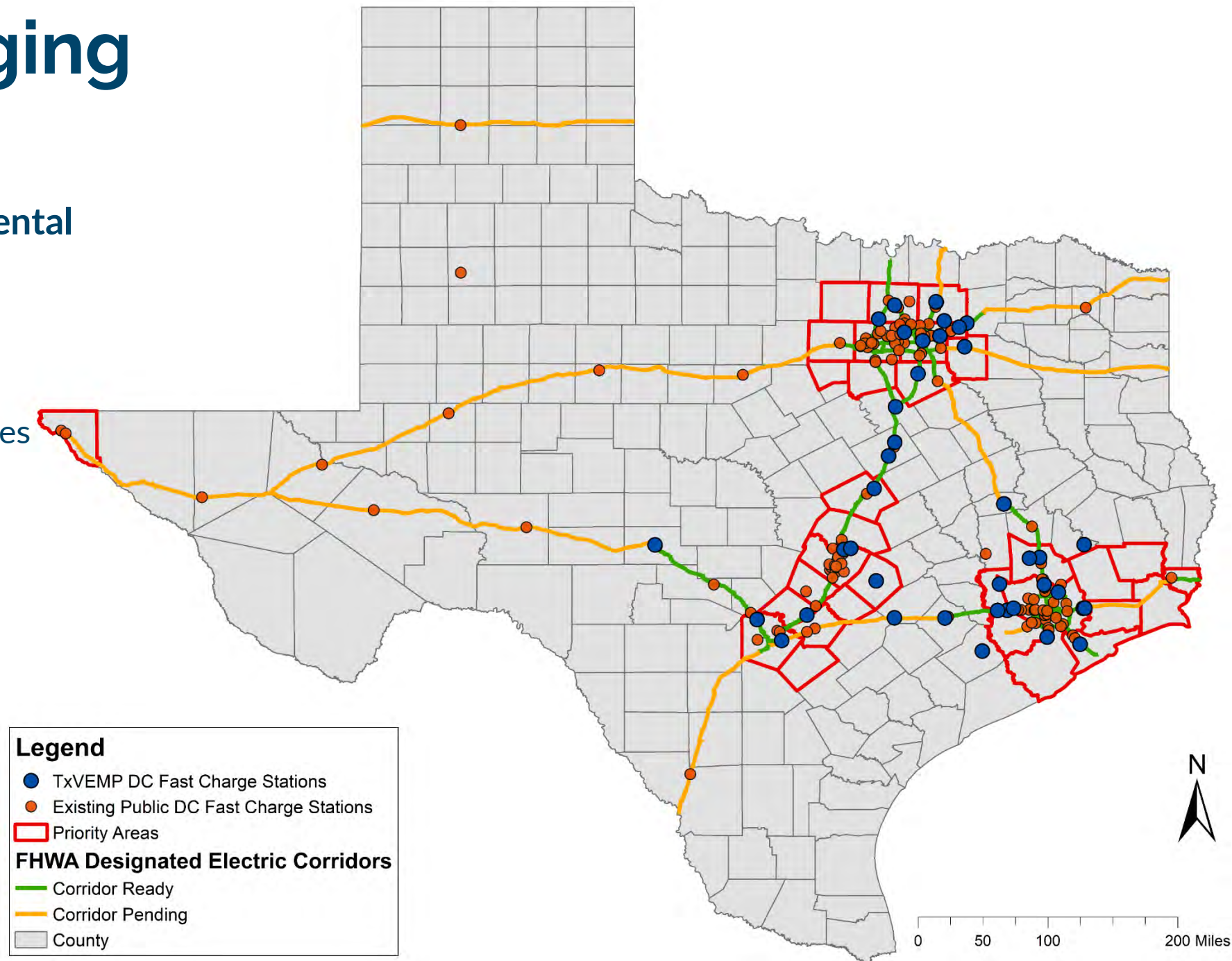


North Central Texas
Council of Governments
July 2022

DC Fast Charging Across Texas

Texas Volkswagen Environmental Mitigation Program:

~\$20.9 Million DC Fast Charging
170 Plugs at 41 Sites
96% of Funds to Fuel Retailer Sites



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*Existing Station Data from Department of Energy Alternative Fuel Station Locator as of January 2021

Highlights Of Texas EV Charging Plan

Plan Posted at [Texas electric vehicle planning \(txdot.gov\)](https://www.txdot.gov/electric-vehicle-planning) - \$408M Total

Year
1

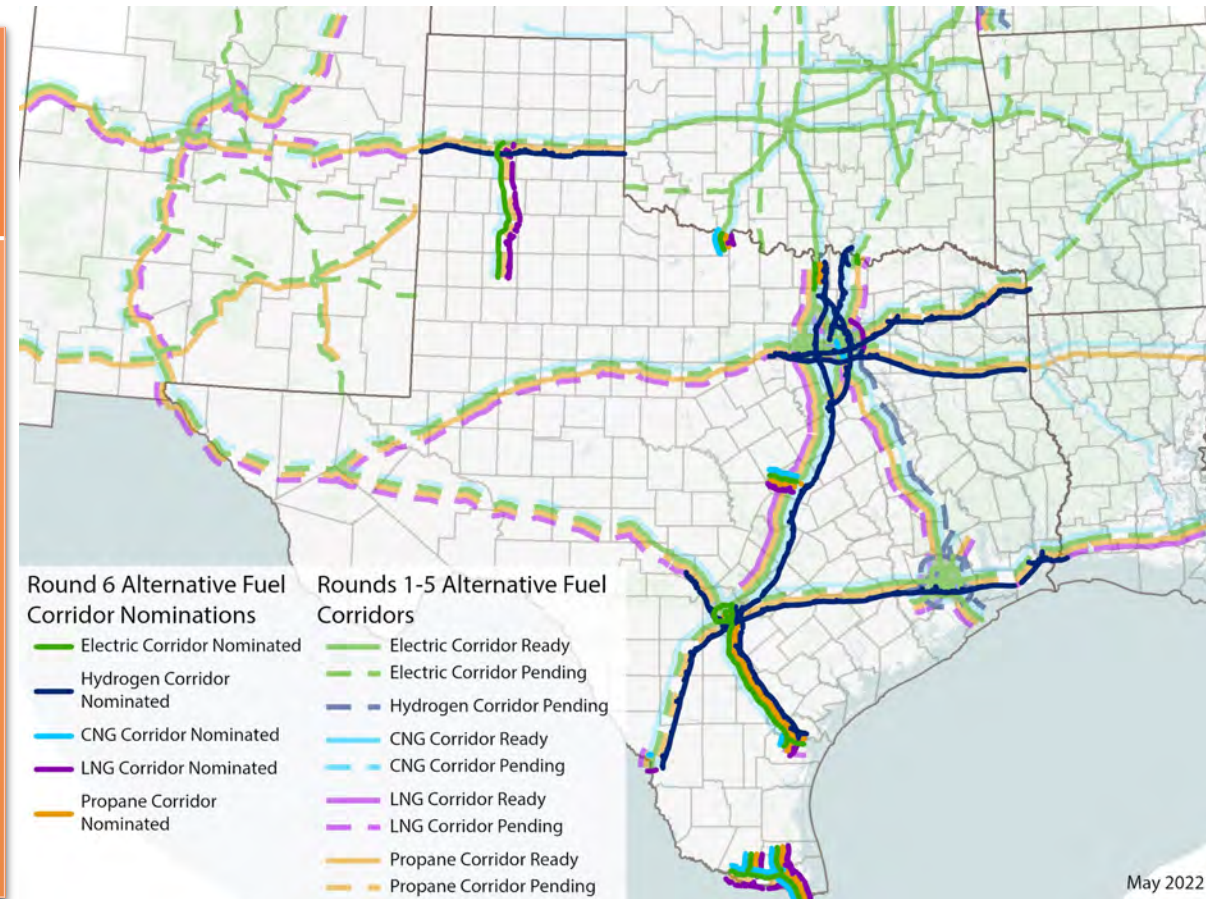
Install DC Fast Chargers Along Alternative Fuel Corridors
(~55 Stations Statewide; \$48.5M Federal)

Years
2-5

Work with Counties and Small Urban Areas to Install DC Fast Charge Sites In/Near County Seats
(Estimated 190 Locations, \$159.7M Federal)

Work with MPOs to Identify Locations and Appropriate Combination of Charging Sites
(Number Locations TBD, Estimated \$198.92M Federal)

NCTCOG Area: ~\$64.5M



**For Reference: 290 DC Fast Charging Sites
Statewide as of October 31, 2022**



Medium- and Heavy-Duty Truck Impact on Regional Air Quality

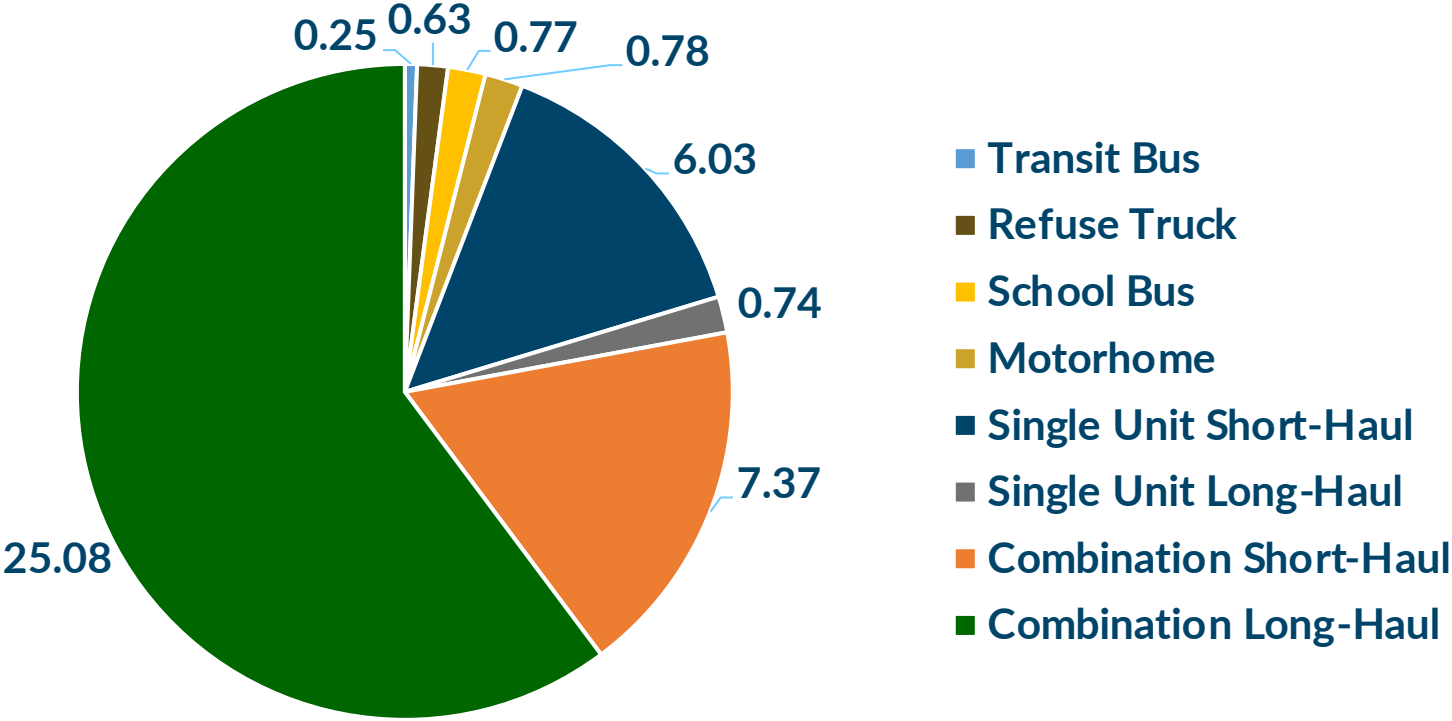
Medium/Heavy Duty Vehicle Impacts:

- ~5 % of Miles Traveled
- ~40% of Nitrogen Oxides (NO_x)

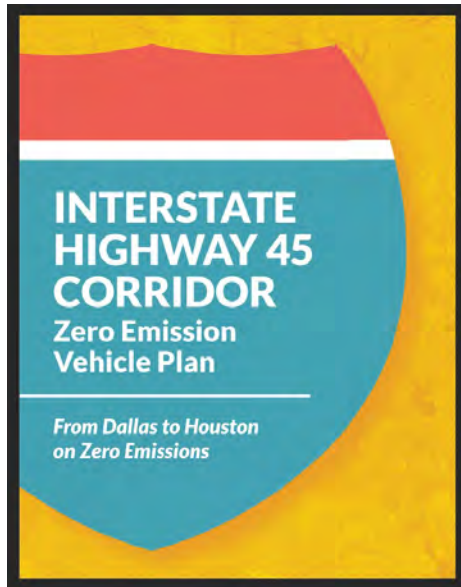
Key Factors in Choosing Zero Emission Vehicle (ZEV) Platform:

- Weight
- Refueling Time
- Range (Route Length)

NO_x Emissions in Tons per Day by Medium/Heavy-Duty Vehicle Type



IH 45 Corridor Zero Emission Vehicle Infrastructure Plan



Provide Actionable Recommendations to Facilitate ZEV Deployments:

Battery Electric

Hydrogen Fuel Cell Electric

Support Future Strategic Initiatives

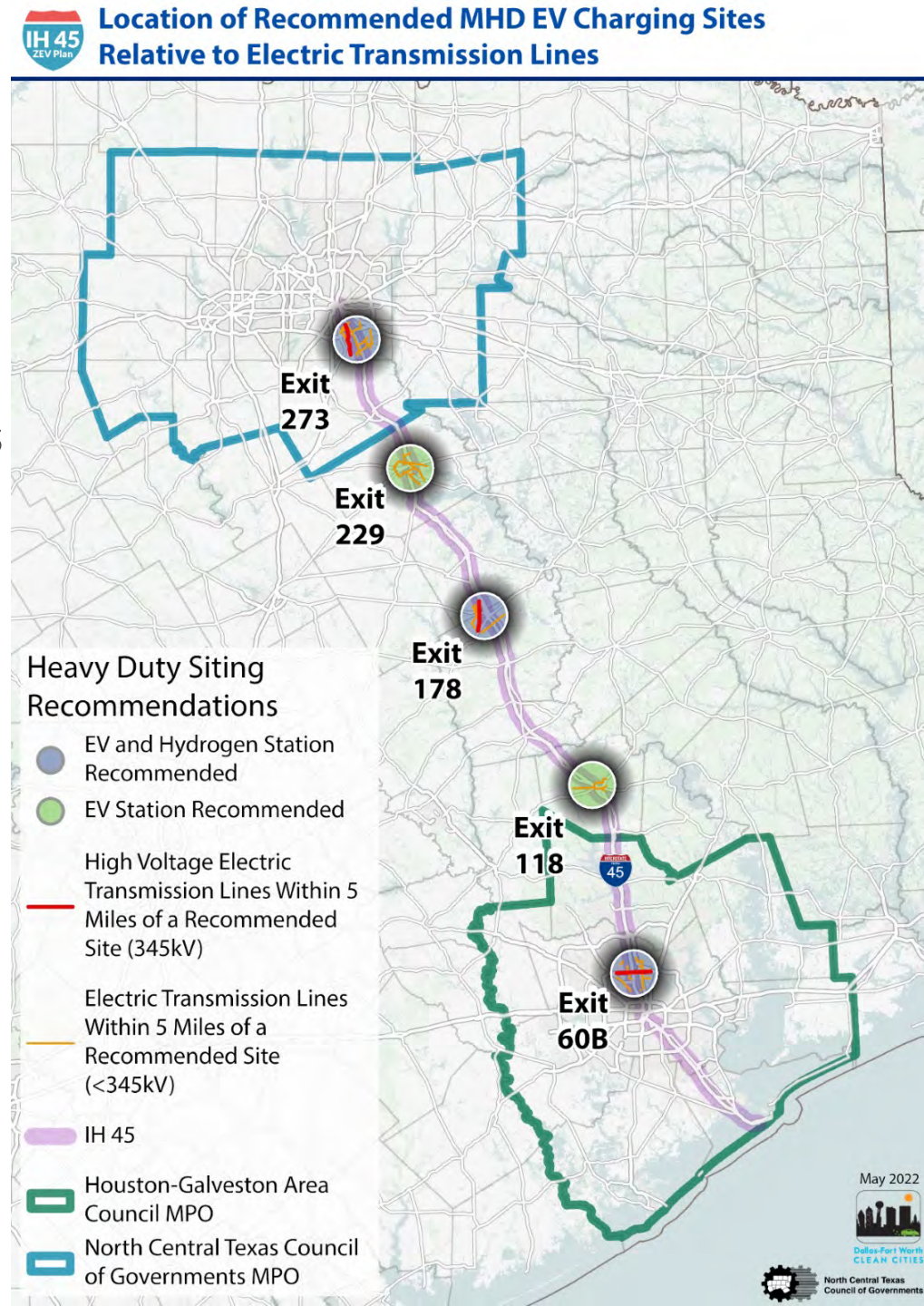
(e.g., Autonomous Vehicles)

Engage Wide Range of Stakeholders

www.nctcog.org/IH45-ZEV



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Contact Us



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www.dfwcleancities.org

www.nctcog.org/airquality



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