### **APPENDIX E: Commercial Harbor Craft**

### A. Equipment Project Specifications

### **Commercial Harbor Craft**

### Eligible Equipment

Existing commercial diesel harbor craft vessels involved in freight movement operations with: a home port located in a trade corridor, 2 years of operation in California waters, and uncontrolled (Tier 0) diesel propulsion engine(s). Eligible vessel types include:

- Tugboats and towboats.
- · Work, pilot, crew and supply boats.
- Commercial fishing boats with at least 700 operational hours per year.

#### Option (1) Replacement/ repower of tugs/tows

For repowers on tugs and tows, the lower of 50% of total cost or \$135/horsepower of the old engine to replace a Tier 0 propulsion engine with a new model engine meeting latest emission standards (Tier 2 or lower emissions) and make necessary vessel modifications to accommodate the new engine. For replacements of tugs and tows, the lower of 50% of total cost or \$135/horsepower of the engine in the old vessel to replace a vessel with a Tier 0 propulsion engine with a new vessel powered by an engine meeting latest emission standards (Tier 2 or lower emissions).

#### Requirements

 Program-funded engine repowers and replacements for tugboats and towboats shall be in operation at least 2 years prior to a regulatory requirement for that technology or level of emissions control.

#### Equipment owner shall:

- Commit to 15 years of California home port operation in the trade corridors.
- Scrap old engine or vessel (as applicable).
- Agree to accept an electronic monitoring unit at any time during the contract term.
- Agree to equipment inspections.
- Comply with record-keeping, reporting, and audit requirements.
- Sign a legally binding contract with the local agency including project milestone and completion deadlines.
- Demonstrate proof of comprehensive insurance on upgraded equipment.
- Properly maintain upgraded equipment in good operating condition and according to manufacturer's recommendations.
- Certify that there are no outstanding ARB equipment violations associated with the equipment project application.

**Harbor Craft (continued)** 

Harbor Craft (continued)	
Option (2) Replacement/ repower of other vessels	Other vessel types may include: work, pilot, crew, or supply boats involved in freight movement operations; and high use commercial fishing vessels. For repowers of other vessels, the lower of 80% or \$215/horsepower of the old engine to replace a Tier 0 propulsion engine with a new model meeting latest emission standards (Tier 2 or better) and make necessary vessel modifications to accommodate the new engine. For replacements of other vessels, the lower of 80% or \$215/horsepower of the engine in the old vessel to replace a vessel with a Tier 0 propulsion engine with a new vessel powered by an engine meeting latest emission standards (Tier 2 or lower emissions)
Requirements	<ul> <li>Equipment owner shall:</li> <li>Commit to 10 years of 100% California home port operation in trade corridors.</li> <li>Scrap old engine or vessel (as applicable).</li> <li>Agree to accept an electronic monitoring unit at any time during the contract term.</li> <li>Agree to equipment inspections.</li> <li>Comply with record-keeping, reporting, and audit requirements.</li> <li>Sign a legally binding contract with the local agency including project milestone and completion deadlines.</li> <li>Demonstrate proof of comprehensive insurance on upgraded equipment.</li> <li>Properly maintain upgraded equipment in good operating condition and according to manufacturer's recommendations.</li> <li>Certify that there are no outstanding ARB equipment violations associated with the equipment project application.</li> </ul>
Project Cost Assumptions	Total cost of a Tier 2 engine is estimated at \$270/horsepower.
Excluded Funding Components	Out of service time (dry dock) costs.

# **B.** Major Milestones for Project Completion

- Equipment order.
- Dry dock scheduled.
- Equipment acquisition.
- Dry dock start/complete.
- Equipment installation complete.
- Submittal of invoice to local agency for reimbursement.
- 1<sup>st</sup> reporting milestone 6 months after equipment project completion.

## C. Recordkeeping Requirements

Equipment owners shall retain, at minimum, all documents, invoices, and correspondence associated with the application, award, contract, monitoring, enforcement, and reporting requirements at least two years after equipment project contact term or three years after final payment, whichever is later. Records shall be readily available and accessible to the local agency, ARB, or designee upon request for the purposes of ongoing evaluations or auditing.

## D. Reporting Requirements

Equipment owners shall be responsible for annual reporting to the local agency that includes, but is not limited to:

- Contact information (owner name, company, address, phone).
- Home port.
- Vessel type.
- Vessel identifier, such as US Coast Guard, CA Fish & Game, Call Sign, Maritime Mobile Service Identity, or other relevant vessel identifier.
- Date and location of installation/acquisition of equipment.
- Engine make, model, year, serial number and engine horsepower.
- Annual engine hours of operation.
- Percent of operation and distance from shore (0-3, >3-24, >24 nautical miles).
- Summary of maintenance and inspections conducted.
- Signed Certification statement that the bond-funded equipment was installed on or replaced the vessel for which it was approved and that all information submitted to the local agency is true and accurate.
- Other information as requested by the local agency.

### E. Ongoing Evaluations and Audits

Equipment owners shall agree to ongoing equipment project evaluations and equipment project audits by the local agency, ARB, or authorized designees. ARB and local agency audit requirements and provisions are found in Chapter II.E.5.

# F. Application Information

Equipment owners shall provide the following information and documentation in addition to the requirements described in Chapter IV and other information ARB or local agencies may request on the equipment project applications.

### 1. General contact information

This section applies to all equipment project options listed below.

- Organization/agency/company name
- Mailing address
- Primary contact name and phone number
- Person with equipment contract signing authority (Owner)
- Driver's license number of equipment owner
- Small business information
  - Number of harbor craft
  - Number of employees
  - Annual gross income

#### 2. Options (1) and (2): repowers

### a) Current equipment and activity information

- Harbor craft data
  - o Harbor craft name, home port
  - Harbor craft type (tug, tow, commercial fishing, etc.)
  - Vessel model year
  - Engine data
    - Number of propulsion engines
    - Make, model, engine year, number of cylinders, and serial numbers for each
    - Engine family
    - Rated brake horsepower/total engine displacement
    - Fuel type
- Harbor craft documentation
  - o USCG documentation number, if applicable
  - o CA Fish & Game license number, if applicable
  - o IMO number, if applicable
- Vocation and activity data for the past 2 years
  - Vocation(s)
  - o Percent operation within 24 nautical miles of the California coast
  - Estimated average number of propulsion engine operating hours within 24 nautical miles of the California coast
  - Annual hours of operation
- Vocation and activity documentation for the past 2 years
  - Documentation of percent operation within 24 nautical miles of the California coast may be required

### b) Proposed equipment project information

- New harbor craft engine repower information
  - Number of propulsion engines
  - o Make, model year, number of cylinders by engine
  - Engine horsepower and fuel type by engine
- Documentation of all engine modifications planned as part of the repower project, including description of upgrades to such things as exhaust systems, electronics, etc.
- Itemized cost information for eligible expenses (verifiable quote)
- Predicted vocation and activity data with new equipment
  - Vocation
  - Estimated percent operation within 24 nautical miles of the California coast
  - Estimated average number of propulsion engine operating hours within 24 nautical miles of the California coast
  - Annual hours of operation
- Equipment project funding demonstration
  - Total project cost
  - o Program dollars requested, including option for pro-rated alternative
  - Source and amounts of other funding (private, local, other State, federal)
  - Request for a direct payment to vendor (if applicable)

o Documentation of match funding availability

### 3. Options (1) and (2): replacements

- a) Current equipment and activity information
- Harbor craft data
  - o Harbor craft name, home port
  - Harbor craft type (tug, tow, commercial fishing, etc.)
  - Vessel model year
  - Engine data
    - Number of propulsion engines
    - Make, model, engine year, number of cylinders, and serial numbers for each
    - Engine family
    - Rated brake horsepower/total engine displacement
    - Fuel type
- Harbor craft documentation
  - o USCG documentation number, if applicable
  - o CA Fish & Game license number, if applicable
  - o IMO number, if applicable
- Vocation and activity data for the past 2 years
  - Vocation(s)
  - Percent operation within 24 nautical miles of the California coast
  - Estimated average number of propulsion engine operating hours within 24 nautical miles of the California coast
  - Annual hours of operation
- Vocation and activity documentation for the past 2 years
  - Documentation of percent operation within 24 nautical miles of the California coast may be required

### b) Proposed equipment project information

- New harbor craft information
  - Vessel type
  - o Propulsion engine data
    - Number of engines
    - Make, model year, number of cylinders by engine
    - Engine horsepower and fuel type by engine
- Documentation of all engine modifications planned as part of the repower project, including description of upgrades to such things as exhaust systems, electronics, etc.
- Itemized cost information for eligible expenses (verifiable quote)
- Predicted vocation and activity data with new equipment
  - Vocation
  - Estimated percent operation within 24 nautical miles of the California coast
  - Estimated average number of propulsion engine operating hours within 24 nautical miles of the California coast
  - Annual hours of operation
- Equipment project funding demonstration
  - Total project cost
  - o Program dollars requested, including option for pro-rated alternative
  - Source and amounts of other funding (private, local, other State, federal)
  - Request for a direct payment to vendor (if applicable)

Documentation of match funding availability