

Executive Order B-32-15 - Pilot Project Ideas

SUBMISSION: Zero-Emissions and Near-Zero Emissions Port and Marine Terminal Vehicles, Equipment and Infrastructure Pilot Program

1. Contact Information:

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2. Project Title:

Zero-Emissions and Near-Zero Emissions Port and Marine Terminal Vehicles, Equipment and Infrastructure Pilot Program

3. Location:

All 11 publicly-owned Seaports and their Marine Terminals

4. Project Summary:

The Zero-Emissions and Near-Zero Emissions Port and Marine Terminal Vehicles, Equipment and Infrastructure Pilot Program would provide state incentive funding and matching grants for ports and their marine terminal operator tenants to make investments which will result in the development, demonstration, and deployment of zero and near-zero emission vehicles, equipment and infrastructure technologies at public port marine terminal facilities. Projects eligible for funding under the Program will include, but not be limited to installations of electrified cranes, automated guided vehicles, straddle carriers, stationary fuel cells, energy storage and battery facilities, non-CHE vehicles and ancillary equipment on-terminal, and improvements to the on-terminal and off-terminal electrical infrastructure necessary to facilitate the implementation of additional Zero-Emissions and Near-Zero Emissions cargo-handling operations at public seaports.

5. Description of Pilot Project Incorporation of Sustainable Freight goals:

The Zero-Emissions and Near-Zero Emissions Port and Marine Terminal Vehicles, Equipment and Infrastructure Pilot Program will immediately further the goals outlined in Executive Order B-32-15 as it will both reduce environmental impacts and address the ports' competitiveness challenges. By providing direct funding and financing for the

electrification of infrastructure and equipment which is exceptionally costly and currently prohibitive for most ports and marine terminals, the Pilot Program will reduce the Ports' GHG footprint and immediately lower ports' operating cost profile, resulting in improved competitiveness and ultimately protecting and growing jobs. In addition, the ports would serve as a proving ground for zero and near-zero technologies that could then advance commercialization to other transportation sectors.

The Zero-Emissions and Near-Zero Emissions Port and Marine Terminal Vehicles, Equipment and Infrastructure Pilot Program will Incorporate Advanced Technologies through new investment, create Local Economic Development opportunities with massive new construction and local infrastructure investment, Transition to Zero-Emission Technology, and Increase Competitiveness of California's Freight System by reducing ongoing operating costs and marine terminal overhead which the system cannot now broadly fund or finance on its own.

6. Project Costs:

PMSA has asked a prominent group of expert engineers to develop a technical memorandum which will document the additional costs associated with the transition of marine terminals and port operations to a zero and near-zero emissions equipment environment. That report will be made available to the state, ports and other interested parties shortly. However, it is safe to assume that the costs will be significantly higher than current technologies, and that consistent, long term funding will be required to succeed.

7. Timeline:

Planning for implementation and investment must occur immediately upon Program effective date in order to provide benefits as soon as possible.

8. Means for Measuring Progress:

Long-term decrease of GHG emissions from Ports and marine terminal operations along with co-benefit reductions of localized criteria pollutants. Each project will incorporate specific measures designed and customized to measure progress.

9. Description of Roles of Partners:

Ports and Marine Terminal Operators will play a critical role in planning for the implementation and investment which will facilitate the applications for incentives and grants once CARB/CEC identify and develop criteria for the Program.