# APPENDIX D-4 Beneficiary Eligible Mitigation Action Certification

### BENEFICIARY ELIGIBLE MITIGATION ACTION CERTIFICATION

Beneficiary State of Oklahoma

	Act on Behalf of the Beneficiary Oklahoma Department of Environmental Quality
	delegation of such authority to direct the Trustee delivered to the
Trustee pursuant to a Delega	ntion of Authority and Certificate of Incumbency)
Action Title:	Oklahoma DERA FY18
Beneficiary's Project ID:	DS-01F36801-0 (2)
Funding Request No.	(sequential) 2
Request Type:	☐ Reimbursement ■ Advance
(select one or more)	☐ Other (specify):
Payment to be made to:	■ Beneficiary
(select one or more)	☐ Other (specify):
Funding Request &	Attached to this Certification
Direction (Attachment A)	☐ To be Provided Separately
	CHMMADV
	SUMMARY
Eligible Mitigation Action [	Appendix D-2 item (specify):
Action Type I	■ Item 10 - DERA Option (5.2.12) (specify and attach DERA Proposal). See Attachme
	request fits into Beneficiary's Mitigation Plan (5.2.1):
Pages 2-3 of the Oklahoma BMP discu	uss the use of VW Trust funds for DERA.
This project removes from service 33 diesel schoo will be replaced with 33 new equivalent buses. The	gation Action Item Including Community and Air Quality Benefits (5.2.2):  bl buses from various school districts across the state. The engine model years on these project buses range from 1996 to 2005. The see projects will reduce air pollution exposure among children across the state, which is impactful because children constitute a benefits, according to the Diesel Emissions Quantifier, are 14.38 short tons of NOx, 1.10 short tons of PM2.5, 2.20 short tons of HC. CO2
Estimate of Anticipated NOx	Reductions (5.2.3):
_	this project are 14.38 short tons, according to the Diesel Emissions Quantifier.
Identification of Government	tal Entity Responsible for Reviewing and Auditing Expenditures of Eligible
	Ensure Compliance with Applicable Law (5.2.7.1):
Oklahoma Department of Environment	al Quality
Page 14 of the Oklahoma BMP describes how DEG webpages containing information in regard to the C	will make documentation publicly available (5.2.7.2).  Q will make information pertinent to the VW Trust publicly available. In addition, Oklahoma DEQ maintains a website which includes Oklahoma DERA and VW programs. The Oklahoma DERA website is at: http://www.deq.state.ok.us/agdnew/cleandiesel/index.html ate.ok.us/agdnew/cwsettlement/index.htm. Oklahoma DEQ also operates separate mailing lists for the DERA and VW programs.
	irement to be placed on each NOx source proposed to be mitigated (5.2.8).
	ect partner was required to pay 75% of the cost of the new diesel bus. Only one entity has planned to Schools will provide 86% of the funds for their project.
•	complied with subparagraph 4.2.8, related to notice to U.S. Government
Agencies (5.2.9).	
Oklahoma DEQ sent notice by USF Department of Agriculture listed in s	PS and email to the representatives from the U.S. Department of the Interior and the U.S. subparagraph 4.2.8 of the State Trust Agreement on February 15, 2018.

If applicable, describe how the mitigation action will mitigate the impacts of NOx emissions on communities that have historically borne a disproportionate share of the adverse impacts of such emissions (5.2.10).

Impact on communities that have historically borne a disproportionate share of the adverse impacts of NOx emissions was one of the metrics by which all project applications for this DERA program were ranked and awarded. Projects which were located in counties with historically high ozone concentrations received priority over projects which were not. Out of the 9 project partners covered by this D-4, 3 are located in potential ozone nonattainment counties identified by the National Air Toxics Assessment as having higher emissions of air toxics, 1 is located in a county containing a Federal Class I Area, and 7 are located along a major interstate.

## ATTACHMENTS (CHECK BOX IF ATTACHED)

Ø	Attachment A	Funding Request and Direction.
<b>Ø</b>	Attachment B	Eligible Mitigation Action Management Plan Including Detailed Budget and Implementation and Expenditures Timeline (5.2.4).
	Attachment C	Detailed Plan for Reporting on Eligible Mitigation Action Implementation (5.2.11).
Ø	Attachment D	Detailed cost estimates from selected or potential vendors for each proposed expenditure exceeding \$25,000 (5.2.6). [Attach only if project involves vendor expenditures exceeding \$25,000.]
Ø	Attachment E	DERA Option (5.2.12). [Attach only if using DERA option.]
	Attachment F	Attachment specifying amount of requested funding to be debited against each beneficiary's allocation (5.2.13). [Attach only if this is a joint application involving multiple beneficiaries.]

#### **CERTIFICATIONS**

By submitting this application, the Lead Agency makes the following certifications:

- 1. This application is submitted on behalf of Beneficiary

  and the person executing this certification has authority to make this certification on behalf of the Lead Agency and Beneficiary, pursuant to the Certification for Beneficiary Status filed with the Court.
- 2. Beneficiary requests and directs that the Trustee make the payments described in this application and Attachment A to this Form.
- 3. This application contains all information and certifications required by Paragraph 5.2 of the Trust Agreement, and the Trustee may rely on this application, Attachment A, and related certifications in making disbursements of trust funds for the aforementioned Project ID.
- 4. Any vendors were or will be selected in accordance with a jurisdiction's public contracting law as applicable. (5.2.5)
- 5. Beneficiary will maintain and make publicly available all documentation submitted in

support of this funding request and all records supporting all expenditures of eligible mitigation action funds subject to applicable laws governing the publication of confidential business information and personally identifiable information. (5.2.7.2)

DATED:	May 6, 2019	John Terrill, Division Director
		[NAME]
		[TITLE] Oklahoma Department of Environmental Quality
		[LEAD AGENCY]
		for
		State of Oklahoma
		[BENEFICIARY]

## **ATTACHMENT B**

## PROJECT SCHEDULE AND MILESTONES

## PROJECT MANAGEMENT PLAN PROJECT SCHEDULE AND MILESTONES:

Action	Start Date	End Date
Subgrant Program Development	February 24, 2018	November 15, 2018
Solicitation of Project Partners (RFP)	October 16, 2018	December 20, 2018
Announce Funding	October 16, 2018	December 20, 2018
Accept Applications	October 16, 2018	December 20, 2018
Make Subawards	January 11, 2019	January 25, 2019
Complete MOAs for Awardees	January 28, 2019	April 30, 2019
Project Implementation	February 20, 2019	September 2019
Procurement and Installation of Equipment	February 20, 2019	September 2019
Monitoring and Oversight of Project	February 20, 2019	September 2019
Reporting	February 20, 2019	September 2019
Project Completion Date	September 1, 2019	September 1, 2019

## **PROJECT BUDGET:**

		Project Sub-	Amount Funded by	Amount Funded by	Amount Funded by
Project Description	Project Partner	Total	Trust	EPA	Project Partner
Replacement of one 1999 diesel school bus and one 2002 diesel school					- <b>,</b>
bus with two EPA-certified 2017 or newer school buses	Calera PS	\$148,000.00	\$14,800.00	\$22,200.00	\$111,000.00
Replacement of one 2005 diesel school bus with one EPA-certified 2017					
or newer school bus	Caney Valley PS	\$78,900.00	\$7,890.00	\$11,835.00	\$59,175.00
Replacement of four 2001 diesel school buses, two 2002 diesel school					
buses, and four 2003 diesel school buses with ten EPA-certified 2017 or					
newer school buses	Edmond PS	\$939,310.00	\$93,930.80	\$140,896.20	\$704,483.00
Replacement of two 1998 diesel school buses, two 1999 diesel school					
buses, and one 2000 diesel school bus with five EPA-certified 2017 or					
newer school buses	Lawton PS	\$390,000.00	\$39,000.00	\$58,500.00	\$292,500.00
Replacement of one 2005 diesel school bus with one EPA-certified 2017					
or newer school bus	Piedmont PS	\$91,467.00	\$9,146.70	\$13,720.05	\$68,600.25
Replacement of one 1996 diesel school bus, and two 2000 diesel school					
buses with three EPA-certified 2017 or newer school buses	Spiro PS	\$495,000.00	\$27,090.00	\$40,635.00	\$427,275.00
Replacement of one 1996 diesel school bus with one EPA-certified 2017					
or newer school bus	Stigler PS	\$75,497.00	\$7,549.70	\$11,324.55	\$56,622.75
Replacement of one 2005 diesel school bus with one EPA-certified 2017					
or newer school bus	Vian PS	\$77,000.00	\$7,700.00	\$11,550.00	\$57,750.00
Replacement of one 2002 diesel school bus, two 2003 diesel school					
buses, two 2004 diesel school buses, and four 2005 diesel school buses					
with nine EPA-certified 2017 or newer school buses	Yukon PS	\$713,925.00	\$71,392.50	\$107,088.75	\$535,443.75
	Administrative	\$50,032.00	\$20,012.00	\$30,020.00	\$0
	Project Totals	\$3,059,131.00	\$298,511.70	\$447,769.55	\$2,312,849.75
	Percentage	100%	9.75%	14.63%	75.60%

## **PROJECTED TRUST ALLOCATIONS**

	2019
Anticipated Project Funding Request to be paid through the Trust	\$298,511.70
2. Anticipated Cost Share	\$2,760,619.30
3. Anticipated Total Project Funding (line 1 plus line 2)	\$3,059,131.00
Cumulative Trustee Payments Made to Date Against Cumulative     Approved Beneficiary Allocation	\$167,666.34
Cumulative Unused Trustee Payments Returned to Trust from     Previous Funding Requests	\$0.00
6. Net Trustee Payments Made to Date Against Cumulative Approved Beneficiary Allocation (Line 4 minus Line 5)	\$167,666.34
7. Current Beneficiary Project Funding to be paid through the Trust (line 1)	\$298,511.70
8. Total Funding Allocated to Beneficiary (line 6 plus line 7)	\$466,178.04
9. Initial Beneficiary Share of Trust Funds	\$20,922,485.12
10. Beneficiary Share of Estimated Funds Remaining in Trust (line 9 minus line 6)	\$20,754,818.78
11. Net Beneficiary Funds Remaining in Trust, net of cumulative Beneficiary Funding Actions (line 10 minus line 7)	\$20,456,307.08

#### ATTACHMENT C

## DETAILED PLAN FOR REPORTING ON ELIGIBLE MITIGATION ACTION IMPLEMENTATION

Per Subparagraph 5.2.11 of the Environmental Trust Agreement for State Beneficiaries ("Trust Agreement"), Beneficiaries must set forth a "detailed plan for reporting on Eligible Mitigation Action implementation" to be included in an Appendix D-4 funding request. The Oklahoma Department of Environmental Quality (DEQ) plans to report per 5.3 of the Trust Agreement and Sections H and I of DEQ's DERA Cooperative Agreement with EPA.

DEQ is committed to meeting reporting requirements consistent with Subparagraph 5.3 of the Trust Agreement, as set forth below:

For each Eligible Mitigation Action, no later than six months after receiving its first disbursement of Trust Assets, and thereafter no later than January 30 (for the preceding six-month period of July 1 to December 31) and July 30 (for the preceding six-month period of January 1 to June 30) of each year, each Beneficiary shall submit to the Trustee a semiannual report describing the progress implementing each Eligible Mitigation Action during the six-month period leading up to the reporting date (including a summary of all costs expended on the Eligible Mitigation Action through the reporting date). Such reports shall include a complete description of the status (including actual or projected termination date), development, implementation, and any modification of each approved Eligible Mitigation Action. Beneficiaries may group multiple Eligible Mitigation Actions and multiple sub-beneficiaries into a single report. These reports shall be signed by an official with the authority to submit the report for the Beneficiary and must contain an attestation that the information is true and correct and that the submission is made under penalty of perjury. To the extent a Beneficiary avails itself of the DERA Option described in Appendix D-2, that Beneficiary may submit its DERA Quarterly Programmatic Reports in satisfaction of its obligations under 15 of 43 this Paragraph as to those Eligible Mitigation Actions funded through the DERA Option. The Trustee shall post each semiannual report on the State Trust's public-facing website upon receipt.

In addition to required annual and semiannual reporting to the Trust, quarterly and final reporting to EPA is also required for the duration of the FY 18 Oklahoma DERA project period, per *Programmatic Conditions*, Sections *H* and *I* of DEQ's DERA Cooperative Agreement with EPA, as set forth below:

#### H. Quarterly Reporting and Environmental Results

Quarterly progress reports will be required. Quarterly reports are considered project status reports and will address the progress made achieving the work plan goals. In general, quarterly reports will include summary information on technical progress and expenditures, and planned activities for next quarter. A template for the quarterly report will be available at <a href="https://www.epa.gov/cleandiesel/clean-diesel-state-allocations">www.epa.gov/cleandiesel/clean-diesel-state-allocations</a>. Quarterly reports are due according to the following schedule. If a due date falls on a weekend or holiday, the report will be due on the next business day.

April 1 – June 30 Reporting Period: report due date July 30

July 1 – September 30 Reporting Period: report due date October 30 October 1 – December 31 Reporting Period: report due date January 30 January 1 – March 31 Reporting Period: report due date April 30

If a project start date falls within a defined Reporting Period, the recipient must report for that period by the given due date. This quarterly reporting schedule shall be repeated for the duration of the award agreement.

#### H.1. Subaward Reporting Requirement

If the recipient chooses to pass funds from this assistance agreement to other entities, the recipient must comply with applicable provisions of 2 CFR Part 200 and the EPA Subaward Policy, which may be found at: https://epa.gov/grants/epa-subaward-policy. If applicable, the recipient must report on its subaward monitoring activities under 2 CFR 200.331(d). Examples of items that must be reported if the pass-through entity has the information available are:

- H.1.1. Summaries of results of reviews of financial and programmatic reports.
- H.1.2. Summaries of findings from site visits and/or desk reviews to ensure effective subrecipient performance.
- H.1.3. Environmental results the subrecipient achieved.
- H.1.4. Summaries of audit findings and related pass-through entity management decisions.
- H.1.5. Actions the pass-through entity has taken to correct deficiencies such as those specified at 2 CFR 200.331(e),
- 2 CFR 200.207 and the 2 CFR Part 200.338 Remedies for Noncompliance.

#### I. Final Report:

The final project report will include all categories of information required for quarterly reporting, including a final, detailed fleet description. The final project report will also include a narrative summary of the project or activity, project results (outputs and outcomes) including final emissions benefit calculations, and the successes and lessons learned for the entire project. To the extent possible, final emission benefit calculations should be based on the actual number and type of technologies, vehicles, equipment and engines implemented under the award and actual vehicle miles traveled, idling and/or operating hours, and fuel use. If actual vehicle miles traveled, idling and/or operating hours, and fuel use are not available, the final report will include a detailed explanation of how these values are derived, as well as any assumptions or default values used, for the purposes of emissions benefit calculations. The final report will also detail the methodologies used for the emission benefit calculation.

For projects involving vehicle/engine/equipment replacement the recipient must provide in the final report: 1) Evidence that the replacement activity is an "early replacement," and would not have occurred through normal attrition/fleet turnover (i.e. without the financial assistance provided by EPA) within three years of the project period start date. Supporting evidence can include verification that the vehicles or equipment being replaced have useful life left and fleet characterization showing fleet age ranges and average turnover rates per the vehicle or fleet owner's budget plan, operating plan, standard procedures, or retirement schedule; 2) Evidence of appropriate scrappage (see J.9.3 below); and 3) Specification of the model years and the emission standard levels for PM and NOx, for both the engine being replaced and the new engine.

For projects that take place in an area affected by, or includes vehicles, engines or equipment affected by federal law mandating emissions reductions, the recipient must provide in the final report evidence that emission reductions funded with EPA funds were implemented prior to the effective date of the mandate and/or are in excess of (above and beyond) those required by the applicable mandate.

The final report shall be submitted to the EPA Project Officer within 90 days after the project period end date or termination of the assistance agreement. A template for the final report will be available at <a href="https://www.epa.gov/cleandiesel/clean-diesel-state-allocations">www.epa.gov/cleandiesel/clean-diesel-state-allocations</a>.

#### I.1. Subaward Reporting Requirement

If the recipient chooses to pass funds from this assistance agreement to other entities, the recipient must comply with applicable provisions of 2 CFR Part 200 and the EPA Subaward Policy, which may be found at: https://epa.gov/grants/epa-subaward-policy. If applicable, the recipient must report on its subaward monitoring activities under 2 CFR 200.331(d). Examples of items that must be reported if the pass-through entity has the information available are:

- I.1.1. Summaries of results of reviews of financial and programmatic reports.
- *I.1.2.* Summaries of findings from site visits and/or desk reviews to ensure effective subrecipient performance.
- *I.1.3.* Environmental results the subrecipient achieved.
- I.1.4. Summaries of audit findings and related pass-through entity management decisions.
- I.1.5. Actions the pass-through entity has taken to correct deficiencies such as those specified at 2 CFR 200.331(e), 2 CFR 200.207 and the 2 CFR Part 200.338 Remedies for Noncompliance.

#### **ATTACHMENT D**

## <u>Detailed cost estimates from selected or potential vendors for each proposed expenditure exceeding \$25,000.</u>

The cost estimates for school bus projects ranged from \$74,000 to \$127,000 for new Type C school buses. All buses purchased and that will be purchased are diesel-fueled vehicles that are replacing old diesel vehicles. During this round, DEQ received 26 cost estimates from selected recipients; two example estimates are attached for review.

Gross Vehicle Weight Rating (GVWR) Class	Diesel Estimates
Class 5	NA
Class 6	NA
Class 7	\$74,000 - \$127,000
Class 8	NA



#### A HIGHER STANDARD OF VALUE

1735 W RENO AVENUE · OKLAHOMA CITY, OK 73106 · 405-236-2792 · FAX 405-235-2541

## Caney Valley Public Schools

## 71 Passenger Route Bus

- 71 Passenger Route Bus: \$78,900.00 per unit
- Quote is good for 60 90 days



Estimate Prepared For:

CANEY VALLEY PUBLIC SCHOOLS Mr. Rick Peters

> **Estimate Number:** 346148

**Estimate Date:** 11/26/2018

Prepared By:

Tulsa, OK 74107

918 557 2110

Midwest Bus Sales, Inc. 1222 W 37th Place

Model Profile: Saf-T-Liner C2 340TS

**Product Type:** 

School Transportation

Year: Chassis Model: 2020

B2 106

Chassis MFG:

**FLNER** 

GVWR:

29800

Passenger Capacity:

Headroom:

71

78

Wheelbase:

279

Brake Type:

**HYDRAULIC** 

**Engine Type:** 

CUMMINS B6.7 220 DIESEL, 6 Cyl, 220 HP, 2600 RPM

Fuel Type:

DIESEL

**Fuel Tank Capacity:** 

100 GALLON/378 LITER STEEL RECTANGULAR FUEL TANK, BETWEEN RAIL

Transmission Type:

ALLISON 2500 PTS AUTOMATIC TRANSMISSION

Axle, Front:

DA-F-10-3 10,000# FF1 71.5 KPI/3.74 DROP SINGLE FRONT AXLE

Axle, Rear:

DA-RS-21-4 21K R-SERIES SINGLE REAR AXLE

Tires, Front:

RADIAL FRONT TIRE, MICHELIN XZE2,11R22.5 16 PLY

Tires, Rear:

MICHELIN X MULTI D 11R22.5 16 PLY REAR TIRES

Suspension Front: Suspension Rear: 10,000 LB. TAPERLEAF FRONT SUSPENSION COMFORT TRAC 21K 52 INCH RR SPRING SUSPENSION

Surveillance System:

3 Camera SEON

Estimate for 1 complete unit(s): \$85,000.00

#### ATTACHMENT E

### Additional Information about the DERA Workplan

The following DERA workplan, titled *Fiscal Year 2017 and 2018 Oklahoma Clean Diesel Grant Program Work Plan and Budget Narrative* (Workplan), was originally submitted to EPA in March 2017, and amended to its current, attached form in November 2017. The Workplan was submitted with the expectation that funds from the *Environmental Mitigation Trust Agreement for State Beneficiaries* would be used as Oklahoma's state matching funds, as depicted in the "Project Budget Overview" on page 2 of the Workplan. The *Oklahoma Beneficiary Mitigation Plan* was in the planning and draft phases during the writing of the Workplan.

Because the Workplan is a forward-planning document and the FY18 Oklahoma DERA Program is now nearing completion, some projections, such as timelines and budget expectations, do not accurately reflect the current state of the program. EPA understands the nature of the Workplan as best estimates at the time of submittal, and does not require that the Workplan be adjusted as the program progresses. This creates minor discrepancies between the Workplan, the D-4, and some of the D-4 attachments. However, the attached Workplan is the official and final version. Where discrepancies exist, in all cases, consider the information contained in Attachment E to be projections and information contained in the D-4 and other D-4 Attachments to be the most current and accurate.

All other documents in this D-4 submittal and accompanying attachments are up-to-date.



### FISCAL YEAR 2017 and 2018 OKLAHOMA CLEAN DIESEL GRANT PROGRAM WORK PLAN AND BUDGET NARRATIVE

\*\*\*\*

### **SUMMARY PAGE**

Project Title: Oklahoma Clean Diesel Grant Program

Organization Name: Oklahoma Department of Environmental Quality

**Project Manager: Christina Hagens** 

Mailing Address: PO Box 1677, Oklahoma City, OK, 73101-1677

Phone: (405) 702-4100 Fax: (405) 702-4101

Email: christina.hagens@deq.ok.gov

#### **Project Budget Overview:**

	FY 2017*	FY 2018**
EPA Base Allocation	\$236,569	\$275,432
State or Territory Matching Funds (if applicable)	\$236,569	\$275,432
EPA Match Incentive (if applicable)	\$118,284	\$137,716
Mandatory Cost-Share	\$1,698,054	\$1,915,644
TOTAL Project	\$2,289,476	\$2,604,224

<sup>\*</sup>Oklahoma has an open FY 2017 DERA grant.

#### **Project Period**

This work plan includes all work funded with FY 2017 and FY 2018 funds for work performed from October 1, 2017 through September 30, 2019.

### **Summary Statement**

The state of Oklahoma wishes to use the allocation to fund a clean diesel program for the purpose of replacing older on-road vehicles, primarily school buses. Proposals to replace school buses will be given priority, although other projects to be considered will include the installation of verified idle reduction technologies and exhaust control retrofits. Winning projects will be chosen through a priority system focusing on affected population and cost effectiveness.

Details on past Oklahoma Clean Diesel Grant Program projects can be found here: http://www.deq.state.ok.us/aqdnew/cleandiesel/index.html

<sup>\*\*</sup> Will vary based on eligible projects performed and actual amount of funds awarded.

\*\*\*\*

#### **SCOPE OF WORK**

#### PROJECT DESCRIPTION:

The Oklahoma Clean Diesel Grant Program for FY 2017 aimed to provide vehicle replacements as well as the implementation of verified idle reduction technologies for qualifying on-road vehicles. This included school buses, municipal fleet vehicles, and eligible projects from private business applicants. For FY 2018, the project offered school bus replacements as well as the installation of exhaust control devices for qualifying on-road and non-road vehicles, both publicly (municipal sector) and privately (private sector) owned. Significant reductions are expected to be achieved in diesel emissions in terms of tons of pollution produced and diesel emissions exposure.

The focus of the program will be to accelerate the replacement of older school buses that otherwise would remain on the road for a number of additional years. These higher-polluting vehicles will be replaced with newer diesel or gasoline vehicles meeting current emissions standards. Other potential projects will reduce idling emissions through the installation of supplemental heat, air conditioning, and/or electricity equipment and reduce tailpipe and/or crankcase emissions through the installation of exhaust controls.

The Oklahoma Department of Environmental Quality (ODEQ) considers the municipal sector to include city-owned and operated diesel fleets, such as garbage, fire, and law enforcement vehicles, as well as transit buses. Fleets that are not owned by a city or township but are contracted by a city to fulfill government functions also fall into this category (e.g., sanitation fleets). Additionally, the private sector utilizes a wide variety of on-road and non-road diesel vehicles.

#### STATE/TERRITORY GOALS AND PRIORITIES:

The state of Oklahoma is currently designated attainment for all of the National Ambient Air Quality Standards (NAAQS) established by the federal government. Some areas in Oklahoma face being designated non-attainment for ozone, PM<sub>2.5</sub>, and SO<sub>2</sub>. Specifically of concern are the Oklahoma City and Tulsa metropolitan areas. Projects in high population centers in near non-attainment areas will have a priority value assigned to them in the selection criteria.

According to data from Version 2 of the 2014 National Emissions Inventory, on-road emissions account for approximately 23.9% of NOx emissions, 2.8% of VOC emissions, 2.1% of  $PM_{2.5}$  emissions, and 1.0% of  $PM_{10}$  emissions in the state. Of those on-road emissions, light- and heavy-duty diesel engine emissions account for approximately 50% of NOx emissions, 12% of VOC emissions, 70% of  $PM_{2.5}$  emissions, and 54% of  $PM_{10}$  emissions.

ODEQ personnel will use the Diesel Emissions Quantifier to track the emissions reductions associated with each project. Where practicable, specific fleet information provided by subgrant recipients will be included to produce more accurate estimates. However, if specific information is not available, Diesel Emissions Quantifier defaults will be used. For example, in previous

years, some school districts have provided detailed idling estimates and those estimates have been used to develop more precise fuel savings. In other cases, school districts were not able to track idle times with much accuracy and the Diesel Emissions Quantifier defaults were used to estimate fuel savings due to the adoption of a fleet-wide anti-idling policy.

While evaluating our previous grant projects, ODEQ performed an informal assessment of various methods of estimated emissions reductions due to program activities. Results obtained using engine emission factors and detailed mileage estimates were compared with results obtained from the Diesel Emissions Quantifier defaults (both idling hours and vehicle miles driven). ODEQ determined that the more detailed estimates yielded emissions reductions comparable to those obtained from the Diesel Emissions Quantifier using default values.

#### **VEHICLES AND TECHNOLOGIES:**

Oklahoma will focus primarily on the replacement of school buses, so priority will be given to these proposals. Based on the estimated budget, ODEQ tentatively anticipates replacing 51 buses. The state has administered successful school bus replacement programs in previous years, resulting in a positive impact on air quality. However, due to current budget constraints in the education community, it is possible that many schools will not have the funds to apply for these grants. Should Oklahoma receive a reduced number of applicants for school bus replacements, it will consider other projects that include the installation of verified idle reduction technologies and the retrofitting of exhaust controls. As projects are carried out, any allocation changes will be updated and published in the forthcoming quarterly and summary reports.

For FY 2017, applications proposing emissions reductions through verified idle reduction technology or vehicle replacements were considered. Potential projects included:

- Verified Idle Reduction Technologies A list of eligible, EPA verified idle reduction technologies is available at: <a href="https://www.epa.gov/verified-diesel-tech/smartway-technology">https://www.epa.gov/verified-diesel-tech/smartway-technology</a>. Funds will only be awarded for technologies on this list.
  - Oklahoma may fund up to 25% of the cost (labor and equipment) of eligible verified idle reduction technologies on long-haul trucks and school buses.
- Vehicle Replacements
  - o For highway diesel vehicles and buses (other than drayage), Oklahoma may fund up to 25% of the cost of a replacement vehicle powered by a 2017 model year or newer engine certified to EPA emission standards. Highway engine emission standards are available at: <a href="https://www.epa.gov/emission-standards-reference-guide/epa-emission-standards-heavy-duty-highway-engines-and-vehicles">https://www.epa.gov/emission-standards-reference-guide/epa-emission-standards-heavy-duty-highway-engines-and-vehicles</a>. Funds will only be awarded for vehicles that meet these standards.
  - o For highway diesel vehicles and buses (other than drayage), Oklahoma may fund up to 35% of the cost of a replacement vehicle powered by a 2017 model year or newer engine certified to meet CARB's Optional Low-NOx Standards. A list of certified vehicles is available at: <a href="https://www.arb.ca.gov/msprog/onroad/cert/cert.php">https://www.arb.ca.gov/msprog/onroad/cert/cert.php</a>. Funds will only be awarded for vehicles that meet these standards.

o For highway diesel vehicles and buses (other than drayage), Oklahoma may fund up to 45% of the cost of an all-electric replacement vehicle.

For FY 2018, any application proposing emissions reductions through school bus replacements and the installation of exhaust controls will be considered. Potential projects include:

- Diesel-to-Diesel and Diesel-to-Gasoline School Bus Replacements
  - o For diesel school buses, Oklahoma may fund up to 25% of the cost of a replacement school bus powered by a 2017 model year or newer diesel or gasoline engine certified to EPA emission standards. Highway engine emission standards are available at: <a href="https://www.epa.gov/emission-standards-reference-guide/epa-emission-standards-heavy-duty-highway-engines-and-vehicles">https://www.epa.gov/emission-standards-reference-guide/epa-emission-standards-heavy-duty-highway-engines-and-vehicles</a>. Funds will only be awarded for school buses that meet these standards.
- Exhaust Controls A list of eligible, EPA verified exhaust control technologies is available at: <a href="https://www.epa.gov/verified-diesel-tech/verified-technologies-list-clean-diesel">https://www.epa.gov/verified-diesel-tech/verified-technologies-list-clean-diesel</a>. A list of eligible, CARB verified exhaust control technologies is available at: <a href="https://www.arb.ca.gov/diesel/verdev/vt/cvt.htm">https://www.arb.ca.gov/diesel/verdev/vt/cvt.htm</a>. Funds will only be awarded for technologies on one of these lists.
  - Oklahoma may fund up to 100% of the cost (labor and equipment) for an eligible verified emission control on a publicly-owned vehicle and may fund up to 50% of the cost (labor and equipment) for an eligible verified emission control on a privately-owned vehicle. Each applicant requesting diesel particulate filters (DPFs) must data log the exhaust temperature of all vehicles to be considered before the application is submitted, so there is evidence the vehicles can accommodate the technology.

In addition, school buses will be required to implement and/or maintain anti-idling policies. Anti-idling practices are important because they save fleets money while reducing emissions. Idling should be limited to the engine manufacturer recommendations (generally no more than five minutes). There are different policies which may be applied to implement these practices, such as limiting idling time, vehicle monitoring, and allowing idling only when necessary.

Grant recipients will be required to keep any replacement vehicle and/or equipment in good working order for a minimum of five years after the project period ends.

#### **ROLES AND RESPONSIBILITIES:**

ODEQ will sub-grant funding to selected awardees based on their ability to meet the grant requirements and selection criteria to be developed by ODEQ. Activities will take place at various times during the project period as indicated in the timeline below.

#### ODEQ will be responsible for:

- announcing subgrant solicitations (RFP), award recipients, and ongoing program information on ODEQ's Oklahoma Clean Diesel webpage: http://www.deq.state.ok.us/AQDNEW/cleandiesel/index.html.
- ranking proposals submitted by applicants for subgrants.

- reviewing all proposals and ensuring successful recipients meet EPA funding requirements as established in the FY 2017-2018 State Clean Diesel Grant Program Information Guide (Section IX "Use of Funds Restrictions").
- contacting the highest-ranked applicants to begin the process. Lower ranking applicants will be informed that they have not been selected for an initial award, but will be encouraged to keep in touch with the ODEQ project manager in case a higher-ranking applicant is unable to participate.
- maintaining contact with the subgrant recipients, which is critical to the success of each project.
- engaging in outreach activities to maintain contact with various stakeholders.
- working with subgrant recipients to help arrange award ceremonies or other appropriate recognition.
- communicating program successes with the local and regional news media.
- fulfilling EPA grant reporting requirements.
- ensuring that grant projects are completed within the designated timelines, or as closely as possible, and informing EPA of any discrepancies.
- performing inspections to ensure project work has been completed prior to reimbursement.

### Project partners will be responsible for:

- submitting proposals by the deadline.
- signing Memoranda of Agreement (MOAs).
- completing eligible projects as specified within grant guidelines and timelines.
- maintaining contact with ODEQ.
- providing progress reports and financial statements to ODEQ.

While it may be valuable to investigate innovative financing programs, ODEQ has decided to focus on expanding the types of fleets and potential technologies described previously rather than explore innovative financing at this time. Because of this, the Oklahoma Clean Diesel Grant Program will not support grant rebates and/or loan projects.

#### ODEQ's Disbursement Methodology

- 1. Subgrantees are selected.
- 2. Subgrantees sign MOA describing terms of subgrant, including estimated project cost.
- 3. ODEQ issues a Purchase Order for the estimated project cost of the subgrant.
- 4. Subgrantees carry out details of the selected project, going out to bid for performed work and purchased items as necessary.
- 5. After project completion, subgrantees submit an invoice for the actual project cost to ODEQ, along with any supporting documentation (receipts, bids, etc.).
- 6. ODEQ confirms the project was completed to satisfaction and within grant terms.
- 7. Once paperwork is in order and all terms are satisfied, ODEQ issues a check to subgrantee as reimbursement for project work completed.
- 8. Any leftover funds resulting from projects that come in below estimated cost will be considered for additional projects.

ODEQ is not currently planning to utilize any additional leveraged resources beyond any voluntary matching funds or mandatory cost-share funds included in the project budget.

#### TIMELINE AND MILESTONES:

FY 2017								
Action	Start Date*	End Date*						
Subgrant Program Development	February 24, 2017	November 15, 2017						
Solicitation of Project Partners (RFP)	November 15, 2017	November 29, 2017						
Announce Funding	November 15, 2017							
Accept Applications	November 15, 2017	January 19, 2018						
Make Subawards	January 19, 2018	February 9, 2018						
Complete MOAs for Awardees	February 23, 2018							
Project Implementation	February 23, 2018	September 2018						
Procurement and Installation of Equipment	February 23, 2018	September 2018						
Monitoring and Oversight of Project	February 23, 2018	September 2018						
Reporting	February 23, 2018	September 2018						
Project Completion Date	September 2018							

FY 2018									
Action	Start Date*	End Date*							
Submit Notice of Intent to Continue (NOIC)		April 30, 2018							
Submit Work Plan and Budget Narrative		June 4, 2018							
Submit Grants.gov Application		June 25, 2018							
Subgrant Program Development/Develop RFP	October 1, 2018	October 15, 2018							
Announce Funding	October 16, 2018								
Accept Applications	October 16, 2018	December 3, 2018							
Make Subawards	December 17, 2018	January 7, 2019							
Complete MOAs for Awardees	January 7, 2019	January 25, 2019							
Project Implementation	January 25, 2019	September 2019							
Procurement and Installation of Equipment	January 25, 2019	September 2019							
Monitoring and Oversight of Project	January 25, 2019	September 2019							
Reporting	January 25, 2019	September 2019							
Project Completion Date	September 2019								

<sup>\*</sup>These dates may be adjusted depending upon the date of the award.

#### **DERA PROGRAMMATIC PRIORITIES:**

The Oklahoma Clean Diesel Grant Program will ensure that the programmatic priorities outlined in the Diesel Emissions Reduction Act of 2010 (42 USC 16131 *et seq.*) will be met as described below.

Areas in non-attainment or maintenance of National Ambient Air Quality Standards (NAAQS) for Ozone and/or PM<sub>2.5</sub>

These grant projects will impact areas with high population density and/or poor air quality. Although the state is in attainment for all criteria pollutants, special consideration will be given to the near non-attainment MSAs of Oklahoma City and Tulsa. Although the state has

maintained attainment status for all criteria pollutants since 1990, ODEQ is constantly concerned that a period of unusual weather may change Oklahoma's attainment status. The state would like to add the DERA program to the toolbox of resources available to promote a healthy environment for its citizens. In spite of ODEQ's current efforts, the state may face non-attainment status based on the new ozone, PM<sub>2.5</sub>, and SO<sub>2</sub> NAAQS.

Areas with toxic air pollutant concerns as identified from the National Air Toxics Assessment (NATA) data

The counties of Bryan, Carter, Oklahoma, Rogers, and Tulsa are on the 2017 Priority County List per the 2011 National Scale Air Toxics Assessment. This means that all or part of the county's population was exposed to more than  $2.0 \,\mu\text{g/m}^3$  of diesel particulate matter emissions.

Areas designated as Federal Class I areas

The Wichita Mountains National Wildlife Refuge near Lawton, Oklahoma is an 8,900-acre Mandatory Class I Federal Area.

Areas accepted to participate in EPA's Ozone Advance or PM Advance Programs

The Oklahoma City and Tulsa MSAs are currently participating in the Ozone Advance program to encourage voluntary reductions to maintain their ozone attainment statuses.

Areas that receive a disproportionate quantity of air pollution from diesel fleets
Grant project funding will impact areas that receive a disproportionate quantity of air pollution from diesel fleets. These areas include school properties, neighborhoods, major highways and thoroughfares, and large metropolitan areas. Two major interstates, I-40 and I-35, intersect in Oklahoma City, bringing heavy semi-truck traffic. Additionally, I-44 passes through both Oklahoma City and Tulsa.

Oklahoma's DERA program will maximize public health benefits to the citizens of the state by giving priority consideration to projects that will reduce diesel emissions in the areas described above. Diesel exhaust contains fine particles which can aggravate asthma and cause lung damage, as well as premature death. The Environmental Protection Agency has classified diesel particulate matter as a likely human carcinogen. These replacements will provide quantifiable reductions of these harmful emissions. Further, since diesel-to-gasoline school bus replacements are eligible projects under Oklahoma's DERA program, we can expect the positive impact from the reduction of diesel exhaust to be greater.

In a recent industry news release, a representative of an Athens, Ontario bus service stated new gasoline engines generally start easier, are more affordable, and are simpler to maintain than diesel engines<sup>1</sup>. In early 2017, the Blue Bird Vision gasoline school bus received full EPA and CARB certification. This model, equipped with a Ford 6.8L V10 engine, achieved an emission output of 0.08 g/bhp-hr NOx during certification. This output of nitrogen oxides is significantly less than the federal standard of 0.2 g/bhp-hr<sup>2</sup>. Not only are gasoline engines less expensive to own, they emit less NOx than most diesel engines.

<sup>&</sup>lt;sup>1</sup> http://stnonline.com/news/industry-releases/item/9557-howard-bus-services-takes-first-delivery-of-ic-bus-gasoline-school-buses

<sup>&</sup>lt;sup>2</sup> https://www.schoolbusfleet.com/news/721711/blue-bird-vision-gasoline-school-bus-certified-by-epa-carb

#### EPA'S STRATEGIC PLAN LINKAGE AND ANTICIPATED OUTCOMES/OUTPUTS:

The Oklahoma Clean Diesel Grant Program will support EPA's 2014-2018 Strategic Plan Goal 1, Objective 1.2, 'Improve Air Quality,' which states, "achieve and maintain health- and welfare-based air pollution standards and reduce risk from toxic air pollutants and indoor air contaminants." The program will also support EPA's FY 2018-22 Strategic Plan Goal 1, Objective 1.1, 'Improve Air Quality,' which states, "work with states and tribes to accurately measure air quality and ensure that more Americans are living and working in areas that meet high air quality standards." Diesel vehicle replacements and the installation of anti-idling and exhaust control technologies will reduce local and regional air pollution, including particulate matter, carbon monoxide, hydrocarbons, and toxic air pollutants. These actions will help Oklahoma achieve and maintain health-based air pollution standards and reduce risk from toxic air pollutants, improving air for the public.

#### **Outputs**

The outputs of the requested projects will include:

- the number of full vehicle replacements. This will be tracked quarterly by ODEQ staff.
- the number of idle reduction technology installations. This will be tracked quarterly by ODEQ staff.
- the number of exhaust control technology installations. This will be tracked quarterly by ODEQ staff.
- the annual pounds of particulate matter, carbon monoxide, and hydrocarbon emissions reduced. This will be tracked quarterly by ODEQ staff using EPA's Diesel Emissions Quantifier.
- cost effectiveness. This will be tracked quarterly by ODEQ staff using the Diesel Emissions Quantifier.
- health benefits. According to a 2005 press release from Lisa Fasano on behalf of EPA, it
  has been demonstrated that health benefits from diesel emissions reductions outweigh the
  costs by a ratio of 13:1. ODEQ will annually track the value of health benefits from
  emissions reductions using this ratio and the funds spent on the projects.

#### **Outcomes**

Expected outcomes from projects funded under this program may include, but are not limited to:

- short-term outcomes. Short-term outcomes of the projects will include reduced emissions of pollutants associated with diesel engines.
- medium-term outcomes. Medium-term outcomes of the projects will include widespread adoption of the implemented technology and documented emissions reductions from these and other sources of diesel emissions in multiple states (using the Diesel Emissions Quantifier).
- long-term outcomes. Long-term outcomes of the projects will include documented improved ambient air quality.

#### SUSTAINABILITY OF THE PROGRAM:

From FY 2008 through FY 2012 and for FY 2017, ODEQ successfully administered the Oklahoma Clean Diesel Grant Program, which primarily focused on the replacement, repower, and retrofitting of school buses across the state. In addition, ODEQ successfully administered ARRA grant money to further the clean school bus program in FY 2008 and FY 2009.

ODEQ has shared funding information with state superintendents, trade associations, and municipalities. Additionally, staff will develop new ways to publicize the FY 2018 funding opportunity. ODEQ will continue to promote the Oklahoma Clean Diesel Grant Program on its website: <a href="http://www.deq.state.ok.us/AQDNEW/cleandiesel/index.html">http://www.deq.state.ok.us/AQDNEW/cleandiesel/index.html</a>. This webpage not only connects potential subgrant recipients to new funding opportunities, but allows them to see the history of Oklahoma Clean Diesel successes. The webpage also includes information on clean diesel issues including idle reduction and health and environmental impacts.

ODEQ has promoted the Oklahoma Clean Diesel Grant Program by honoring the good works of subgrant recipients through award and press events. ODEQ will continue to recognize successful applicants for their commitment to improving Oklahoma's air quality through the reduction of diesel emissions.

#### **BUDGET NARRATIVE**

ODEQ will distribute work between five staff members. These staff members will be responsible for outreach, customer assistance, preparing and distributing the Request for Proposals (RFP), establishing selection criteria, reviewing proposals for administrative and technical completeness, assisting in project selection, and ensuring project implementation, verification, tracking, and follow-up.

### **Itemized Project Budget\***

	FY 2017 and FY 2018											
<b>Budget Category</b>	EPA Allocation	Voluntary Match (if applicable)	Mandatory Cost- Share (if applicable)	Total								
1. Personnel	\$22,894	\$15,262	\$0	\$38,156								
2. Fringe Benefits	\$11,046	\$7,364	\$0	\$18,410								
3. Travel	\$999	\$666	\$0	\$1,665								
4. Supplies \$180		\$120	\$0	\$300								
5. Equipment \$0		\$0	\$0	\$0								
6. Contractual	\$0	\$0	\$0	\$0								
7. Program Income	\$0	\$0	\$0	\$0								
8. Other	\$722,739	\$481,827	\$3,613,698	\$4,818,264								
9. Total Direct Charges	\$757,859	\$505,238	\$3,613,698	\$4,876,795								
10. Indirect Charges	\$10,143	\$6,762	\$0	\$16,905								
Grand Total	\$768,001	\$512,001	\$3,613,698	\$4,893,700								

<sup>\*</sup>Will vary based on eligible projects performed. These numbers were calculated based on an EPA base allocation of \$512,001.

#### **Explanation of Budget Framework**

#### **Personnel and Fringe Benefits**

ersonner und Fringe Benefits																			
	OKLAHOMA DEPARTMENT OF ENVIRONMENTAL QUALITY																		
FY 2018 CLEAN DIESEL GRANT																			
SALARY, FRINGE AND INDIRECT																			
	Bi-Weekly Annual Total Annual Annual MAN-YEAR GRANT GRANT INDIRECT GRANT																		
CLASSIFICATION	Salary		Salary	Anı	nual Salary		Fringe		Indirect	ON GRANT	SALARY		FRINGES		COSTS		T	TOTAL	
Env Program Specialist IV	\$ 2,234.37	\$	58,094	\$	58,094	\$	26,452	\$	25,423	0.03	\$	1,743	\$	794	\$	763	\$	3,300	
Env Program Specialist IV	\$ 2,234.37	\$	58,094	\$	58,094	\$	26,452	\$	25,423	0.05	\$	2,905	69	1,323	\$	1,271	69	5,499	
Env Program Specialist IV	\$ 2,234.37	\$	58,094	\$	58,094	\$	26,452	\$	25,423	0.05	\$	2,905	\$	1,323	\$	1,271	\$	5,499	
Env Program Specialist II	\$ 1,721.14	\$	44,750	\$	44,750	\$	23,230	<b>\$</b>	20,442	0.10	\$	4,475	\$	2,323	\$	2,044	\$	8,842	
Professional Engineer II	\$ 2,556.11	\$	66,459	\$	66,459	\$	28,473	\$	28,546	0.01	\$	665	\$	285	\$	285	\$	1,235	
TOTALS		\$	285,491	\$	285,491	\$	131,059		•	0.24	\$	12,693	\$	6,048	\$	5,634	\$	24,375	

#### OKI AHOMA DEPARTMENT OF ENVIRONMENTAL QUALITY **FY 2019 CLEAN DIESEL GRANT** SALARY, FRINGE AND INDIRECT Bi-Weekly MAN-YEAR GRANT GRANT INDIRECT GRANT Annual Total Annual Annual CLASSIFICATION ON GRANT SALARY Salary Salary Annual Salary Fringe **FRINGES** COSTS TOTAL Indirect Env Program Specialist IV 58.094 \$ 58,094 26.452 25.195 0.05 2,905 1.260 5.488 Env Program Specialist IV 58 094 \$ 58 094 \$ 26.452 25.195 0.05 2.905 1.323 1.260 5 488 Env Program Specialist IV \$ 2,234.37 58,094 \$ 58,094 26,452 25,195 0.05 2,905 1.323 1,260 \$ 5.488 Env Program Specialist II \$ 1.721.14 44 750 \$ 44 750 \$ 23 230 5 20.258 0.30 13,425 6.969 \$ 6.077 26.471 Professional Engineer II \$ 2,556.11 66,459 \$ 66,459 \$ 28,473 28,290 0.05 3,323 1,424 \$ 1,414 \$ 6,161 TOTALS 285,489 \$ 285,489 \$ 131,059 0.50 \$ 25,463 \$ 12,362 \$ 11,271 \$ 49,096

#### **Travel**

It is anticipated that two staff members will travel approximately 3,543 miles within the state for site visits to confirm equipment has been disabled as required and, in some cases, conduct award ceremonies to recognize participation in the DERA program. Award ceremonies will be conducted upon request of subgrant recipients. The mileage reimbursement rate is \$0.47 per mile. The total cost is approximately \$1,665.

#### **Equipment**

No equipment is expected to be purchased for the grant program.

### **Supplies**

Supplies include items such as postage, paper, pens, certificates for participants, and other miscellaneous office supplies. The total cost is approximately \$300.

#### **Contractual**

No contractual services are anticipated for the grant program. However, the competitive bid provisions of the Oklahoma purchasing act (Title 74 O.S. §85.1 *et seq.*) of the Oklahoma State Statute and the State Purchasing Rules ensure fair competition for suppliers. Designated purchasing agents are required to obtain bids as authorized by The Central Purchasing Act for the purchase of goods, services, construction, or information services. The State Purchasing Director oversees solicitations for acquisitions by invitation to bid, request for proposal, or request for quotation, and ensures that an evaluation method is clearly identified in any solicitation. The evaluation method must be either "lowest and best" or "best value."

#### Other

For the purposes of this application, Oklahoma assumes all successful applicants will be from school districts to replace buses. As projects are carried out, any allocation changes will be updated and published in the forthcoming quarterly and summary reports.

FY 2017						
<b>Budget Category</b>		EPA Allocation	Voluntary Match (if applicable)	Mandatory Cost- Share (if applicable)		
8. Other						
24 school buses	\$94,336.33/bus	\$14,150.44/bus	\$9,433.64/bus	\$70,752.25/bus		
Grand Total	\$2,264,072	\$339,610.60	\$226,407.40	\$1,698,054		

FY 2018						
<b>Budget Category</b>		EPA Allocation	Voluntary Match (if applicable)	Mandatory Cost- Share (if applicable)		
8. Other						
27 school buses	\$94,599.71/bus	\$14,189.96/bus	\$9,459.97/bus	\$70,949.78/bus		
Grand Total	\$2,554,192	\$383,128.80	\$255,419.20	\$1,915,644		

#### **Indirect Charges**

ODEQ has negotiated an indirect rate of 0.3007 (FY17) and 0.298 (FY18) with EPA. Indirect charges were calculated by multiplying this rate by the sum of personnel and fringe.

#### **Administrative Costs Expense Cap**

ODEQ understands up to 15% of the award can be used for administrative costs. ODEQ has budgeted for administrative costs to be less than 10%.

#### **Matching Funds and Cost-Share Funds**

The Oklahoma Department of Environmental Quality will match the EPA allocation of \$512,001 to maximize available funding allocations from EPA. ODEQ intends to use the DERA Option of the Volkswagen settlement for this match.

Applicants pursuing clean diesel projects will be required to provide matching funds. The actual match percentage is described in detail for each potential project under Vehicles and Technologies in the Scope of Work. ODEQ will follow EPA guidelines and requirements regarding all clean diesel projects.

#### **Funding Partnerships**

The grant program will fund projects through subawards only.