

## **Air Pollution from Transportation: Current Status in Israel**

### Annex to Public Tender No. 9/10 for the provision of professional consulting services on implementing the Ministry of Environmental Protection's powers regarding transportation issues

Transportation is the main source of exceedances of air quality standards in city centers in Israel. In light of this, several measures have been undertaken in recent years to reduce transportation-related pollution. The aim of this annex is to present potential bidders with a concise description of the measures taken to date in this field as a basis for their tender proposal:

**Ambient Standards:** Israel has published ambient standards for some 20 different pollutants. Current regulations may be accessed at:  
[http://www.sviva.gov.il/Environment/Static/Binaries/Articals/Abatement\\_of\\_nuisances\\_regulations\\_air\\_quality\\_1992\\_1.pdf](http://www.sviva.gov.il/Environment/Static/Binaries/Articals/Abatement_of_nuisances_regulations_air_quality_1992_1.pdf)

In recent months, new regulations, not yet in force, have been formulated with amended maximum values in accordance with the requirements of the Clean Air Law. These regulations will set target values based on updated health data, ambient values based on target values and on the practical ability to implement them (similarly to values set in Europe) and alert thresholds which require public alert. The list of pollutants appears on page 51 of the Clean Air Law and may be accessed at:  
[http://www.sviva.gov.il/Environment/Static/Binaries/Articals/Clean\\_Air\\_Law\\_1.pdf](http://www.sviva.gov.il/Environment/Static/Binaries/Articals/Clean_Air_Law_1.pdf)

Air quality monitoring stations measure air quality and data are available for public access at:  
[http://www.sviva.gov.il/bin/en.jsp?enPage=e\\_BlankPage&enDisplay=view&enDispWhat=Zone&enDispWho=Air\\_Quality\\_Monitoring&enZone=Air\\_Quality\\_Monitoring](http://www.sviva.gov.il/bin/en.jsp?enPage=e_BlankPage&enDisplay=view&enDispWhat=Zone&enDispWho=Air_Quality_Monitoring&enZone=Air_Quality_Monitoring)

**Structure of the Vehicle Fleet:** Most of Israel's private vehicles are powered by gasoline (petrol) engines and are equipped with automatic gearboxes. Most commercial vehicles are powered by diesel engines. Details about the composition of the fleet are available at the website of the Central Bureau of Statistics at:  
[http://www.cbs.gov.il/reader/cw\\_usr\\_view\\_SHTML?ID=616](http://www.cbs.gov.il/reader/cw_usr_view_SHTML?ID=616)

**New Vehicle Standards:** Israel is not a manufacturer of vehicles and all vehicles are imported. Import requirements obligate compliance with European emission standards in accordance with the timetables set in the European standards (Euro standards). In parallel, vehicles that comply with American standards may be imported if the manufacturer is American in origin. In practice, some 3% of Israel's imported vehicles comply with American standards and the rest (about 97%) with European standards.

**Taxes on New Vehicles:** The purchase tax on new vehicles is 83% of the price of the vehicle plus 16% VAT. In the past year, a green tax program began operating which reduces taxes in accordance with the level of pollution (CO<sub>2</sub>, HC, NO, PM, CO) emitted from the vehicle. For further details:  
[http://www.sviva.gov.il/bin/en.jsp?enPage=e\\_BlankPage&enDisplay=view&enDispWhat=Object&enDispWho=News^14767&enZone=e\\_news](http://www.sviva.gov.il/bin/en.jsp?enPage=e_BlankPage&enDisplay=view&enDispWhat=Object&enDispWho=News^14767&enZone=e_news)

**In addition, vehicle importers are required to publish data on fuel consumption and pollutant emissions of new vehicles in every advertisement. For further details:**

[http://www.sviva.gov.il/Environment/bin/en.jsp?enPage=e\\_BlankPage&enDisplay=view&enDispWhat=Object&enDispWho=News^14704&enZone=e\\_news](http://www.sviva.gov.il/Environment/bin/en.jsp?enPage=e_BlankPage&enDisplay=view&enDispWhat=Object&enDispWho=News^14704&enZone=e_news)

**Existing Vehicle Standards:** All vehicles must undergo annual air pollution tests. Old vehicles which are 19 years old or more must be checked twice a year in registration tests. A vehicle which is not tested or which exceeds the standard is prohibited from driving. Vehicle testing is conducted in authorized testing institutes only, with the method of testing for **petrol** vehicles identical to the European method (EC/2003/27). Testing values are currently according to the year of manufacture of the vehicle, but in accordance with a change which is now in process, each vehicle will be tested according to the emission declaration of the manufacturer. The testing of a diesel vehicle is conducted on a loaded chassis dynamometer but is now being changed to a free acceleration test as is the case in Europe. Such change is necessary because the chassis dynamometer does not allow testing of vehicles equipped with an ESP system which is obligatory in every new vehicle.

In addition to the annual test, six mobile units for the enforcement of emission standards operate on Israel's roadsides. The mobile vehicles largely enforce emission standards from diesel vehicles in free acceleration and, in addition, by using the micro-Ringelmann chart

**Fuel:** Fuel for transportation complies with European standard requirements (EN 228, EN 590). Fuel detergent additives are obligatory in Israel, although they are only recommended in the European standard. Taxation on fuel is NIS 2.4 (about 0.48 euro) per liter diesel and NIS 2.7 (some 0.54 euro) per liter petrol.

**Transportation Planning:** The Clean Air Law and the Traffic Ordinance authorize local authorities to establish a plan restricting the movement of polluting vehicles. The Municipality of Tel Aviv is planning to restrict the movement of diesel vehicles, which are five years old or more, from entry to the city center unless equipped with an emission reduction system.

**Vehicle Scrapping:** As of January 2010, Israel implements an incentive plan for old vehicle scrapping. As part of the plan, owners of old vehicles are invited to deliver their vehicle for scrapping and to receive remuneration in the sum of NIS 3,000 shekels (about 600 euros). For further details:

[http://www.sviva.gov.il/bin/en.jsp?enPage=e\\_BlankPage&enDisplay=view&enDispWhat=Zone&enDispWho=vehicle\\_retirement&enZone=vehicle\\_retirement](http://www.sviva.gov.il/bin/en.jsp?enPage=e_BlankPage&enDisplay=view&enDispWhat=Zone&enDispWho=vehicle_retirement&enZone=vehicle_retirement)