

Don Gilbert

19-2-6



San Francisco International Airport

February 21, 2019

California Air Resources Board  
1001 I Street  
Sacramento, CA 95814

**RE: San Francisco International Airport Comments on Proposed Zero-Emission Airport Shuttle Bus Regulation**

San Francisco International Airport ("SFO") submits this comment letter to the Board Members of the California Air Resources Board ("CARB") to express concerns with the proposed Zero-Emission Airport Shuttle Bus Regulation ("proposed rule"). SFO has established several goals in our five-year Strategic Plan to "Achieve Zero" in carbon emissions, waste, and net energy use in buildings. The City of San Francisco has developed policy committing to zero-emission vehicle ("ZEV") acquisition where practical, reliable and affordable, and SFO is currently developing a ZEV Readiness Plan to move us toward high degrees of electric vehicle penetration.

SFO has already undertaken a wide variety of emission reduction projects in recent years including vehicle and gate electrification, energy efficiency retrofits and requirements in new construction, and incentives for employee commute alternatives. SFO's rental car industry retired numerous diesel buses when the zero-emission AirTrain rail system opened in 2003. SFO is currently extending AirTrain through a significant investment to serve long-term parking garages. Once the extension is open, GHG emissions (CO<sub>2</sub> equivalent) will have been reduced by about 3,000 metric tons annually. The actual CO<sub>2</sub> reductions will be greater; however, SFO already uses fully bio-based fuels in its existing buses which reduce lifecycle CO<sub>2</sub>.

SFO's goals and plans align with CARB's intended goal of the proposed rule to reduce emissions by pursuing zero-emission technologies. However, because significant issues remain with CARB's current proposal, SFO respectfully requests the CARB Board consider modifying its draft shuttle bus rule to allow airports to be successful and timely in its implementation, via the following:

**1) Increase the low-mileage vehicle threshold to 5,000 miles per year.**

Through the California Airports Council, SFO provided mileage data and analysis that were shared with CARB staff, indicating a 5,000 mile threshold is approximately 10% of the miles traveled by a typical SFO Shuttle bus (over 49,000 miles per year per bus, versus 30,000 earlier calculated by CARB staff). Our reserve fleet buses must be operated for one shift at least every 10 days to keep them in proper working order.

**2) Exempt mileage incurred in emergency response actions from the cap.**

SFO must facilitate passenger movement through the airport campus efficiently and uninterrupted. In the event of a transportation service disruption or irregular operating

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condition, SFO would need to rely on its reserve shuttle bus fleet. Such interruptions may include, for example, a temporary shutdown of AirTrain service, disruption of the electrical grid, or severely limited operations due to security issues or natural disasters.

The proposed rule should include the following language in Section 95690.6 for irregular operations:

Irregular Operation Exemptions. The requirements of section 95690.5 do not apply during exceptional events that require action and/or capabilities beyond those considered unusual by aviation service providers. Irregular Operations include:

- (1) Incidents that pose immediate threat to safety
- (2) Security breaches or risks
- (3) Unplanned airport closure or terminal evacuations
- (4) Extreme weather incidents
- (5) Natural disasters
- (6) Grid outages or restrictions
- (7) Manufacturing defects of zero-emission buses
- (8) Unplanned disruption of on-airport rail service

**3) Do not count temporary vehicles necessary for sudden traffic surges, if such vehicles are contracted or leased.**

Occasional events or demand surges may overload the capacity of full-time transportation fleets. During these periods of short-term high-demand operations, airports and permitted operators may lease non-electric buses to manage passenger movement, given that charging infrastructure may be insufficient and/or suitable electric buses may not be available for short-term lease. This need may occur on the airport landside or airfield (e.g., for passenger transport to remote aircraft boarding locations). The proposed rule language would require the contracted operators to meet requirements of the regulation, which is burdensome considering their partnership with the airport is short-term.

SFO requests the following language added to proposed Section 95690.6 for temporary operations:

Temporary Operation Exemptions. The requirements of Section 95690.5 do not apply during the following temporary operations:

- (1) Leased shuttle buses operating on-airport as an interim asset to be in use for less than 18 calendar months after 2027. The airport fleet owner shall notify the CARB Executive Officer 30 days prior to acquisition with documentation of reasoning. The airport fleet owner shall submit the lease termination agreement to the Executive Officer to verify end of contract.
- (2) Special events. A special event is a large-scale occasion that requires the airport, or permitted tenants, to temporarily expand fleet volume to accommodate significant increases in shuttle bus activity such as conventions, sporting events and other one-time special events.
- (3) Contracted fleets and buses used to facilitate temporary operations during these events will not be subject to requirements of 95690.5.

**4) Require shuttle buses to meet specific standards for reliability and protect the longevity of airport and airport permitted transportation operator investments.**

Many of the electric bus models available to airports and operators are new in the market and expose airports to several ownership risks. There is inadequate electric vehicle product in the van and minibus categories. Major manufacturers need to enter the market to assure reliability, longevity, and warranty service. There is precedent for CARB to require electric passenger vehicles to meet minimum battery life criteria, and exemptions where technology is not available.

Accordingly, SFO requests that the following language be added to proposed Section 95690.6:

- (A) A fleet operator may request an exemption from an immediate zero emission bus purchase requirement as set forth in section 95690.5 if zero-emission buses are unavailable as described below.
- (B) A zero-emission bus type is considered unavailable for purchase if any of the following circumstances exists:
  - (1) The zero-emission bus cannot be configured to meet applicable requirements of the Americans with Disabilities Act; or
  - (2) The physical characteristics of the zero-emission bus would result in a fleet operator violating any federal, state, or local laws, regulations, or ordinances; or
  - (3) The manufacturer cannot guarantee vehicle batteries for 10 years/150,000 miles (required in 13 CCR Section 1962); or
  - (4) The model has been offered in the retail market for less than two years; or
  - (5) The manufacturer has offered vehicles for sale in the United States for less than five years.

In conclusion, we appreciate the opportunity to provide written comment on the proposed regulation. SFO believes the requested changes provided can lead to a workable solution supporting a path to electrification and air quality improvement. Please contact Roger Hooson (Roger.Hooson@flysfo.com) and John Galloway (John.Galloway@flysfo.com) with any feedback on these comments. SFO looks forward to achieving our shared goal of zero-emission vehicles in Airport fleets.

Sincerely,



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Chief Administrative and Policy Officer

Cc: Anthony Poggi  
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Jack Kitowski

