



CALIFORNIA
AIR RESOURCES BOARD

**VOLVO PENTA OF THE AMERICAS,
LLC.**

EXECUTIVE ORDER U-W-012-0103
New Spark-Ignition Marine Engines

Pursuant to the authority vested in California Air Resources Board by Health and Safety Code Sections 43013, 43018, 43101, 43102 and 43104; and

Pursuant to the authority vested in the undersigned by Health and Safety Code Sections 39515 and 39516 and Executive Order G-19-095;

IT IS ORDERED AND RESOLVED: That the following new spark-ignition marine engine and emission control systems (ECS) produced by the manufacturer are certified as described below. Production engines shall be in all material respects the same as those for which certification is granted.

| MODEL YEAR | ENGINE FAMILY | FUEL TYPE | DISPLACEMENT (cc) | LEVEL OF CLEANLINESS |
|--|----------------|---|-------------------|---|
| 2020 | LVPAM05.3GDC | Gasoline | 5300 | Super Ultra Low Emission ("Four Stars") |
| EQUIPMENT APPLICATION | | ECS & SPECIAL FEATURES | | ENGINE TYPE |
| Sterndrive | | Dual Three Way Catalytic Converter Heated Oxygen Sensor Direct Fuel Injection On-Board Diagnostics-Marine System | | 4-Stroke |
| ENGINE MODELS (rated power in kilowatts, kW) | See Attachment | | | |

The following are the hydrocarbon plus oxides of nitrogen (HC+NOx) and carbon monoxide (CO) exhaust emission standards (Title 13, California Code of Regulations, (13 CCR) Section 2442(b)) and certification emission levels in grams per kilowatt-hour (g/kW-hr) for this engine family. Engines in this engine family shall discharge no crankcase emissions into the ambient atmosphere in conformance with 13 CCR Section 2442(b).

| | HC+NOx (g/kW-hr) | CO (g/kW-hr) |
|---------------------|------------------|--------------|
| STANDARD | 5.0 | 75.0 |
| CERTIFICATION LEVEL | 2.6 | 59.7 |

This engine family shall not be used to determine compliance through corporate averaging.

BE IT FURTHER RESOLVED: That for the listed engines, the manufacturer has submitted, and the Executive Officer hereby approves, the information and materials to demonstrate certification compliance with 13 CCR Sections 2443.1, 2443.2 and 2443.3 (emission control, consumer, and environmental labels), Section 2444.2 (on-board engine malfunction detection system), and Sections 2445.1 and 2445.2 (emission control system warranty).

Engines certified under this Executive Order must conform to all applicable California emission regulations.

This Executive Order is only granted to the engine family and model-year listed above. Engines in this family that are produced for any other model-year are not covered by this Executive Order.

Executed at El Monte, California on this 24th day of December 2019.

Kim Pryor

for Allen Lyons, Chief
Emissions Certification and Compliance Division

