

Information leaflet on the End-of-Life Vehicles Directive (EoL V): Implications for car lamps

1. Introduction, relevance of the EoL V for car lamps and lighting equipment

The European Communities published on 21.10.2000 the Directive on End-of-Life Vehicles (EoL V), coded 2000/53/EC of 18 September 2000. This was complemented in 2002 by an amendment to Annex II, coded 2002/525/EC of 27 June 2002.

In addition, a Commission Decision establishing component and material coding standards of 27.2. 2003 coded 2003/138/EC was published on 28.2.2003.

The ELV Directive has as objective to set up a harmonised collection, treatment and recovery system for EoL cars in the EU member states. Under its provisions not only vehicles but also their components (e.g. lamps) and materials are included. An important consequence for lamps and lighting equipment is that the use of some hazardous heavy metals is prohibited. However, exemptions for certain applications are allowed under specified conditions. Some of the exempted materials and components containing these substances must be made identifiable in order to facilitate their proper processing at EoL. Furthermore, the Commission decided that plastic part having a weight of more than 100 grams as well as elastomer parts of more the 200 grams have to be coded by using ISO coding standards. The purpose of this ELC leaflet is to advise car lamp manufacturers and their partners on relevant aspects of this Directive.

2. Relevant articles

Lamps are affected since they are under the scope of Art. 3.1 by being components of vehicles. More specific, some lamps containing hazardous substances, e.g. lead and mercury, are subject to preventive restrictions.

In Art. 4.1.a and 4.2.a the obligations to restrict the use of hazardous substances, specifically to ban lead, mercury, cadmium and hexavalent chromium in cars or components of cars put on the market after 1 July 2003 are specified.

- However, in Annex II, amended in 2002/525/EC, entry 19, use of mercury for lamps is exempted from this prohibition provided that they are labelled or made identifiable (Art. 4.2.b.iv) to strip them from the EoL cars before further treatment.
- Lead as a component in solder is exempted too, entry 7. However, there is a dismantling obligation combined with a labelling requirement if the total weight of the lead in the car, used for components and solder combined, exceeds 60 g.

- Lead can be used as a component of glass in bulbs, entry 15, only until January 1st, 2005.
- Other hazardous substances as mentioned above are not present in lamps.

Hazardous materials and components shall be removed selectively (Art. 6.3) before shredding. Reuse and recycling of components is encouraged (Art. 7.1). Component producers must make available to authorised recovery facilities on their request all appropriate requisite information concerning dismantling, storage and testing of components which can be reused (Art. 8.4). Art. 9.2 specifies the obligation to publish information on environmentally sound treatment of EoL vehicles and to optimise recycling also of components.

3. Recommendations for mercury containing head light systems

The head light systems based on the use of mercury containing gas discharge lamps are subject to EoL V restrictions.

The ELC recommends the following:

- Mercury containing lamps must be labelled or made identifiable by other appropriate means. The crossed-out wheeled bin is the preferred label in this case, complemented by displaying next to this the chemical symbol indicating mercury: Hg. The "bin/Hg" label should have a minimum size of 0.5 x 0.5 cm to be readable.
- NOTE: If this label cannot be printed on the product, it probably is acceptable to display it on the packaging. The label then should have a minimum size of 1 x 1 cm.
- Lamp manufacturers advise their client car producers to address environmentally sound lamp disposal procedures in their car instruction booklet or otherwise and request them similarly to instruct car recycle centres.
- Lamp manufacturers inform car recycle facilities provided they request so on recycling and other disposal options for EoL lamps. They also advise the interested economic operators on where provisions are available to dispose of selectively removed lamps in an environmentally sound way either by recycling or otherwise e.g. by delivery to a (hazardous) waste disposal site as long as permitted.

4. Recommendation to eliminate lead in solder and glass in car lamps

It is the ELC recommendation to eliminate lead both as a component in glass and solder before the deadlines mentioned in EoLV and RoHS. This removes the obligation to label products containing these substances and all other legal provisions associated with lead applications.