

Chapter 4

Emissions Reduction Incentive Grants Program

The Emissions Reduction Incentive Grants (ERIG) program awards grants to fund the incremental costs of projects in the eligible counties.

Activities that may be eligible under this program are outlined below. Vehicles and equipment used primarily for competition or recreation are not eligible for funding under any of the project categories. The TCEQ may more narrowly define or limit the types of eligible activities for a particular funding period.

Eligible Applicants

Applicants are potentially eligible for incentive funding if they operate or plan to operate on-road heavy-duty vehicles, non-road equipment, marine vessels, locomotives, or stationary engines primarily in one or more of the eligible counties, or if they otherwise contribute to NO_x emissions in the eligible counties.

For infrastructure activities (see Appendixes 6–8) persons owning and operating the infrastructure in an eligible county may also be eligible for funding. For demonstration projects, persons may be eligible for funding if they own the technology to be demonstrated in an eligible county, or if they own the vehicles or equipment on which the technology will be demonstrated.

For particular funding periods, the TCEQ may limit eligibility to certain types of applicants. The TCEQ may also allow a person other than the owner or operator of the vehicle or equipment to apply for and receive a grant, as long as the grant-funded project supports activities that meet these guidelines and will help to achieve the goals of the TERP.

Eligible Activities

Activities eligible for incentive funding are intended to reduce NO_x emissions in the designated eligible counties from on-road heavy-duty vehicles, non-road equipment, marine vessels, locomotives, or stationary engines when compared with a baseline vehicle or piece of equipment. Additional information and criteria on eligible activities and costs are available in the appendixes to this volume.

Most of the engines eligible under this program will be powered by diesel-fueled compression-ignition engines. However, engines powered by other fuels may also

be eligible, subject to decisions by the TCEQ for particular funding periods and geographic areas.

The TCEQ may further limit the types of eligible activities, and may more narrowly define eligibility requirements under a particular funding period, as needed to best achieve the goals of the TERP.

On-Road Heavy-Duty Vehicles

On-road heavy-duty vehicles with a gross vehicle weight rating of 8,500 pounds or more are eligible for grants under this program. Activities and eligible costs are explained in Appendix 1. Eligible activities include:

- lease or purchase of new on-road vehicles (fleet expansion),
- replacement of on-road vehicles,
- repower of on-road vehicles, and
- retrofit or add-on of emissions-reduction technology.

Non-Road Heavy-Duty Equipment

Non-road equipment powered by an engine rated at 25 horsepower or greater is eligible for grants under this program. For replacement and repower projects, this requirement refers to the horsepower of the engine being replaced and does not apply to the replacement engine or technology. Activities and eligible costs are explained in Appendix 2. Eligible activities include:

- lease or purchase of new non-road vehicles (fleet expansion),
- replacement of non-road vehicles,
- repower of non-road vehicles, and
- retrofit or add-on of emissions-reduction technology.

Marine Vessels

Marine vessels powered by engines of at least 25 hp, and associated auxiliary marine engines of at least 25 hp, are eligible for grants under this program. For replacement and repower projects, the requirement refers to the horsepower of the engine being replaced and does not apply to the replacement engine or technology. Activities and eligible costs are explained in Appendix 3. Eligible activities include:

- lease or purchase of new marine vessels (fleet expansion),
- replacement of marine vessels,

- repower of marine vessels, and
- retrofit or add-on of emissions-reduction technology.

Locomotives

Locomotives are eligible projects under this grant program. Activities and eligible costs are explained in Appendix 4. Eligible activities include:

- lease or purchase of new locomotives (fleet expansion),
- replacement of locomotives,
- repower of locomotives, and
- retrofit or add-on of emissions-reduction technology.

Stationary Equipment

Activities involving stationary engines of at least 25 hp are eligible for grants under this program. For replacement and repower projects, this requirement refers to the horsepower of the engine being replaced and does not apply to the replacement engine or technology.

An activity is not eligible if the activities or emissions reductions to be funded are already required by any state or federal law, rule, regulation, memorandum of agreement, or other legally binding document. In addition, any emissions-reduction credits generated by a project must be transferred to the state for the State Implementation Plan, and permanently retired.

Activities and eligible costs are explained in Appendix 5. Eligible activities include:

- lease or purchase of new stationary equipment (fleet expansion),
- replacement of stationary equipment,
- repower of stationary equipment, and
- retrofit or add-on of emissions-reduction technology.

Refueling Infrastructure

An eligible activity may include the purchase and installation of stationary or mobile on-site infrastructure for refueling motor vehicles, on-road heavy-duty vehicles, non-road equipment, marine vessels, locomotives, and stationary engines with a qualifying liquid or gaseous fuel. In some cases, the TCEQ may accept applications for refueling infrastructure related to stationary equipment. The applicant will need to supply proof that the infrastructure is needed and will be used in an eligible county.

A qualifying fuel is a liquid or gaseous fuel or additive, other than gasoline or diesel fuel, that is ultimately dispensed into a motor vehicle, an on-road heavy-duty vehicle, non-road equipment, a locomotive, a marine vessel, or a stationary engine, where the provision of the fuel results in reductions in NO_x emissions, as determined by the TCEQ, beyond reductions required by state or federal law. The reductions in NO_x emissions may be achieved directly through the use of the fuel or as a result of the replacement, repower, or retrofit of vehicles or equipment using gasoline or diesel fuel to vehicles or equipment using the qualifying fuel.

Activities and eligible costs are explained in Appendix 6.

On-Site Electrification and Idle-Reduction Infrastructure

An eligible activity may include the purchase and installation of on-site infrastructure—including auxiliary power units—designed to dispense electricity to motor vehicles, on-road heavy-duty vehicles, non-road equipment, marine vessels, locomotives, and stationary engines. The electricity may replace the power normally supplied by the engine while the vehicle or equipment is parked (idle reduction) or may recharge electric vehicles or equipment being used in lieu of vehicles or equipment powered by an internal combustion engine. The applicant will need to supply proof that the infrastructure is needed and will be used in an eligible county.

The TCEQ may also tender funds to other state agencies to implement infrastructure projects at rest areas and other public facilities on major highway transportation routes within eligible areas. Projects may also be funded for marine vessels operating in eligible waterways. Funding may be used for initial start-up and proper operation of the idle-reduction technologies.

Activities and eligible costs are explained in Appendix 7.

On-Vehicle Electrification and Idle-Reduction Infrastructure

An eligible activity may include the purchase and installation of equipment that enables an on-road vehicle, non-road equipment, a marine vessel, a locomotive, or a stationary engine to use electric power to operate, while the vehicle or equipment is parked, the systems normally supplied power by the propulsion engine or another on-board internal combustion engine that emits NO_x.

Activities and eligible costs are explained in Appendix 8. Eligible equipment may include:

- devices added on to enable acceptance of electricity from an external power source
- an auxiliary power unit purchased and installed on the vehicle or equipment to generate electricity.

Activities and eligible costs are explained in Appendix 8.

Rail Relocation and Improvements

Eligible activities may include rail-line relocation and improvements at rail intersections and grade crossings that will reduce emissions of NO_x by reducing locomotive and on-road vehicle idle time at those intersections.

Activities and eligible costs are explained in Appendix 9.

Use of Qualifying Fuel

The incremental costs associated with the purchase and use of a qualifying fuel or fuel additive in a motor vehicle, an on-road heavy-duty vehicle, non-road equipment, a marine vessel, a locomotive, or a stationary engine may be eligible for funding under this program. The incremental cost is the difference in cost between the qualifying fuel and a baseline fuel. For the purchase of fuel additives, the incremental costs include the full cost of the additive.

To determine an incremental cost for fuel purchases, the cost per gallon of the baseline fuel should be compared with the cost for an equivalent amount of the qualifying fuel. Equivalency between the qualifying fuel and the baseline fuel should be determined based on the energy content of the fuel, as measured by the use per mile or hour, or other method.

Activities and eligible costs are explained in Appendix 10.

Demonstration of New Technology

Projects under this category must demonstrate practical low-emissions retrofit technologies, repower options, and advanced technologies for on-road heavy-duty diesel vehicles and diesel-powered non-road equipment. Projects under this category may include:

- use of retrofit, repower, and add-on technologies to reduce NO_x emissions from the existing stock of heavy-duty diesel vehicles and non-road diesel equipment
- use of advanced technologies, including use of qualifying fuels, for new engines and vehicles that produce very low or zero emissions of NO_x—including stationary and mobile fuel cells—which could replace the use of higher-emitting diesels

Activities and eligible costs are explained in Appendix 11.

Grant-Program Procedures

This section contains the general procedures that will be used for applying for, awarding, and administering grants under this program. The TCEQ may adjust these

procedures and develop more detailed procedures, as needed, to ensure the effectiveness of the program.

Project Solicitation

Grant projects will be solicited through periodic or open-ended Requests for Applications and through other mechanisms to solicit grant applications. Copies of the RFAs and the necessary application forms are made available at the TERP website <www.terpgrants.org> and directly from the TCEQ.

Application Review and Selection

The program will review and evaluate grant applications according to criteria established in these guidelines and the RFAs. When it uses a competitive process, the agency will select among projects using ranking and scoring procedures explained in the RFAs. In general, the selection priorities may include allocation of the funding among a subset of the eligible counties, as well as allocation among the various types of project categories. Grants may also be selected in the order received or by another mechanism.

The TCEQ may also establish a cost-effectiveness threshold for particular funding periods and geographic areas.

Application-Verification Visits

Upon receipt of a grant application, the TCEQ may check the vehicle and equipment for condition, engine identification, and vehicle identification.

Awarding of Grants and Contracting

Projects selected for funding will be awarded a grant through the development and execution of a grant contract that is signed by the recipient and by an official of the TCEQ. Grant contracts may contain additional and more specific requirements beyond those contained in these guidelines. Grant recipients should review the contract's language carefully before accepting and signing it.

Because the funding for this program comes from revenue that is received throughout the year, all grant awards and contracts will be contingent upon the receipt of sufficient revenue to cover the grant. The TCEQ may issue grant contracts on a contingency basis, subject to a follow-up Notice to Proceed, once sufficient funds are available.

Reimbursement

Grant payments will be reimbursements, meaning that the agency will remit payment **after** the eligible expense has been incurred by the recipient. Recipients will also have the option to assign their grant payments directly to a dealer or service provider. The TCEQ will supply reimbursement request and reporting forms for use by the recipient.

In some cases, particularly for large projects and projects of long duration, the TCEQ may also authorize advance payments, based on a percentage of the expected final costs. The grant contract and the reimbursement forms will include requirements for documentation of expenses.

Upon completion of all grant-funded purchases, the grant recipient will need to submit a final request for reimbursement of all remaining expenses. The final request must include a completed and signed release of claims.

The grant recipient must also agree to place a label or sticker on the grant-funded vehicles and equipment, as may be supplied by the TCEQ.

Verification of Vehicle, Equipment, and Engine Disposition

The applicant must agree to decommission any old vehicle, equipment, or engine replaced under this program no later than 90 days after receiving reimbursement by the TCEQ.

Unless the executive director agrees to an alternative method, the decommissioning must be carried out by complete crushing or other complete destruction of the vehicle, equipment, or engine, or by making a hole in the engine block on both sides large enough to prevent repairs (usually at least 3 inches) and, for a replacement project, permanently destroying the frame by cutting the frame rails or main structural components of the vehicle or equipment.

For a locomotive-replacement project, the executive director may allow permanent removal from Texas, in lieu of destruction, in specific grants where the applicant has furnished adequate assurances that the old locomotive will not be returned to Texas. This option will not normally be available for other types of projects, although exceptions may be established for specific grant rounds to meet the goals of the program.

The applicant must certify the disposition of the vehicle, equipment, or engine using forms supplied by the TCEQ. The executive director may require a certified or duplicate Texas Nonrepairable Vehicle Title as evidence that an on-road vehicle has been rendered permanently inoperable. Grantees may be required to return grant funds if they fail to meet the disposition requirements, including if the vehicle, equipment, or engine is later returned to operation.

Monitoring and Reporting

The grant recipient must agree to monitor and track the use of grant-funded vehicles, equipment, infrastructure, and qualifying fuel for the activity life designated in the grant contract. The activity life is used to determine the total reductions in NO_x emissions and cost-effectiveness of the activities and the project.

Monitoring reports must be submitted to the TCEQ twice a year, unless the TCEQ authorizes an alternative reporting schedule. The reports will document the usage over the required reporting period. The TCEQ may, at its sole discretion, authorize an annual or longer reporting schedule, including suspending the reporting requirements, if a grant recipient is meeting the reporting requirements and is otherwise complying with all program requirements. The TCEQ may require applicants to use global-positioning-system units to monitor grant-funded equipment or allow voluntary use of a GPS unit in lieu of filing the required reports. All applicants monitoring via GPS will be required to use a vendor the TCEQ selects.

If an alternative disposition plan is approved for a locomotive project, the grant recipient must agree to monitor and track the location of the old locomotive to ensure that it is not returned to Texas. The grant recipient must also agree to supply monitoring information to the TCEQ on request. The grant recipient must notify the TCEQ immediately if the use of the locomotive, including where it is used, deviates from any approved alternative disposition plan.

Emissions-Reduction Commitment

Over the activity life of each grant-funded activity, the grant recipient commits the generated emissions reductions to the State Implementation Plan. The recipient is responsible for performing the activities, as defined in the contract, necessary to achieve the calculated reductions in NO_x emissions within the eligible areas. Unless the TCEQ has determined that the intent of the program has been met, recipients will be required to return all or a pro rata share of the grant funds to the TCEQ if the emissions reductions over the activity life are not achieved.

The emissions reduction calculations are based on a *usage amount* (miles, hours, or fuel use) over the activity life. In order to verify that the required emissions reductions are actually achieved, the TCEQ may require a usage commitment by the grant recipient or may establish default usage amounts either based on the category the project belongs to or for individual types of vehicles or equipment. If a specific usage commitment is required, grant recipients must agree to operate the grant-funded vehicles or equipment in the eligible counties for the usage amounts committed to in the contract. If the TCEQ establishes default usage amounts, a grant recipient may not be required to commit to a specific usage amount over the activity life but will still need to meet commitments on the percentage of annual use in the eligible counties.

In determining whether the intent of the program has been met, the TCEQ may consider the good-faith efforts of the grant recipient to meet the usage commitments originally projected. The TCEQ may consider circumstances that impeded the recipient's use of the grant-funded vehicle or equipment, such as natural disasters and other factors not under the recipient's control.

The TCEQ may include an annual commitment to reduce NO_x in the contract, where appropriate. At its discretion, the TCEQ may require the return of all or a pro rata share of grant funds if the annual emissions reductions are not being achieved. The decision to require the return of grant funds may be based on—but need not be limited to—an assessment that the annual performance is so low that it is unlikely that the grant recipient will be able to achieve the emissions reductions committed to over the activity life. The TCEQ may also use annual emissions-reduction commitments to ensure that a grant recipient does not overachieve emissions reductions during the first years of the activity life in order to underachieve the emissions reductions in later years.

The TCEQ may work with the grant recipient to implement other options for ensuring that the emissions-reduction commitments will be achieved before it requires a return of the grant funds. If the TCEQ requires the return of a pro rata share of the grant funds for underachievement of the annual emissions-reduction commitment, the TCEQ may revise the commitment over the remaining activity life to a lower amount, based on a new projection of the emissions reductions.

Except where no percentage-of-use commitment is required for that type of project, grant recipients must also agree to operate the grant-funded vehicle or equipment in the eligible counties for a minimum percentage of the annual or total usage (or both). Except when the TCEQ determines that the intent of the program has been met, the recipient will be required to return all or a pro rata share of the grant funds to the TCEQ if the percentage-of-use commitment is not met. The TCEQ may work with the grantee to implement other options for ensuring that a percentage-of-use commitment will be met before it requires the return of grant funds.

