State of New Jersey
Department of Environmental Protection

CHRIS CHRISTIE
Governor

KIM GUADAGNO
Lt. Governor

BOB MARTIN
Commissioner

PROJECT SOLICITATION

OVERALL GOAL

The State of New Jersey, as a potential beneficiary of the Trust established pursuant to the national Volkswagen settlement, intends to use its allocation from the mitigation trust to efficiently implement projects that reduce oxides of nitrogen (NOx) emissions in a cost effective and technically feasible manner. The implemented projects must meet the criteria of the Consent Decree. New Jersey is issuing this solicitation for project ideas to ensure a broad range of project ideas are considered. Additional opportunities will be provided for public input during the upcoming months.

Submissions must be received by January 31, 2018 and must contain all the information outlined in the "Project Proposals" section of this document.

ELIGIBLE PROJECTS

A general summary is below. Click here for comprehensive list and associated definitions.

Source Category	Emission Reduction Strategy	Allowed Expenditure Amount
1. Class 8 local freight trucks & port drayage trucks	Repower and replacement	Up to 40% for repower with diesel or alternative fuel or up to 75% (up to 100% if government owned) for repower with electric. Electric charging infrastructure costs are eligible expense. Up to 25% for replacement with diesel or alternative fuel or up to 75% (up to 100% if government owned) for electric replacement. Electric charging infrastructure costs are eligible expense.
2. Class 4-8 school bus, shuttle bus or transit bus	Repower and replacement	Same as row 1
3. Freight switching locomotives	Repower and replacement	Same as row 1
4. Ferries/Tugs	Repower	Same as row 1
5. Oceangoing vessels	Shorepower	Up to 25% for shore side infrastructure if non-government owned (up to 100% if government owned)

6. Class 4-7 local freight trucks	Repower and replacement	Same as row 1.
7. Airport ground support equipment	Repower and replacement	Up to 75% to repower or replace with electric (up to 100% if government owned). Electric charging infrastructure costs are eligible expense.
8. Forklifts and Port Cargo Handling Equipment	Repower and replacement	Up to 75% to repower or replace with electric (up to 100% if government owned). Electric charging infrastructure costs are eligible expense.
9. Electric vehicle charging stations or hydrogen fueling stations for light duty vehicles only		Up to 100% to purchase, install and maintain infrastructure if available to public at *government owned* property. Up to 80% to purchase, install and maintain infrastructure if available to public at *non-government owned* property. Up to 60% to purchase, install and maintain infrastructure at a workplace or multi-unit dwelling that is not available to the general public. Up to 33% to purchase, install and maintain infrastructure for publicly available hydrogen dispensing that is high volume or up to 25% for lower volume.

PROJECT PROPOSALS

Proposals must be submitted by close of business on January 31, 2018. Electronic submittals are preferred and should be sent to VWComments@dep.nj.gov however paper submittals will also be accepted and should be sent to:

NJDEP
Division of Air Quality
Mail code 401-02E
Trenton, NJ 08625-0420
Attn: VW Settlement

All proposals must contain the following information; incomplete applications will not be considered. If your project is selected, you may be contacted for additional detailed information. Send questions to VWComments@dep.nj.gov

To enter information electronically use Adobe Reader

CONTACT INFORMATION

Organization Name	Suburban Disposal
Organization Address	54 Montesano Rd
City, State Zip Code	Fairfield, NJ 07004
Contact Person	Tony Ciofalo
Title/Position	Consultant/Clean Fleets Advocates
Phone	(612) 968-5498
E-mail	tonyciofalo@msn.com

PROJECT NAME	Suburban Disposal Clean Truck Program

PROJECT CATEGORY OR CATEGORIES (choose from 1-9 in "Eligible Projects" section above)

1 ☑ **2** ☐ **3** ☐ **4** ☐ **5** ☐ **6** ☐ **7** ☐ **8** ☐ **9** ☐

PROJECT PRIORITY Priority # of proposals

If submitting more than one proposal, what is the sponsor's priority of this proposal?

PROJECT BUDGET $ 100,525,495.00

Provide total estimated project budget, include source and amount of cost share if applicable.

This is a three year project to scrap and replace 45 pre-2004 model year refuse trucks. The cost share requested would be the maximum allowable under the VW EMA's (up to 35% under the DERA Option)

PROJECT DESCRIPTION (Briefly describe the project by completing the following questions)

Geographic area where emissions reductions will occur? Multiple counties (see attached)

Estimated size of population benefitting from the emission reductions? 4,500,000

Estimated useful life of the project? 15 years

Number of engines/vehicles/vessels/equipment included in the project? 45

Estimated emission benefits should be expressed in tons per year (TPY) of emission reduced for NOx and for PM 2.5 over the lifetime of the project. Identify methodology used.

Estimated NOx benefits? 20.80 TPY

Methodology Used? USEPA Emissions Quantifier

Particulate matter (PM 2.5) benefits? 0.88 TPY

Methodology Used? USEPA Emissions Quantifier

Will the project benefit one or more communities that are disproportionately impacted by air pollution? If so, please describe.

Refuse collection is a weekly occurrence in all communities. Depending on the level of service (e.g. mixed recycling, organics or construction/demolition) there may be multiple refuse trucks in a neighborhood weekly.

Project partners, if any?

Suburban Disposal, Truck Manufacturers and the Natural Gas Utility

Explain how the project will provide cost effective and technically feasible emission reductions. Cost effectiveness should be expressed in dollars per ton per year of emissions reduced for NOx and for PM 2.5.

Cleaner refuse trucks are readily available for purchase, some with the cleanest internal combustion "Near Zero" emissions natural gas engine. Our draft calculations are attached using the USEPA Emissions Quantifier, which estimates total cost effectiveness at $14,758 per short ton of N0x reduced and $346,186 per short ton of PM2.5. These may be refined as the project schedule develops.

Estimated timeframe for implementation? Include a project timeline that identifies start and end dates, as well as the timeframe for key milestones.

We propose 15 trucks per year each starting in 2018 for a total of three years.

Demonstrated success in implementing similar projects?

Suburban Disposal is a fourth generation family owned company with a 75 year history of public service to over 50 municipalities. We deliver complex and high quality waste collection and recycling programs in the communities we serve.

If your proposed project involves alternative fuels, provide a demonstration of current or future plans to provide adequate refueling infrastructure.

Suburban currently has access to its CNG station where it fuels 43 existing CNG trucks. Should the CNG truck program expand with support in future years, Suburban would evaluate investment in a larger station. CNG is also currently available 24/7 at Newark Liberty International Airport, within 15 miles of Suburban's headquarters.

Has your organization been approved to receive and expend any other grant funds related to this project? If so, please provide details.

None.

Please provide any additional information that supports this project.

Suburban Disposal is uniquely positioned to modernize its fleet if provided support for what is a very expensive upgrade from the current baseline fleet to a near zero fleet. As a company we pride ourselves on maintaining our equipment well and the average age is approximately 15 years old. Our proposal to add clean diesel trucks presents a challenge financially for us, and the CNG trucks are approximately $40,000 more than clean diesel. With support from this program we can make great strides.

Two additional pages have been provided as supplemental space to answer any of the questions above.

Suburban Disposal is a family owned company with 75 years of continuous operations in New Jersey. Our company is committed to the essential components of integrated solid waste management services:

- Collection
- Recycling
- Disposal

Being the leading provider of services in the solid waste industry in New Jersey, we are committed to preserving the environment while providing the most cost-effective solutions for solid waste collection and disposal. We provide solid waste and recycling collection/processing for commercial, industrial, municipal and residential customers.

Levels of Service

Roll-Off
Open and closed container sizes range from ten to forty cubic yards. Our stationary and self-contained compactors are available in a variety of sizes to give our customers the right container for their solid waste needs. Service days can be customized to the service level that most economically meets your needs.

Municipal
We provide outstanding solid waste and recycling services for many communities throughout New Jersey. We provide the most cost-effective solid waste collection service as well as our cost reducing recycling programs.

Commercial
We offer container sizes from one to ten cubic yards to provide the exact capacity for our customer's solid waste and/or recycling needs. We also offer compaction equipment for higher volume businesses. Sizes can be combined for solid waste and recycling to reduce cost. Service days are flexible to provide the most efficient and economical collection program.

Emission Results and Health Benefits for Project: Sub

Emission Results

Here are the combined results for all groups and upgrades entered for your project.[1]

Annual Results (short tons)[2]	NO_x	PM2.5	HC	CO	CO_2	Fuel[3]
Baseline for Upgraded Vehicles	22.206	0.918	1.057	7.103	2,021.5	179,685
Amount Reduced After Upgrades	20.963	0.894	0.978	6.762	323.8	28,779
Percent Reduced After Upgrades	94.4%	97.3%	92.5%	95.2%	16.0%	16.0%

Lifetime Results (short tons)[2]						
Baseline for Upgraded Vehicles	177.650	7.348	8.454	56.824	16,171.7	1,437,480
Amount Reduced After Upgrades	167.701	7.149	7.820	54.096	2,590.1	230,232
Percent Reduced After Upgrades	94.4%	97.3%	92.5%	95.2%	16.0%	16.0%

Lifetime Cost Effectiveness ($/short ton reduced)						
Capital Cost Effectiveness[4] (unit & labor costs only)	$65,056	$1,526,004	$1,395,070	$201,676	$4,212	
Total Cost Effectiveness[4] (includes all project costs)	$14,758	$346,186	$316,483	$45,752	$956	

[1] Emissions from the electrical grid are not included in the results.
[2] 1 short ton = 2000 lbs.
[3] In gallons; fuels other than ULSD have been converted to ULSD-equivalent gallons.
[4] Cost effectiveness estimates include only the costs which you have entered.

Remaining Life		
	Diesel Replacements: Refuse Hauler | Refuse Hauler	8 years
	CNG Replacements: Refuse Hauler | Refuse Hauler	8 years

Summary of Suburban Disposal Fleet Transition Assuming Grant Approval 1-30-18 1/31/2018

Suburban Disposal Action Year	Vehicle ID	Fuel	Year	Age of Vehicle	County where routed?	Cost for new CNG (Est)	Cost for new Diesel (Est)	
YEAR 01	49	Diesel	1997	20	Essex		$ 239,846.00	
YEAR 01	50	Diesel	1998	19	Essex		$ 239,846.00	
YEAR 01	53	Diesel	1999	19	Passaic		$ 239,846.00	
YEAR 01	54	Diesel	1999	19	Essex		$ 239,846.00	
YEAR 01	55	Diesel	1999	19	Essex		$ 239,846.00	
YEAR 01	56	Diesel	1999	19	Passaic	$ 278,795.00		
YEAR 01	57	Diesel	1999	19	Bergen	$ 278,795.00		
YEAR 01	58	Diesel	1999	18	Passaic	$ 278,795.00		
YEAR 01	O76	Diesel	1989	28	Monmouth		$ 265,268.00	
YEAR 01	O14	Diesel	2004	13	Essex		$ 265,268.00	
YEAR 01	O3	Diesel	1997	20	Various		$ 182,260.00	
YEAR 01	36	Diesel	1993	24	Essex		$ 182,260.00	
YEAR 01	38	Diesel	1996	21	Morris		$ 182,260.00	
YEAR 01	70	Diesel	1998	19	Union		$ 182,260.00	
YEAR 01	170	Diesel	1994	23	Essex		$ 182,260.00	
YEAR 02	51	Diesel	1998	19	Essex		$ 239,846.00	
YEAR 02	52	Diesel	1998	19	Hudson		$ 239,846.00	
YEAR 02	59	Diesel	1999	18	Bergen		$ 239,846.00	
YEAR 02	80	Diesel	1999	18	Bergen		$ 239,846.00	
YEAR 02	81	Diesel	1999	18	Essex		$ 239,846.00	
YEAR 02	82	Diesel	1999	18	Essex		$ 239,846.00	
YEAR 02	83	Diesel	1997	18	Essex		$ 239,846.00	
YEAR 02	84	Diesel	1999	18	Essex		$ 239,846.00	
YEAR 02	85	Diesel	2004	13	Hudson		$ 239,846.00	
YEAR 02	86	Diesel	2000	17	Morris		$ 239,846.00	
YEAR 02	87	Diesel	2000	17	Hudson		$ 239,846.00	
YEAR 02	88	Diesel	2001	16	Bergen		$ 239,846.00	
YEAR 02	89	Diesel	2001	16	Hudson		$ 239,846.00	
YEAR 02	63	Diesel	2000	17	Essex		$ 265,268.00	
YEAR 02	O10	Diesel	2001	16	Ocean		$ 182,260.00	
YEAR 03	90	Diesel	2001	16	Hudson		$ 239,846.00	
YEAR 03	91	Diesel	2001	16	Hudson		$ 239,846.00	
YEAR 03	93	Diesel	2002	15	Essex		$ 239,846.00	
YEAR 03	94	Diesel	2002	15	Union		$ 239,846.00	
YEAR 03	95	Diesel	2002	15	Passaic		$ 239,846.00	
YEAR 03	96	Diesel	2002	15	Essex		$ 239,846.00	
YEAR 03	97	Diesel	2003	14	Bergen		$ 239,846.00	
YEAR 03	98	Diesel	2003	14	Passaic		$ 239,846.00	
YEAR 03	99	Diesel	2002	15	Hudson		$ 239,846.00	
YEAR 03	100	Diesel	2003	14	Essex		$ 239,846.00	
YEAR 03	112	Diesel	2001	16	Essex		$ 239,846.00	
YEAR 03	128	Diesel	2003	14	Hudson		$ 239,846.00	
YEAR 03	130	Diesel	2003	14	Hudson		$ 239,846.00	
YEAR 03	O8	Diesel	1999	18	Ocean		$ 182,260.00	
YEAR 03	175	Diesel	1999	18	Various		$ 182,260.00	
						$836,385	**$9,689,110**	**$10,525,495**