LAX Alternative Fuel Vehicle Requirement Summary

- Commitment in the 2005 LAX Master Plan Program’s Community Benefits Agreement (CBA)
- Requirement went into effect in 2007
- Targets reduction in criteria air pollutants, such as nitrogen oxides (NOx) and particulate matter (PM)
- Applies to on-road medium & heavy-duty vehicles used in operations at LAX, such as shared ride vans and rental car shuttles
- Vehicles must be alternative fuel, comparable emissions to alternative fuel, or least-polluting vehicle available
- Requirement included in all LAX contracts, permits, leases & licenses
- Total vehicle population ~ 1,900 vehicles
Alternative Fuel Vehicle Policy Achievements

• 100% of LAX’s courtesy shuttle fleet and ADA shuttles are alternative fuel
• Hotel shuttles are 100% compliant
• Rental car shuttles are 95% compliant
• LAX has the largest alternatively fueled airport fleet in the nation
• In 2015, LAWA implemented on-line reporting and monitoring system to improve tracking and compliance
• LAWA can now easily identify operators who failed to report or are not in compliance
• In 2016, LAWA issued over 500 non-compliance notices to operators
• Extensive outreach to these operators achieved 97% compliance with the reporting requirement
# Overall Program Compliance

## Program Compliance 2015

LAX Alternative Fuel Vehicle Summary Report
Reporting Period: 2015

- **Reporting Compliance:** 97%
- **Vehicle Compliance:** 42%

### Operators

<p>| | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Operators in Database</td>
<td>400</td>
</tr>
<tr>
<td>Operators Reporting</td>
<td>387</td>
</tr>
<tr>
<td>Operators not Reporting</td>
<td>13</td>
</tr>
</tbody>
</table>

### Vehicles

<p>| | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Total Vehicle Count</td>
<td>1872</td>
</tr>
<tr>
<td>Total Vehicles Compliant</td>
<td>783</td>
</tr>
<tr>
<td>Total Vehicles Non-Compliant</td>
<td>1089</td>
</tr>
</tbody>
</table>
Catering Companies Compliance

### Catering Company Compliance 2015

LAX Alternative Fuel Vehicle Summary Report - Catering Companies

**Reporting Period:** 2015

<table>
<thead>
<tr>
<th>Catering Operator Name</th>
<th>Total # of Vehicles</th>
<th># of Compliant or Approved Vehicles</th>
<th>% Compliant</th>
</tr>
</thead>
<tbody>
<tr>
<td>AC Custom Catering</td>
<td>5</td>
<td>2</td>
<td>40%</td>
</tr>
<tr>
<td>Air Fayre</td>
<td>49</td>
<td>11</td>
<td>22%</td>
</tr>
<tr>
<td>Avalon Foods</td>
<td>1</td>
<td>1</td>
<td>100%</td>
</tr>
<tr>
<td>Flying Food Group</td>
<td>18</td>
<td>4</td>
<td>29%</td>
</tr>
<tr>
<td>Flying Food Group Pacific</td>
<td>6</td>
<td>1</td>
<td>17%</td>
</tr>
<tr>
<td>Hacor</td>
<td>28</td>
<td>0</td>
<td>0%</td>
</tr>
<tr>
<td>HMS Host International</td>
<td>4</td>
<td>1</td>
<td>25%</td>
</tr>
<tr>
<td>Ideal Custom Catering</td>
<td>5</td>
<td>1</td>
<td>20%</td>
</tr>
<tr>
<td>LSG Sky Chefs</td>
<td>16</td>
<td>2</td>
<td>13%</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td><strong>132</strong></td>
<td><strong>23</strong></td>
<td><strong>17%</strong></td>
</tr>
</tbody>
</table>
Compliance Issues with 2007 Requirement

Policy has not been updated since 2007

Language is vague and key terms are undefined

• No exemption for low-use vehicles

Language not current

• Does not reflect clean vehicle technology available today – some low emission vehicles precluded by the policy
• Hybrid technology is now more common than alternative fuel
• Lack of affordable alternative fuel vehicle options today – cost of eligible vehicles has increased substantially

Existing language allows older higher polluting vehicles

Difficult for operators to determine compliant comparable emission and least polluting available vehicles and for LAWA to administer

• Air quality expert needed to determine compliant comparable emission/least polluting available vehicles
• Multiple LAWA Departments involved with operators

No provision for enforcement
Compliance Hurdles for Catering Companies

• Alternative fuel catering vehicles have not performed well
  • Medium-duty CNG catering trucks are under-powered
    – Not enough power in high-lift functions
    – Significant maintenance issues
  • Heavy-duty CNG catering trucks needed to service A380s are not available
  • Electric catering trucks do not have power needed to perform lift functions
  • Hybrid-electric catering trucks in early stages of commercialization

• Medium and heavy-duty catering vehicles are specialty vehicles that are customized at an additional cost of over $60,000
  • Cost to retrofit already customized catering vehicles to alternative fuel is at least 40% above the average cost of a conventional catering vehicle, making it hard for small companies to comply
  • Catering companies need to work with multiple third-party retrofitters to obtain an alternative fuel catering truck
Next Steps

• LAWA Staff currently developing an updated policy to address compliance and enforcement issues associated with the current policy

• Engaged a consultant to look at programs at other airports and air quality impacts or benefits that would result from changes to the current policy

• Will start 2016 year-end operator reporting in April based on compliance with the current requirements and report back to BOAC by summer

• Will return to BOAC with updated alternative fuel policy for consideration in June

• Staff will work with External Affairs to develop an outreach program with major stakeholders such as shuttle operators, fuel providers and other affected parties in order to solicit input on the updated policy