



North Central Texas
Council of Governments



Dallas-Fort Worth
CLEAN CITIES

2022 DFW Clean Cities Fleet Recognition Awards

November 1, 2022



Agenda

1:30 – 1:35 Introduction

1:35 – 1:50 Oncor Fleet Electrification Program – Jennifer Deaton, Oncor

1:50 – 2:05 City of Dallas Electrification Study – Donzell Gipson, City of Dallas

2:05 – 2:35 DFWCC Annual Survey Results and Fleet Recognition Awards

2:35 – 3:00 Dessert/Fleet Recognition Group Photo



Oncor's Clean Fleet Partnership Program and Analysis

.....
October 17, 2022



Objective of the Clean Fleet Partnership Program and Analysis



What Problems are we solving

- What does EV Fleet electrification look like for the Oncor service territory in the coming years?
- How does Oncor proactively prepare for the potential load this could bring?
- How do we educate and streamline our process for EV fleet customers?

What is the solution?

- Provide outreach and education to Oncor's fleet customers about electrification from Oncor's perspective
- Create a systematic way to quantify EV electrification impact to the Oncor grid

What is the value proposition?

- Predictive targeting of fleet load growth from the customer outreach and the analytics perspective. We can not do that work without a foundation of a trackable customer platform and an analysis model

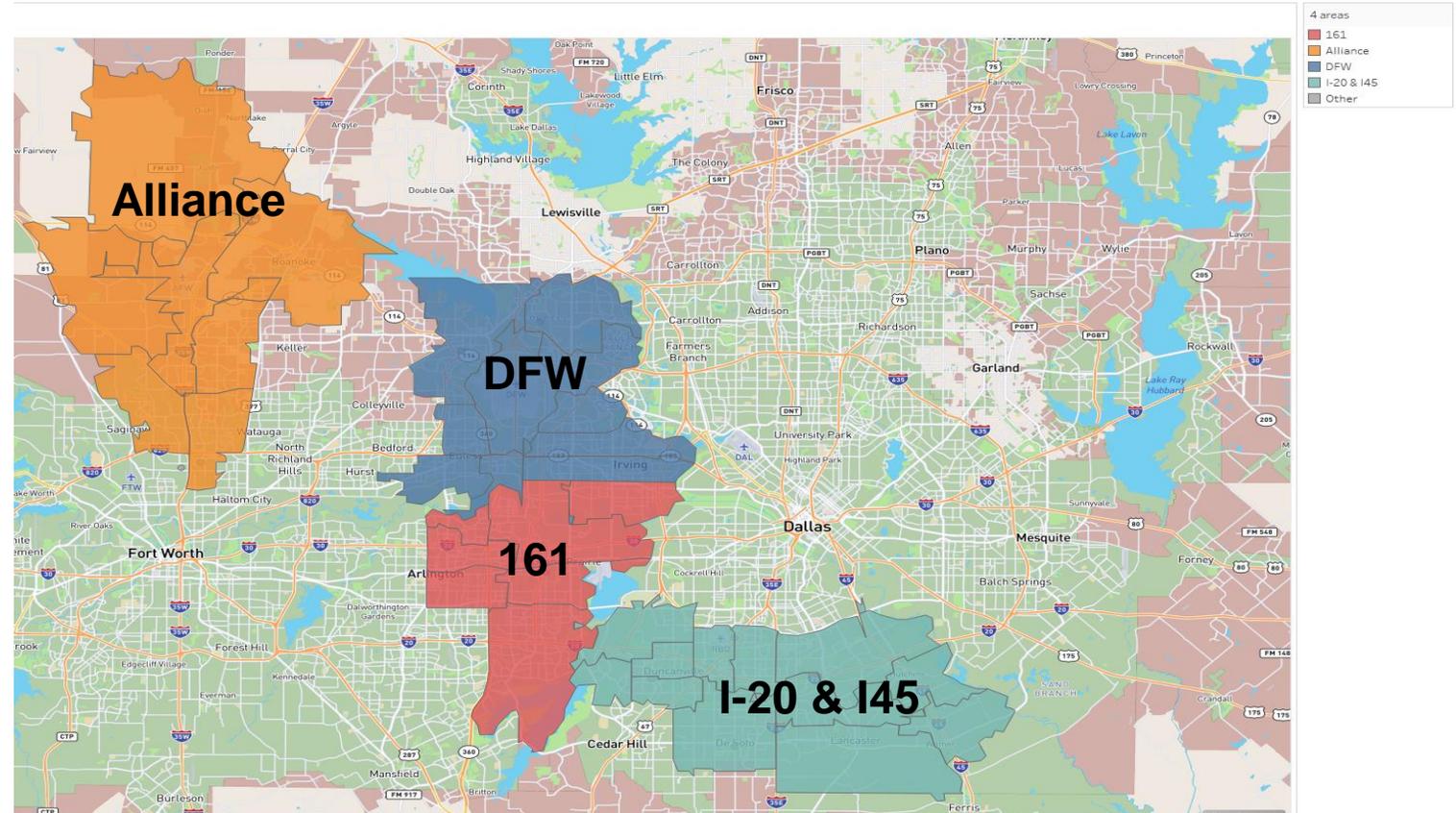
Background Information

Fleet Statistics

- North Texas has over 24,000 commercial fleets.
- With over 305,000 vehicles
- Serving approximately 12.9% of all US freight
 - *more than next two states combined*

Fleet areas of concern for Oncor

- 161
- Alliance
- DFW
- I-20 & I45



Objective of the Clean Fleet Partnership Program and Analysis



Program Objectives

- Provide outreach and education to Oncor's fleet customers about electrification from Oncor's perspective
- Create a systematic way to quantify EV electrification impact to the Oncor grid

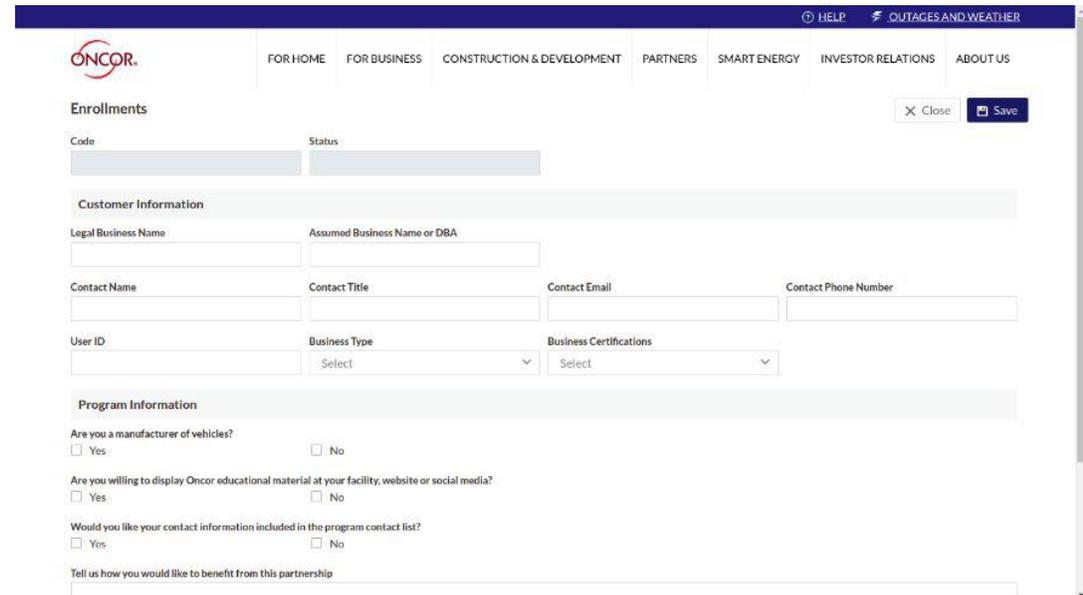


The Fleet Partnership Portal

The Fleet Partnership Portal



- Customers will enroll through the Clean Fleet Partnership Program (CFPP) portal on the Oncor.com/EV website
- The customer will provide Oncor their fleet electrification plans – This is intended to be a precursor to the customer portal and Serve New process
- Oncor will set up a meeting to provide the customer education material. All departments invited and welcome to attend



The Fleet Partnership Portal



WELCOME MAHARAJAN SANKAR, YOU ARE LOGGED IN AS Fleet Representative

ONCOR ELECTRIC VEHICLES PORTAL

DASHBOARD ENROLLMENTS TRAINING GUIDES

ENROLLMENTS

All Records

Code	Business Name	Business Type	Total Fleet Size (# Vehicles)	Contact Name	Contact Title	Workflow Status	Created
ENR-007	Walmart Inc.	Private company	5000+	Owen Clarke	Fleet Manager	Submitted	oncor
ENR-008	Amazon.com, Inc.	Private company	5000+	John Doe	Fleet Manager	Draft	oncor

Total 2 10/page 1 Go to 1

- With the data from the portal Oncor can start to understand where fleets are electrifying and how much load the customer will be requiring for their electrification plans
- This data will enable us to find hot spots on the service territory and quantify the impact to the grid

TRACK+ Search Welcome Srivatsan MM, You are logged in as Business Part

Enrollments Comments X Close Save Submit Submit

Code ENR-008 Status Draft

Customer Information

Legal Business Name Amazon.com, Inc. Assumed Business Name or DBA Amazon

Contact Name John Doe Contact Title Fleet Manager Contact Email srivatsan@anbystems.com Contact Phone Number (376) 599-7236

User ID jdoo Business Type Private company Business Certifications N/A

Program Information

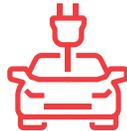
Are you a manufacturer of vehicles?
 Yes No

Are you willing to display Oncor educational material at your facility, website or social media?
 Yes No

Would you like your contact information included in the program contact list?
 Yes No

Tell us how you would like to benefit from this partnership

TRACK+ | Production: Oncor EV Copyright © 2022 ANB Systems. All rights reserved. Version: v0.1.90 | Privacy Policy



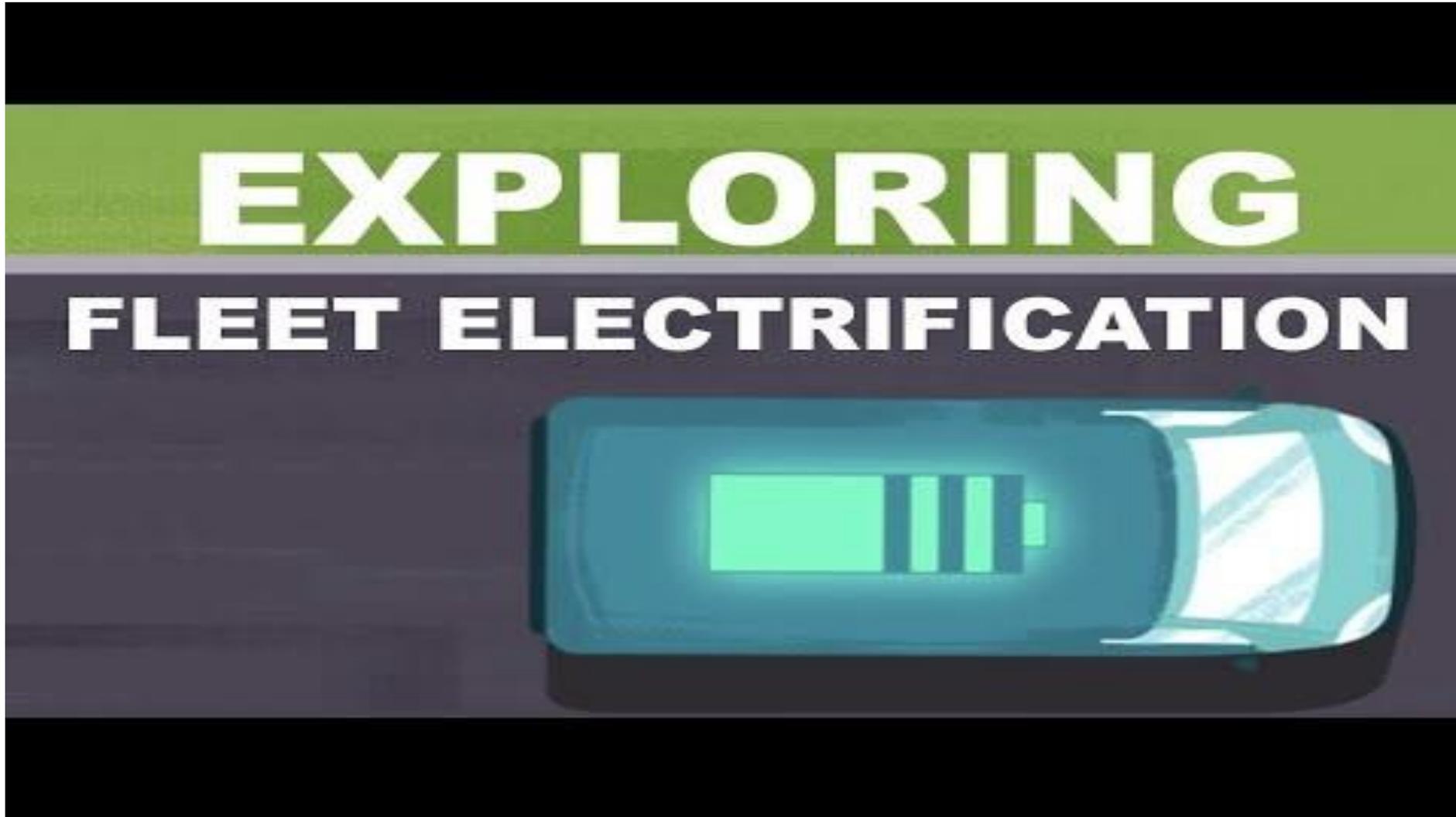


The Fleet Partnership Program Education Material

The Fleet Partnership Program Education Material – Content Partners



Education Owner	Content	Group
Richard Sorell	Customer billing, demand charges and tariffs	Customer Relations
Michael Stephens	Overview of load growth, general grid education and regulations	Distribution Planning
Jim Painter	Solar, battery and interconnections	Distributive Generation
Garry Jones	Smart charging, energy conservation, consumption patterns and charging pilots	Energy Efficiency
Craig Robicheaux	How the C&I team works (if load applicable to that customer)	Large C&I
Ryan Folger	Serve New and construction processes	PMDS
Chris Rowley	REP vs Oncor roles and responsibilities	REP Relations

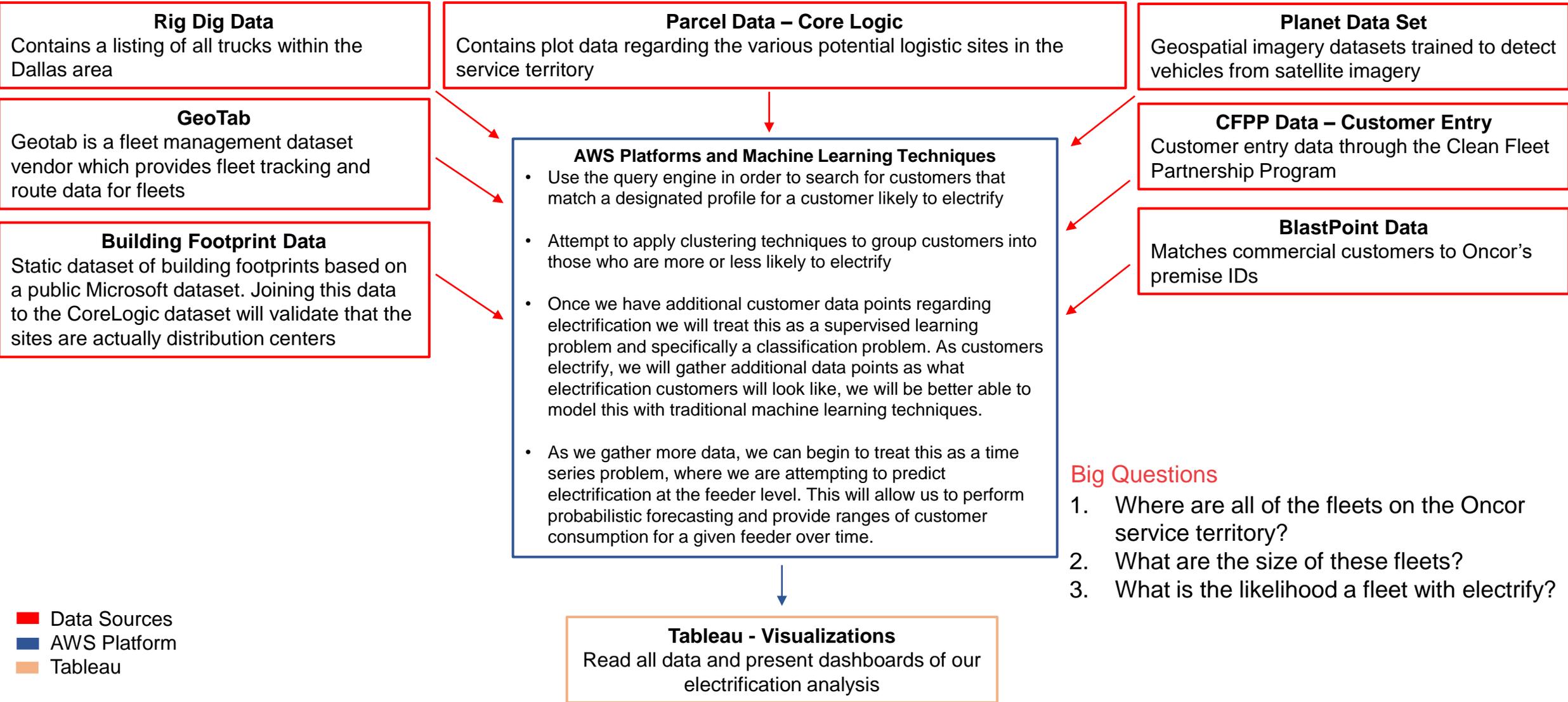


- We are building a series of education videos to be played for our partnership customers. We will also be sending the video to EV OEMs to be played in their dealership showrooms



The Clean Fleet Analysis

The Clean Fleet Analysis - How it works



■ Data Sources
■ AWS Platform
■ Tableau

Big Questions

1. Where are all of the fleets on the Oncor service territory?
2. What are the size of these fleets?
3. What is the likelihood a fleet with electrify?



City of Dallas

City of Dallas Fleet Electrification Study

**NCTCOG Briefing
November 1, 2022**

Donzell Gipson, Director
Equipment and Fleet Management
City of Dallas

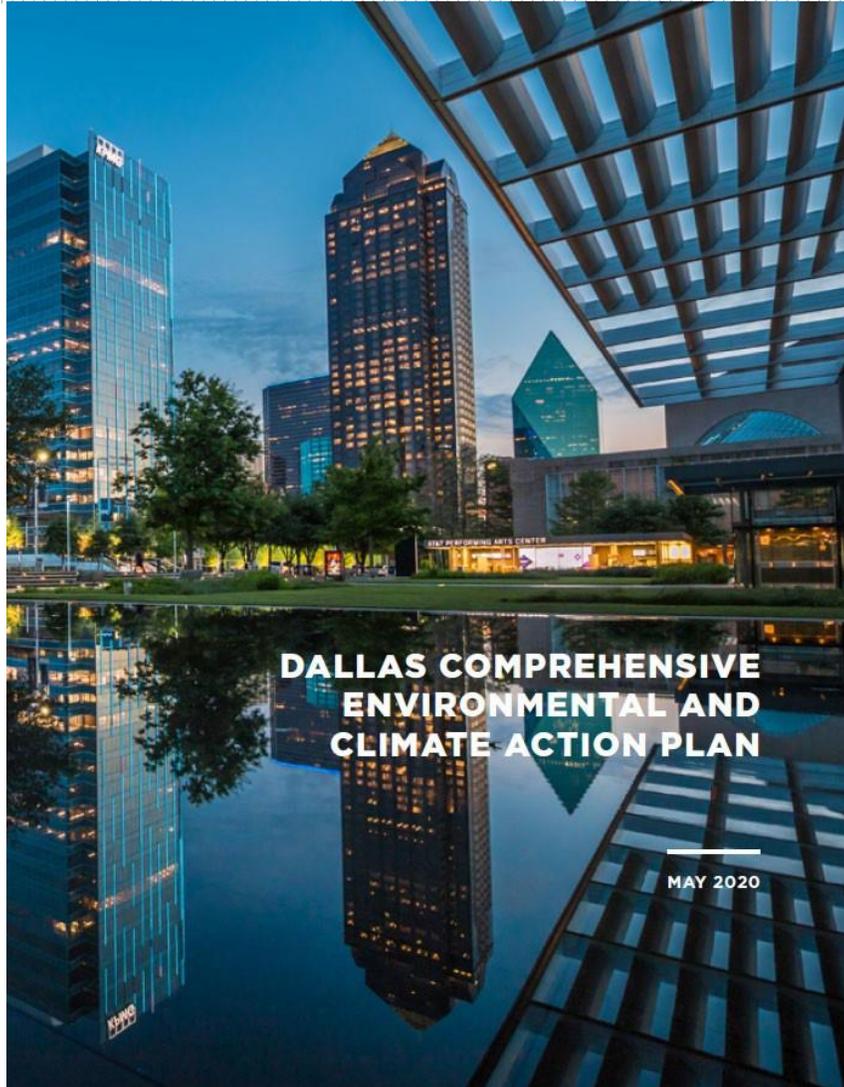
Presentation Overview



- Comprehensive Environmental Climate Action Plan (CECAP)
- Background/History
- Purpose
- NREL Approach to Fleet Electrification Study
- Results of NREL Analysis
- Fleet Electrification Study Deployment Update



Comprehensive Environmental Climate Action Plan (CECAP)



Dallas Comprehensive Environmental and Climate Action Plan (CECAP)

- The Intergovernmental Panel on Climate Change (IPCC) recommends **reducing GHG emissions to net zero by 2050** to limit the increase in global temperatures to below 1.5°C.
- The City of Dallas is **committed to meeting the international emission reduction targets** set by the Paris Agreement in 2016.
- The 2015 greenhouse gas (GHG) inventory reported that **35% of Dallas' GHG emissions come from transportation sector**.
- The CECAP provides a roadmap for the City to improve quality of life, **to reduce greenhouse gas emissions**, to prepare for the impacts of climate change, and to create a healthier and more prosperous community.



Background/History



Electrification of Fleet Assets

In support of CECAP adoption, an amendment approved in the FY2021 Budget provided funds for fleet electrification study (\$100k)

- On May 26, 2021, the City Council awarded a contract to the National Renewable Energy Laboratory (NREL) to conduct the study.
- NREL is a national laboratory of the U.S. Department of Energy, Office of Energy Efficiency and Renewable Energy. The Alliance for Sustainable Energy LLC., operates the NREL Laboratory.
- The study allows the City to develop the most effective and efficient policies and operational strategies for deployment and sustainment of electric vehicle technology in alignment with CECAP.



Purpose



This briefing will:

- Provide highlights from Fleet Electrification Study completed by NREL and status update on next steps





NREL Approach to Fleet Electrification Study





Fleet Electrification Considerations

- What are the overall goals of the Dallas fleet electrification plan?
- Where are the best opportunities for fuel reduction and emissions reduction?
- Which vehicle duty cycles are suitable for electrification?
- Which vehicles are eligible for electrification (i.e., non-emergency response or non-special purpose vehicles)
- Which vehicles are nearing retirement or overdue for replacement?
- Which vehicles have an electric model that's commercially available today?
- Which vehicles have dedicated parking locations suitable for charging equipment?
- Which communities or regions of the city stand to benefit the most from lower emissions and improved air quality?
- What are the vehicle-life economics and what factors influence economic payback and GHG savings

Data-driven Analysis Approach

Vehicle Inventory

- Number of vehicles by department
- Vehicle class/type by department
- Vehicle age

Vehicle Operation

- Annual vehicle miles traveled (VMT) by department and vehicle type
- Estimated daily miles traveled per vehicle

Fuel/Energy Consumption

- Annual fuel consumption by department and vehicle type
- Estimated daily energy consumption per vehicle

Vehicle Replacement Criteria

- Review of replacement eligibility criteria
- Review of replacement ranking, year and cost by vehicle

EV Availability

- Alternative Fuels Data Center (AFDC) Advanced Vehicle Search tool
- Review of commercially available EVs by vehicle class and type
- MSRP values

EV and EVSE Economics

- Inputs from steps above feed VICE Economic Model (cost and operations)
- Light-duty sedans and pickup scenarios evaluated
- Parametric sweeps show impacts of key input parameters

GHG Impacts

- Data on regional energy generation energy and vehicle efficiencies
- GREET Model to estimate GHG impacts of EV replacements
- Combine VICE economics and GREET GHG to estimate cost of GHG offsets





Results of NREL Analysis



Baseline Inputs & Parametric Sweeps Light Duty Sedan



EV Cost

- \$28K vs. \$23K (base)

EV Rebates

- \$0 (baseline), \$2.5K, 7.5K, 15K per vehicle

EVSE Cost

- \$3K (baseline), \$2K, \$5K each

Daily VMT (miles/day)

- 24.5 miles, 38.5 miles, 46 miles

Gasoline Price

- \$2.36/gal (baseline), \$3/gal, \$4/gal

Extended vehicle life was also projected

- 8-year vs. 12-year

Parameter	Units	Conventional Vehicle	EV
Fleet size	#	10	
Annual VMT	miles	6,382	
Year/Make/Model		2022 Honda Civic LX	2022 Nissan Leaf S
Capital cost (MSRP)	\$/vehicle	\$23,365	\$28,425
Fuel efficiency	mpg kWh/mi	34 mpg	112 MPGe 0.268 kWh/mi
Fuel price	\$/gal \$/kWh	\$2.36/gal	\$1.71/gal \$0.052/kWh
Maintenance cost	\$/mi	\$0.187	\$0.117
Salvage value	% of MSRP	~31%	~17%
EVSE cost	\$/EVSE	n/a	\$1,000 + \$2,000
Rebates	\$/vehicle	n/a	\$0

Values from fleet vehicles to be replaced

Values for replacement vehicle options

Model inputs estimated from other data sources





Dallas Fleet EV Economics Light-Duty “Administrative Sedans”

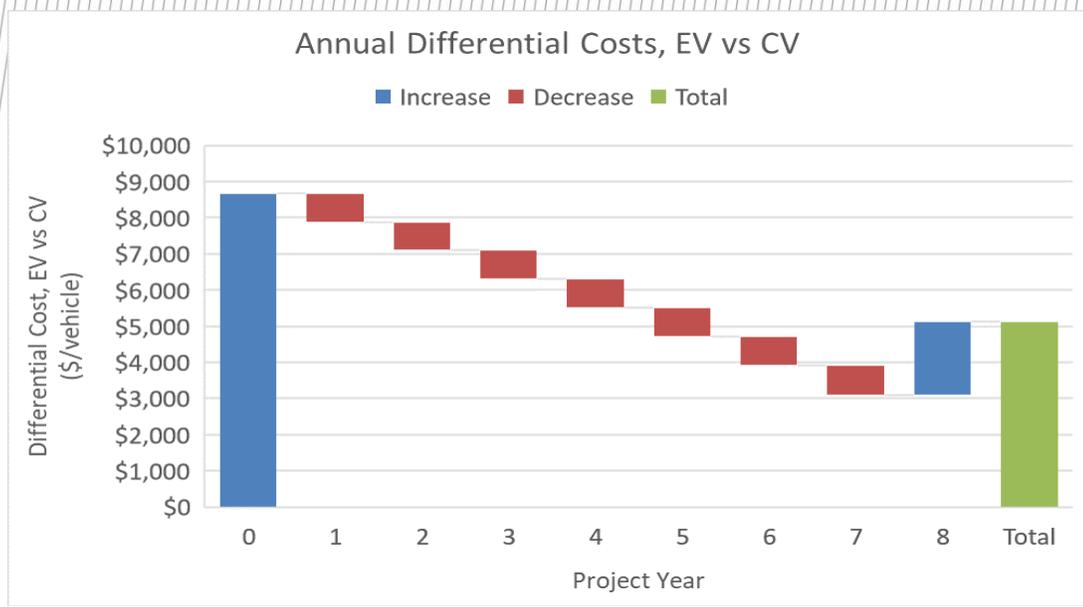
VICE Economic Model Results – Light Duty Sedans

- The base 2022 Nissan Leaf Model S appears capable of meeting "most" driving range requirements at a lower price point – 40-kWh battery/149-mile EV range
- Baseline total net present cost at end of expected 8-year life = \$4,345 per vehicle) – vehicle operation beyond year 8 continues to accrue savings
- Operational savings accumulate faster when replacing vehicles that are driven more – this can be done well within estimated Nissan Leaf S range of 149 miles

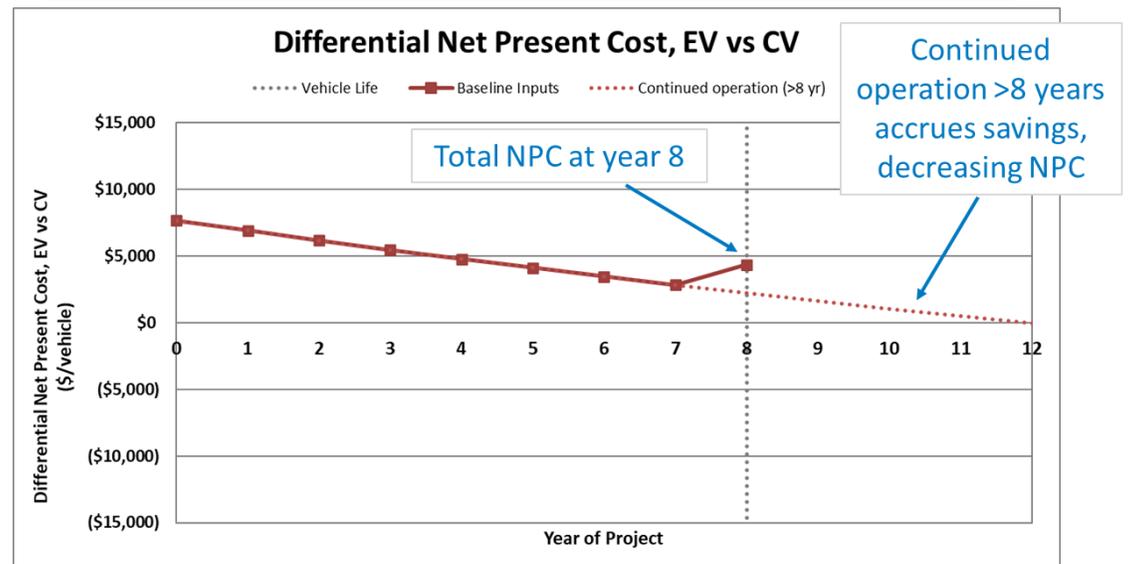
Scenarios to achieve lifetime “cost parity” include

- Case 1: \$2.5K EV rebate
- Case 2: Lower EVSE cost (\$2.5K), higher gas price (\$3/gal) and VMT (8K miles/year)

VICE Model Results – baseline lifetime costs & savings



VICE Model Results – lifetime cost differential



Baseline Inputs & Parametric Sweeps Pickup Trucks



Values from
fleet vehicles
to be replaced

Values for
replacement
vehicle options

Model inputs
estimated from
other data
sources

Parameter	Units	CV	EV
Fleet size	#	9	
Annual VMT	miles	7,731	
Year/Make/Model		2022 Ford F-150	2022 Ford F-150 Lightning
Capital cost (MSRP)	\$/veh	\$31,685	\$41,669
Fuel efficiency	mpg kWh/mi	18 mpg	67 MPGe 0.426 kWh/mi
Fuel price	\$/gal \$/kWh	\$2.36/gal	\$1.71/gal \$0.052/kWh
Maintenance cost	\$/mi	\$0.247	\$0.154
Salvage value	% of MSRP	~31%	~18%
EVSE cost	\$/EVSE	n/a	\$1,000 + \$2,000
Rebates	\$/vehicle	n/a	\$0

Daily VMT (miles/day)

- 30 miles (baseline), 38.5 miles, 46 miles

Gasoline Price

- \$2.36/gal (baseline), \$3/gal, \$4/gal

Extended vehicle life was also projected

- 8 –year vs. 12-year



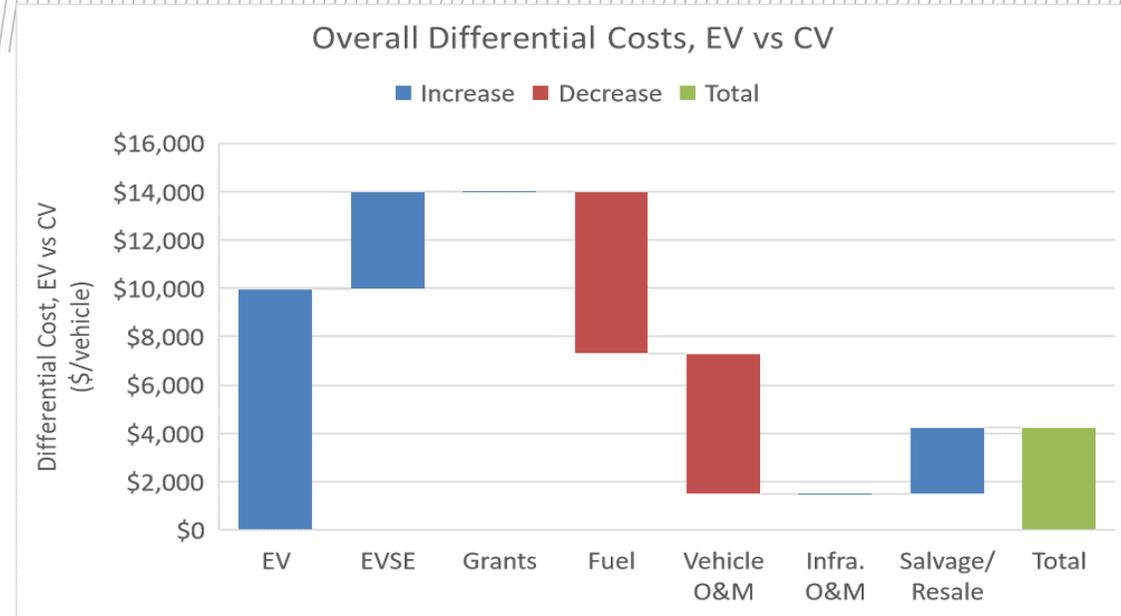


Dallas Fleet EV Economics Light-Duty Pickup Trucks

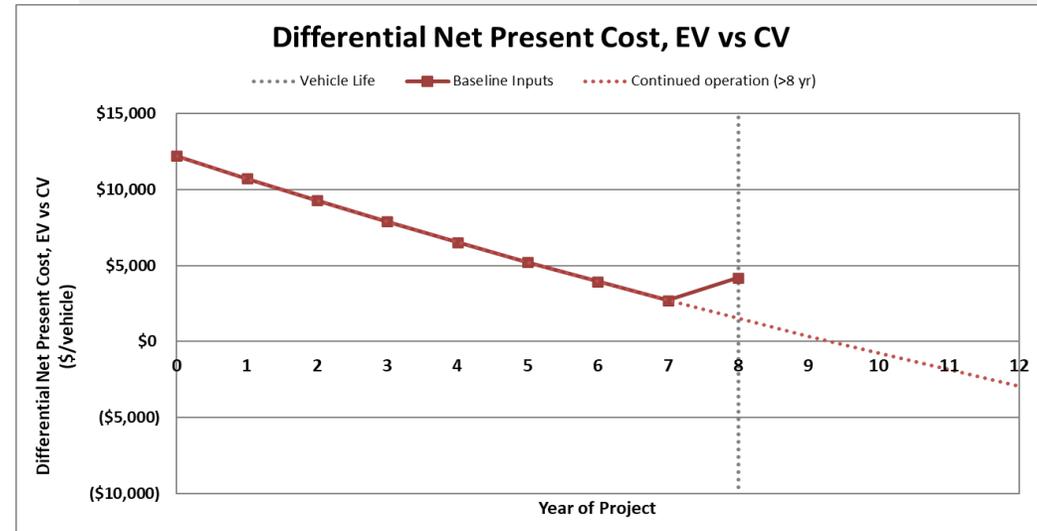
VICE Economic Model Results – Light Duty Pickups

- The 2022 Ford F-150 Lightning Pro appears to be capable of meeting “majority” of driving range requirements at a lower price point – 98-kWh battery/230-mile EV range
- Baseline net present cost at end of 8-year life ~ \$4,202 per vehicle – vehicle operation beyond year 8 continues to accrue savings
- Annual Operational savings accumulate faster for EV pickups than EV sedans – due to higher relative energy savings
- Operational savings accumulate faster when replacing vehicles that are driven more – this can be done well within estimated Ford F150 Lightning Pro EV driving range of 230 miles

VICE Model Results – baseline lifetime costs & savings



VICE Model Results – lifetime cost differential





Fleet Electrification Study Deployment Update



Electric Vehicle (EV) Deployment Update



Vice Model/Vehicle Validation

- 63 EVs purchased in FY21-22 (76 initially identified for conversion)
- Working with City Departments on the FY22-23 purchase for EVs (452 identified for possible conversion)
- Additional review of fleet inventory has determined that 1,580 of the initial 2,675 vehicles identified for conversion are EV compatible

Working on Turnkey approach with Cooperative Purchase

- Equipment Purchase
- Installation Services
- Charging Management Software



Next Steps



1. Deploy charging infrastructure and commercially available LD EV sedans and light trucks (dependent upon delays of manufacturing)
2. Test/demonstrate Medium- and Heavy-duty EVs in Dallas fleet service
3. Coordinate and seek lessons learned from others
4. Pending results from grant applications (charging infrastructure)
5. Incorporate charging software management into our fleet management system
6. Training for technicians and operators on use and maintenance of EVs





City of Dallas

City of Dallas Fleet Electrification Study

**NCTCOG Briefing
November 1, 2022**

Donzell Gipson, Director
Equipment and Fleet Management
City of Dallas

Polling



Polling Session Instructions

On your computer or mobile device, visit ttpoll.com and enter [dfwcc22](#) to join the session.

- It is recommended that you use Google Chrome or Firefox.
- If prompted, select “**Guest.**” Then, click “**Join Session.**”
- Do **NOT** enter contact information. Click “**Submit.**”

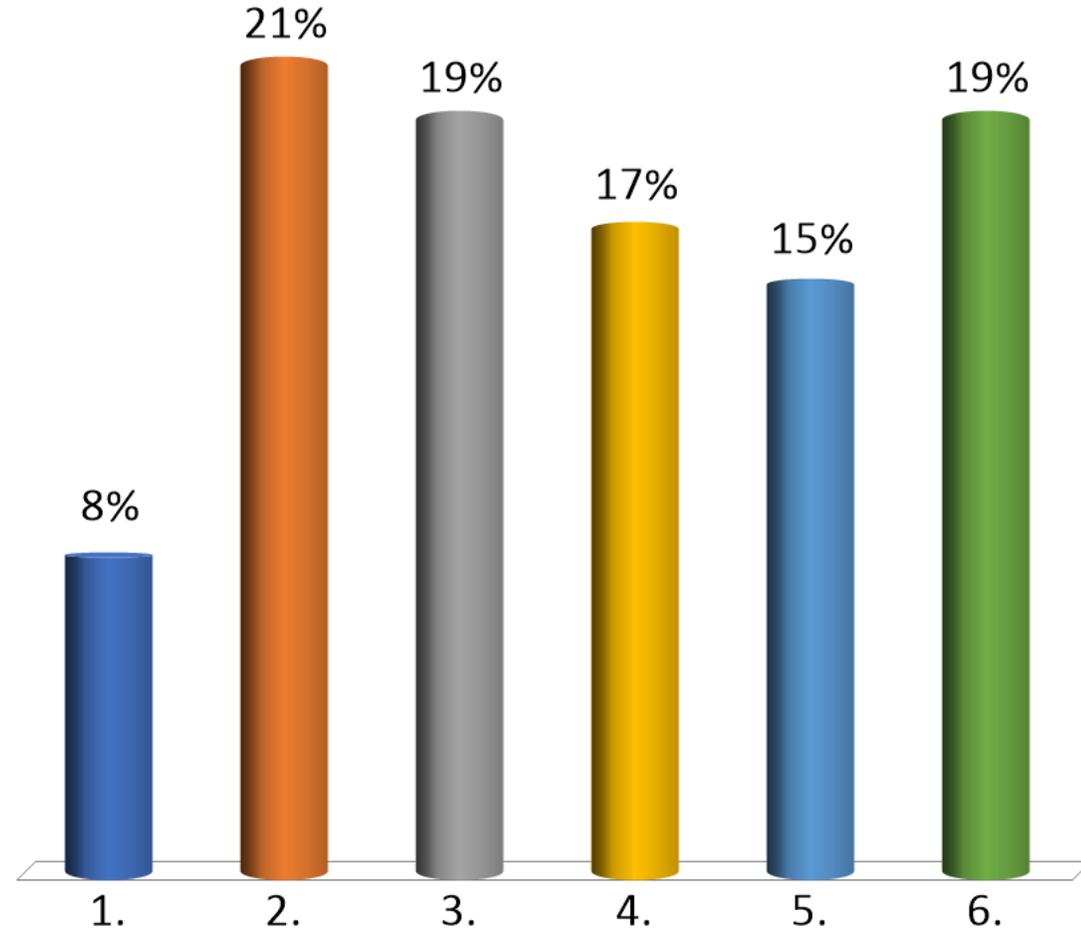
For multiple choice, press the letter on your device that corresponds to the answer choice on the screen.

Once you have selected your response, your answer choice will be highlighted and recorded.

The poll will appear closed at first.

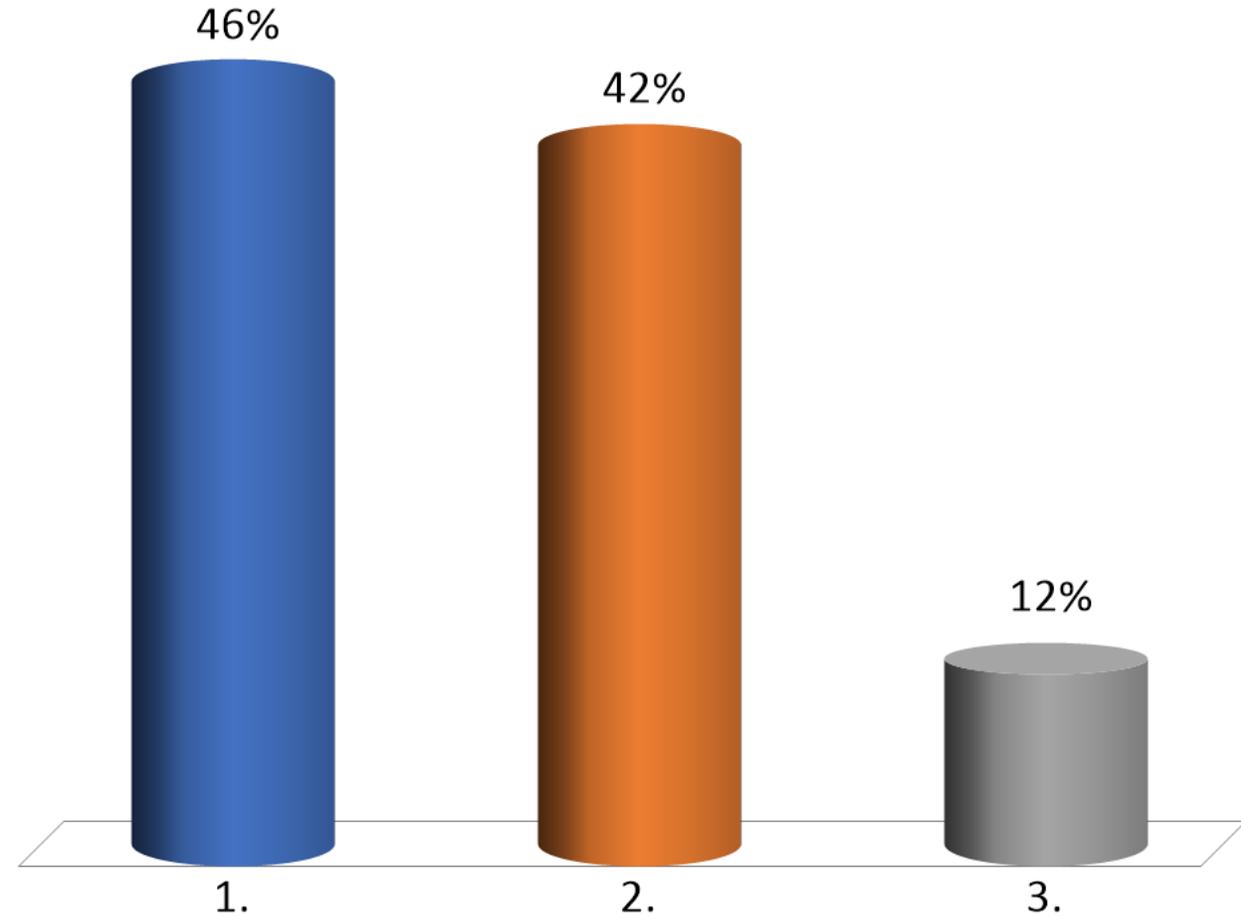
Which Clean Cities Task(s) Should Take Priority for DFW/CC?

1. Task 3.1 Listening Sessions
2. Task 3.2 Alternative Fuel Vehicle and Infrastructure Incentive Efforts
3. Task 3.3 Alternative Fuel Vehicle Infrastructure Planning
4. Task 3.4 Meetings, Workshops, and Events
5. Task 3.5 Technical Assistance and Fleet Coaching
6. Task 3.6 Technical Training and Education



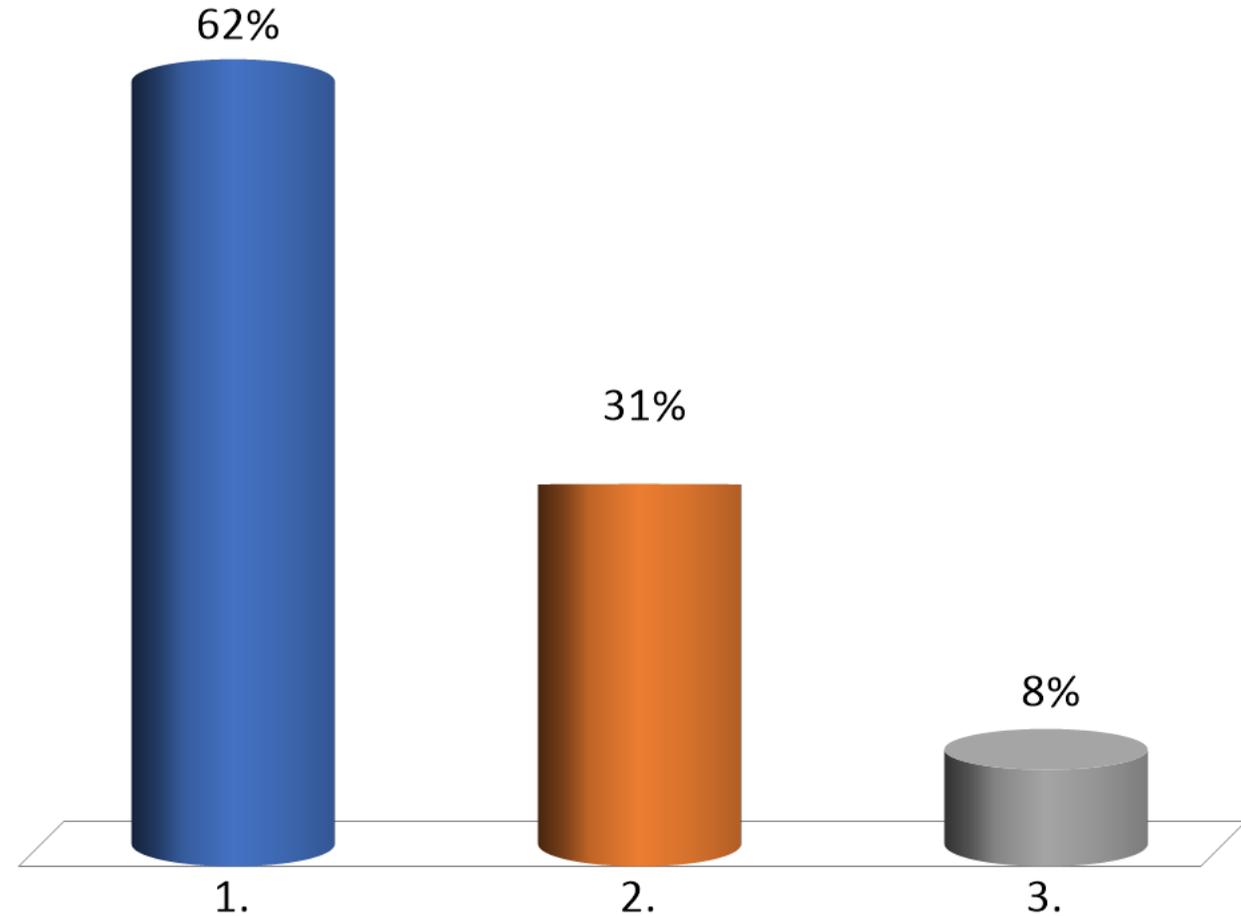
How Often Would You Like Fleet Manager Roundtables?

1. Once a Quarter
2. Twice a Year
3. Once per Year



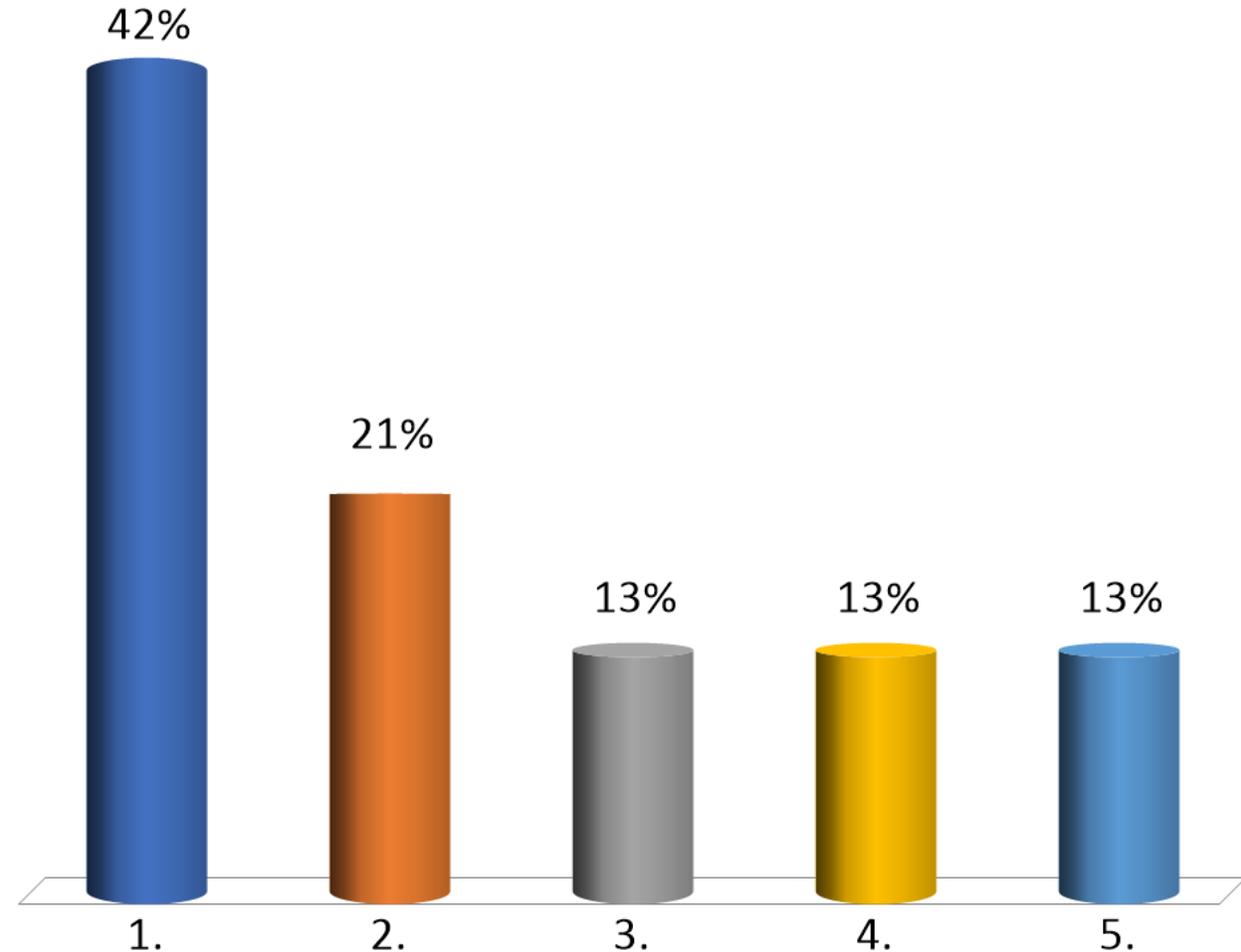
How Often Would You Like Educational Presentations?

1. Once a Quarter
2. Twice a Year
3. Once per Year



Would You Prefer Roundtables/Educational Presentations In Person or Virtual?

1. In Person
2. Virtual
3. Roundtables In Person,
Educational Presentations
Virtual
4. Educational Presentations In
Person, Roundtables Virtual
5. No Preference



What is The Best Time(s) for DFWCC Events?

2% 1. Tuesday Morning

20% 2. Tuesday Afternoon

9% 3. Wednesday Morning

17% 4. Wednesday Afternoon

4% 5. Thursday Morning

24% 6. Thursday Afternoon

13% 7. Friday Morning

11% 8. Friday Afternoon



Funding

Funding Opportunities

Program	Eligible Activities	Funding Amount	Deadline
North Texas Clean Diesel Project 2021	Replace or repower diesel vehicles and equipment	<ul style="list-style-type: none"> - 45% cost if new is electric - 35% if CARB certified Low-NOx - 25% for all others 	January 13, 2023
TERP Rebate Grants Program	Replace or repower of heavy-duty diesel vehicles, or new purchase of heavy-duty alternative fuel vehicles	<ul style="list-style-type: none"> - Up to 80% of the incremental cost for vehicle projects - Up to \$600,000 for infrastructure 	December 19, 2022
TERP Seaport and Rail Yard Areas Emissions Reduction Program	On-road vehicles GVWR over 26,000 pounds; Non-road yard trucks; and other cargo handling equipment	<ul style="list-style-type: none"> - Up to 80% of the cost to replace or repower eligible equipment 	November 22, 2022
TERP Natural Gas Vehicle Grant Program	Replace or repower medium or heavy-duty vehicles with a vehicle or engine powered by natural gas (CNG, LNG, or LPG)	<ul style="list-style-type: none"> - Up to 90% of the incremental cost 	March 31, 2023

For a full list of available funding opportunities visit www.nctcog.org/aqfunding

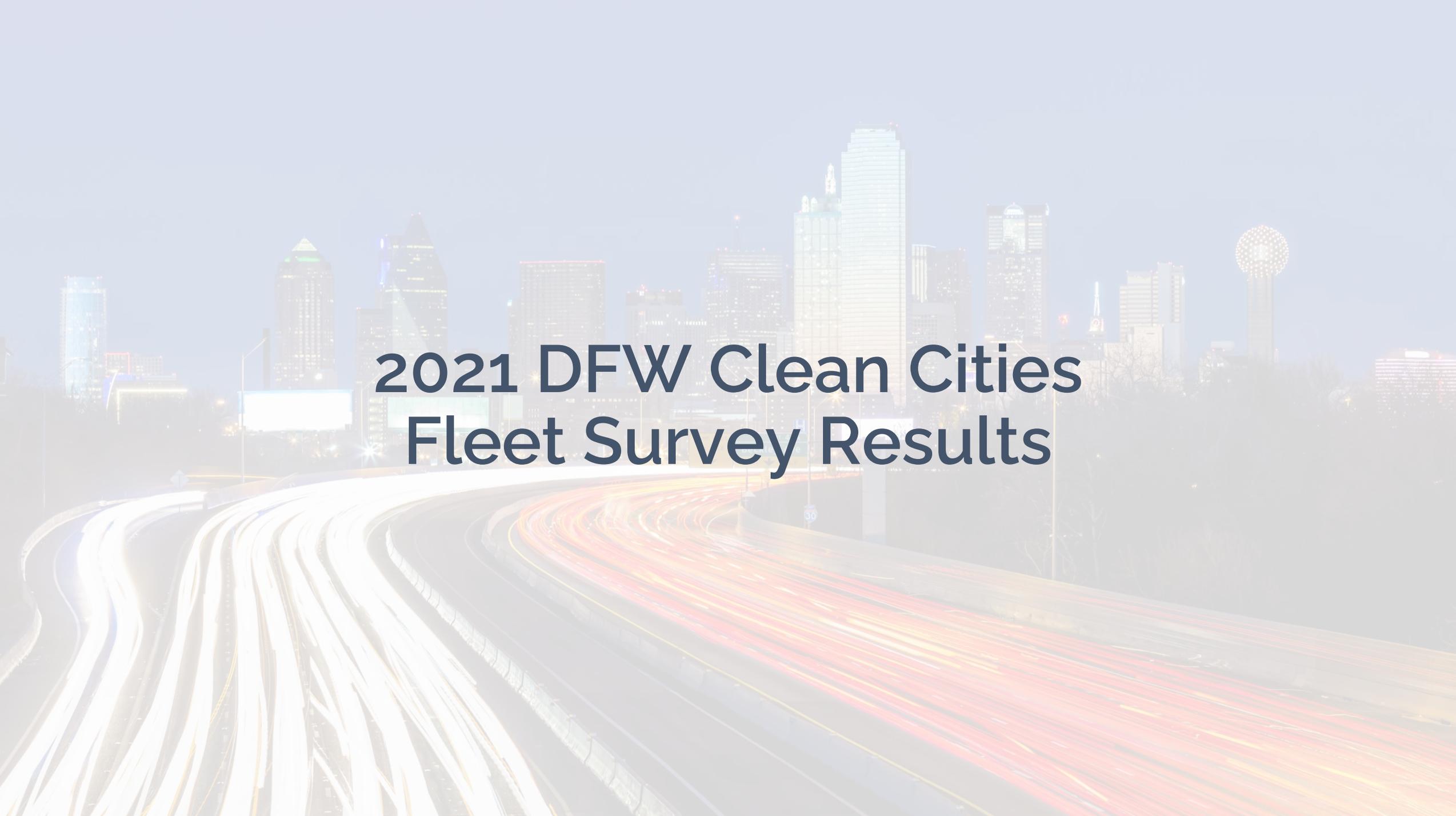
Alternative Fuel Tax Credit Webinar: Claiming Retroactive Credits

- The Inflation Reduction Act has extended the \$0.50/gallon Natural Gas & Propane Federal Tax Credit Through December 31, 2024
- Learn How Public and Private Agencies Can Claim the Credit in this Webinar Hosted by Lone Star Clean Fuels Alliance

Date: Thursday, November 10, 2022

Time: 12:00pm – 12:45pm CT

[Register](#)



2021 DFW Clean Cities Fleet Survey Results

DFW Clean Cities Impacts – Results from 2021 Survey

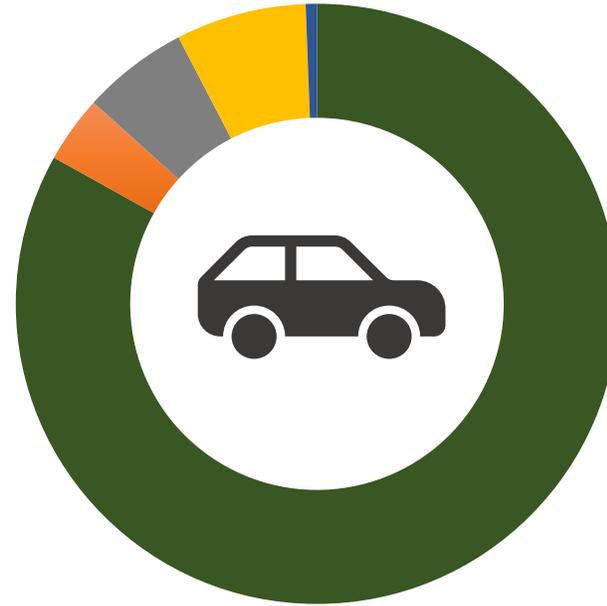
60 Fleets Reporting

12,286 Alternative Fuel
Vehicles and Equipment

*Impacts Over Calendar Year
2021

dfwcleancities.org/annualreport

**~24.19 Million Gasoline Gallon
Equivalent (GGE) Reduced***



- Alternative Fuel Vehicles
- Vehicle Miles Traveled Reductions
- Fuel Economy Improvements
- Idle Reduction
- Off-Road Vehicles/Equipment

**~27 Tons Ozone-Forming Nitrogen
Oxides (NO_x) Reduced***



~0.074 Ton/Day
For Comparison: RTC Initiatives
Credited in Conformity = **~2.12**
Tons/Day

**118,555 Tons Greenhouse Gas
(GHG) Emissions Reduced***

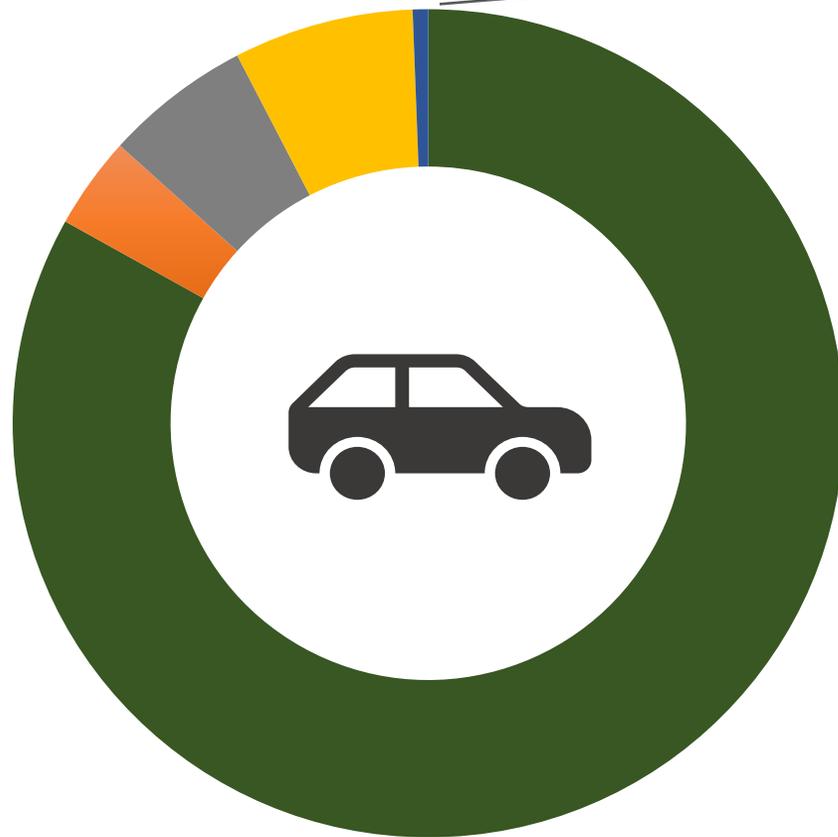
Equivalent to Eliminating



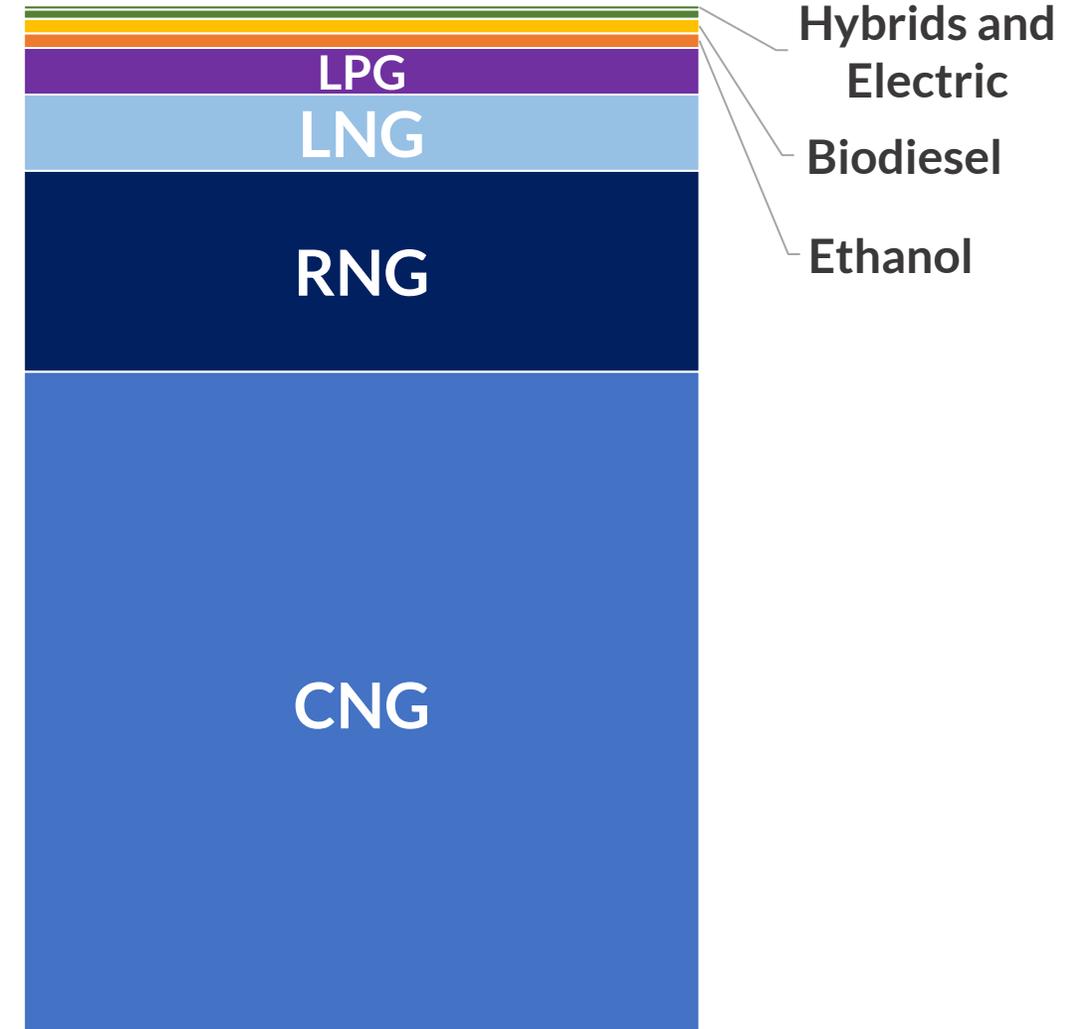
Railcars Worth of Coal Burned

2021 Annual Energy Impact

Total Energy Reduced



Alternative Fuel Vehicles Energy Reduced

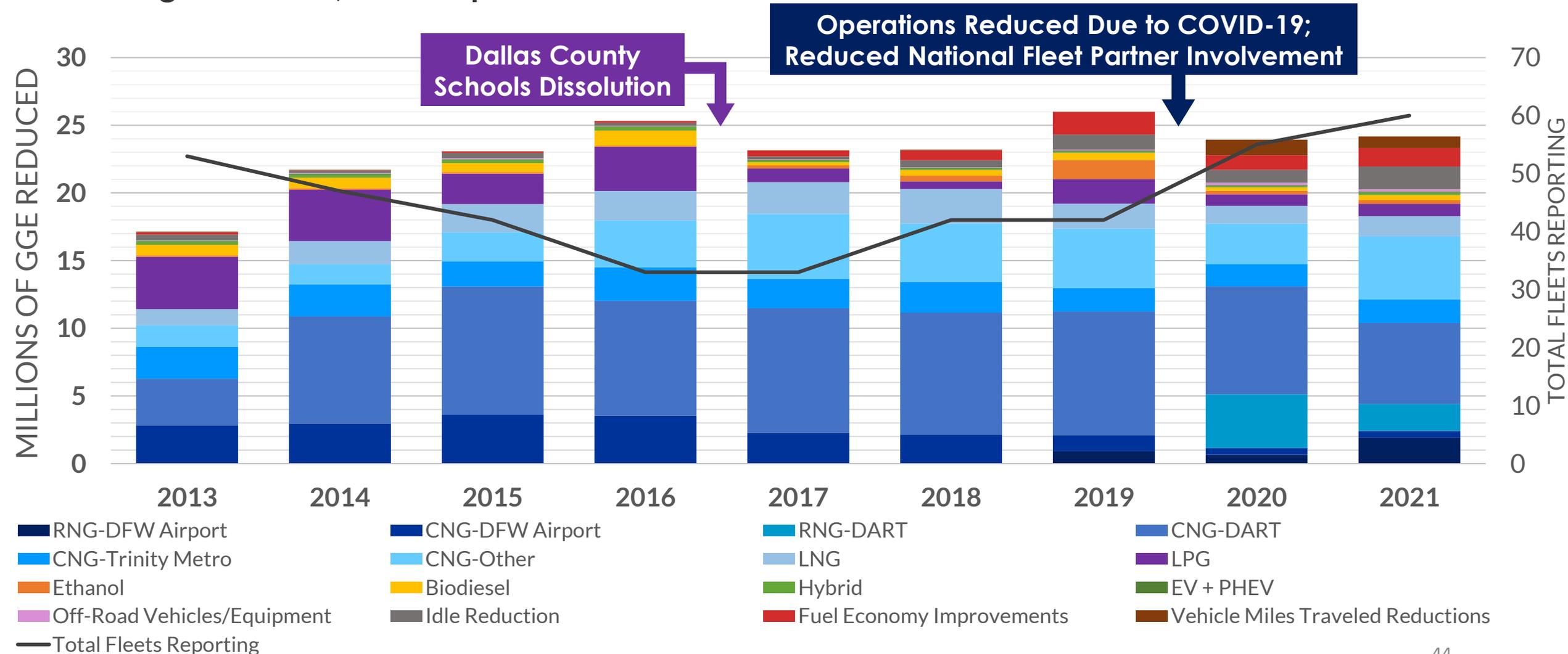


- Alternative Fuel Vehicles
- Vehicle Miles Traveled Reductions
- Fuel Economy Improvements
- Idle Reduction
- Off-Road Vehicles/Equipment

Trends in Annual Energy Impact

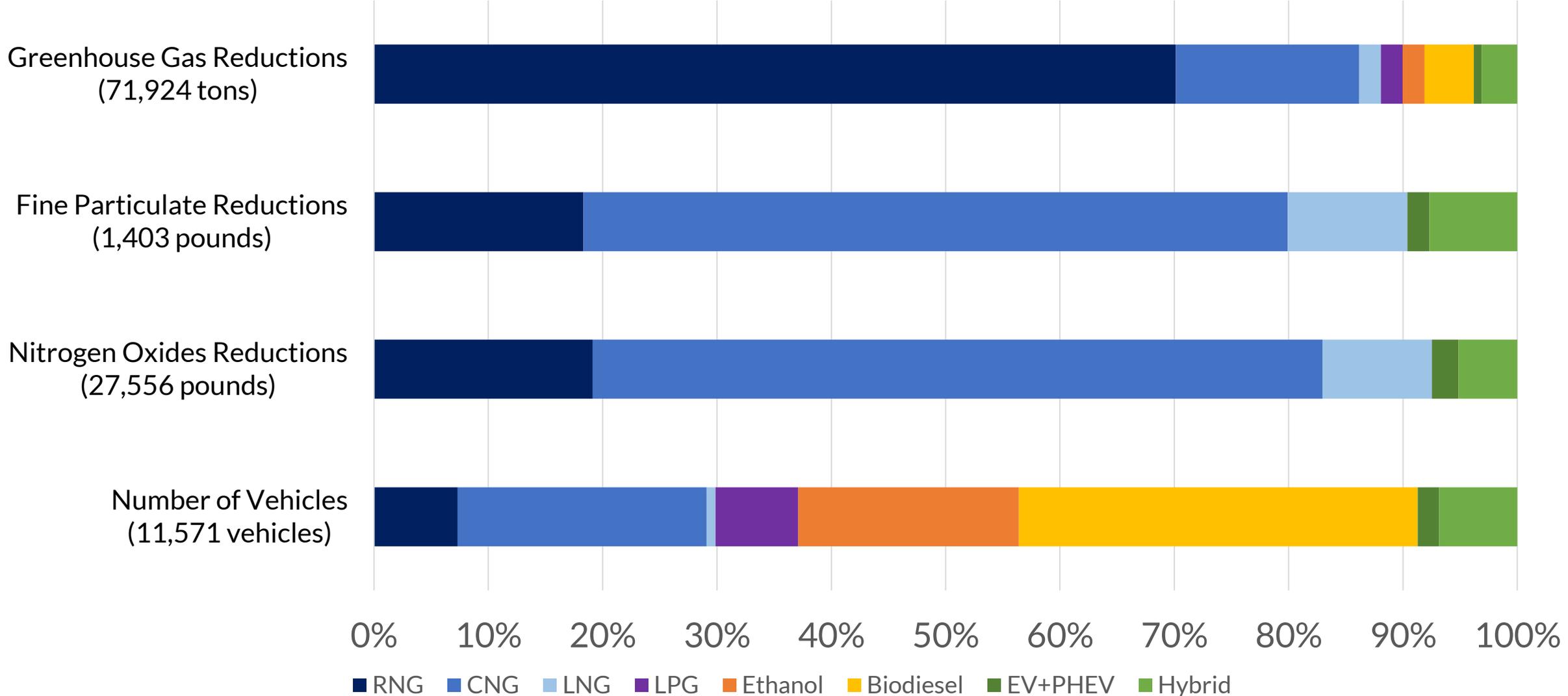
Department of Energy Goal: Increase GGE Reductions 16% Year Over Year

2021 Target: 27.79M, 2021 Reported: 24.19M



RNG-Renewable Natural Gas; CNG- Compressed Natural Gas; LNG- Liquefied Natural Gas; LPG- Liquefied 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- Liquefied Natural Gas; LPG- Liquefied Petroleum Gas; EV- Electric Vehicle; PHEV-Plug-In Hybrid Electric Vehicle⁴⁵

Fleet Recognition Awards



Recognition Criteria

Partnership with DFWCC	Emissions Reduction	Fuel Consumption Reduction
20 Points Maximum	55 Points Maximum	25 Points Maximum
<p>Attendance at DFWCC Events/Webinars</p> <p>Presenting, Speaking, or Participating as a Panelist at Any DFWCC Sponsored Event/Webinar</p> <p>General Involvement with DFWCC</p>	<p>Amount and Composition of On-Road and Non-Road Alternative Fuel Vehicles</p> <p>Implementation and Enforcement of Idle Reduction Policy</p> <p>Time Idling Reduced</p>	<p>Overall Fleet Efficiency Improvements</p> <p>Smaller Vehicles, Lightweight Materials, etc.</p> <p>Practices to Reduce Vehicle Miles Traveled</p>

Bronze Fleet Winners



GreenPath Logistics



Chris Racenelli, VP of Operations
Geoff Eaton, Asset Manager

- Outstanding CNG Vehicle Inventory

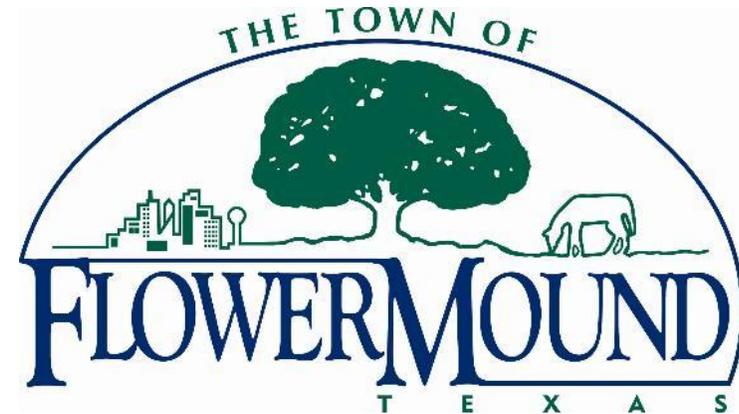


Town of Flower Mound



Billy Sterner, Fleet Services/Materials Manager
Julie Taylor, Fleet Supervisor

- Strong Emphasis on Idle Reduction and Reducing Fuel Consumption



Denton County



Michelle Brewer, Chief Administrator – County Admin
Holly Sadlowski, Chief Administrator – County Judge

- Efforts to Reduce Fuel Consumption, Including Idle Reduction and Reducing Vehicle Miles Traveled



City of Lancaster



Jermaine Sapp, Director of Equipment & Facilities
Opal Mauldin-Jones, City Manager

- Efforts to Improve Vehicle Fuel Economy and Reduce Idling



City of North Richland Hills



Zane Ryan, Fleet Manager

Gereal Hogue, Fleet Superintendent

- Strong Partnership with DFWCC
- Addition of Electric Off-Road Equipment



City of Coppell



Casey McCaughan, Fleet Services Manager

- Strong Adoption of Hybrid and Electric Vehicles
- Efforts to Reduce Idling



Silver Fleet Winners



City of Arlington



Al Mantell, Fleet Manager

- Diverse Alternative Fuel Inventory
- Efforts to Reduce Fuel Consumption through Telematics



City of Frisco



Daniel Ford, Director of Administrative Services
David McBurnett, Fleet Manager

- Strong Efforts to Reduce Fuel Consumption and Reduce Vehicle Miles Traveled



City of Irving



Debbie Jackson, Fleet Business Operations Manager
Larry Spain, Fleet Maintenance Manager

- Strong Partnership with DFWCC
- Diverse Alternative Fuel Inventory with CNG and Electric Vehicles



City of Mesquite



Arthur Grothe, Manager of Equipment Services

Tonette Blasius, Assistant Manager of Equip. Services

- Outstanding Partnership with DFWCC
- Diverse Alternative Fuel Inventory



Denton ISD



Alan Wilcox, Supervisor of Fleet Maintenance
Jennifer Adair, Fleet Operations Specialist

- Strong Partnership with DFWCC
- Continued Commitment to Propane Vehicles



Town of Addison



Rob Bourestom, Director of General Services

- Outstanding Partnership with DFWCC
- Efforts to Reduce Idling through Data Analysis



Trinity Metro



Bill Lambert, Director of Maintenance

- Impressive Alternative Fuel Inventory of CNG and Electric Buses
- Acquired Additional Electric Buses



Gold Fleet Winners



City of Carrollton



Dwayne Bianco, Director of Fleet and Facilities
LD Berry, Fleet and Facilities Manager

- Outstanding Electric Vehicle Inventory
- Efforts to Reduce Energy Consumption, Including Solar Panels and Low Resistance Tires



City of Dallas



Jimmy Solis, Fleet Asset Manager
Donzell Gipson, Equipment and Fleet Management Director

- Outstanding Partnership with DFWCC
- Impressive Alternative Fuel Inventory with CNG and Electric Vehicles



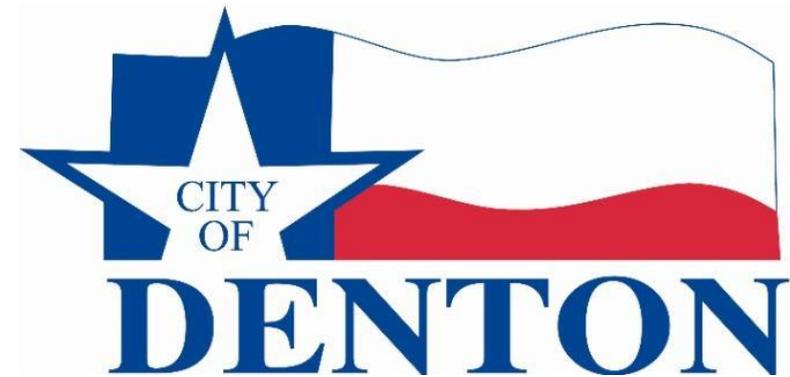
City of Dallas

City of Denton



Terry Kader, Fleet Superintendent
Brad Holland, Administrative Supervisor

- Strong Partnership with DFWCC
- Addition of Electric Off-Road Equipment



City of Grapevine



Keith Miertschin, Assistant Director Operations

- Acquired Additional Hybrid Vehicles
- Use of Power Units to Reduce Idling



City of Lewisville



David Fruth, Fleet Operations Supervisor
Francis Mascarenhas, Internal Services Manager

- Diverse Alternative Fuel Inventory, Including Electric and Propane Vehicles
- Efforts to Reduce Fuel Consumption by Downsizing Vehicles



LEWISVILLE

Deep Roots. Broad Wings. Bright Future.

City of Southlake



Tim Slifka, Purchasing Manager
Sharen Jackson, Chief Financial Officer

- Continued Commitment to Alternative Fuels
- Efforts to Reduce Idling through Training and Signage



Dallas Area Rapid Transit (DART)



Theresa Smith, Bus Fleet Engineering Manager

Huy Nguyen, Warranty and Maintenance Services Manager

- Outstanding Alternative Fuel Inventory Including RNG and Electric Buses
- Efforts to Reduce Idling



DFW Airport



Douglas Warren, Vehicle Fleet Programs Manager

- Diverse Alternative Fuel Inventory Including RNG and Electric Vehicles
- Acquired First Electric Buses



Shining Stars



Shining Stars

Greatest Progress in NO_x Reduction



City of Lewisville

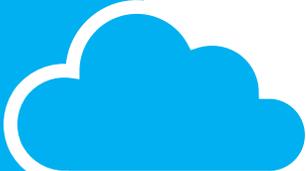
Increased NO_x
Reductions by 129 lbs.

City of Grapevine



Increased NO_x
Reductions by 51 lbs.

City of Coppell



Increased NO_x
Reductions by 47 lbs.

Shining Stars

Greatest Showcase of Efficiency Strategies

Denton County Transportation Authority

Moved to smaller, more
efficient vehicles



Denton County

Staff prioritized hybrid
vehicles and use idle
reduction signage

Town of Flower Mound

Utilized bicycles for police
officers, encouraged route
optimization

City of Carrollton

Purchased vehicles with
automatic engine shut off,
utilized low resistance tires



Shining Stars

Alternative Fuel Champions

City of Arlington

Acquired 6 electric vehicles



DFW Airport

Acquired 4 electric buses

Trinity Metro

Acquired 2 electric buses and 7 CNG buses

Dallas ISD

Acquired 12 propane buses



Fleet Challenge



Fleet Challenge

Organization	2021 Fleet Challenge Goal	2021 Fleet Challenge Achievements
City of Bedford	Replace 27 vehicles with newer, more efficient models	Replaced 39 vehicles with newer, more efficient models
City of Carrollton	Reduce overall fuel usage by 10% from pre-pandemic usage	Fuel usage reduced by 30%
City of Frisco	Increase overall fleet fuel economy by 1%	Fuel usage reduced by 7%
City of North Richland Hills	5% Increase in alternative fuel vehicles	Doubled hybrid vehicles and increased mileage by 15%
City of Watauga	Increase overall fleet fuel economy by 5%	Fuel usage reduced by 7%
DFW Airport	Increase RNG volume to >60% of natural gas usage	RNG reached 80% of natural gas usage



2022 Annual Survey

2022 Annual Survey

2022 Online Survey Available in January 2023

Things to Remember:

- Recognition Requires Clean Fleet Policy Adoption
- Tell Us Your Project Interests – Especially for Grant Funding
- Fleet Challenge Goals Must be Quantifiable for Recognition
- Complete All Survey Sections – Reach Out to Us for Help

Contact Us



Lori Clark
Program Manager &
DFWCC Director
lclark@nctcog.org



Amy Hodges
Principal Air Quality Planner
ahodges@nctcog.org



Jared Wright
Air Quality Planner
jwright@nctcog.org



**Dallas-Fort Worth
CLEAN CITIES**



dfwcleancities.org



cleancities@nctcog.org