

# Minimum requirements for the content of the user manual for automotive LPG systems

The European Standard EN 13856:2002 has the status of a  
British Standard

ICS 43.060.40; 75.160.30

## National foreword

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This British Standard, having been prepared under the direction of the Engineering Sector Policy and Strategy Committee, was published under the authority of the Standards Policy and Strategy Committee on 27 June 2002

### Summary of pages

This document comprises a front cover, an inside front cover, the EN title page, pages 2 to 6, an inside back cover and a back cover.

The BSI copyright date displayed in this document indicates when the document was last issued.

### Amendments issued since publication

Amd. No.	Date	Comments

© BSI 27 June 2002

ISBN 0 580 39982 6

EUROPEAN STANDARD

EN 13856

NORME EUROPÉENNE

EUROPÄISCHE NORM

May 2002

ICS 43.060.40; 75.160.30

English version

## Minimum requirements for the content of the user manual for automotive LPG systems

Exigences minimales pour le contenu du manuel utilisateur  
pour les systèmes GPL automobiles

Mindestanforderungen für den Inhalt von  
Gebrauchsanleitungen für Flüssiggassysteme (LPG)

This European Standard was approved by CEN on 1 March 2002.

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## Foreword

This document EN 13856:2002 has been prepared by Technical Committee CEN/TC 286, "LPG equipment and accessories", the secretariat of which is held by NSAI.

This European Standard shall be given the status of a national standard, either by publication of an identical text or by endorsement, at the latest by November 2002, and conflicting national standards shall be withdrawn at the latest by November 2002.

According to the CEN/CENELEC Internal Regulations, the national standards organizations of the following countries are bound to implement this European Standard: Austria, Belgium, Czech Republic, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, Malta, Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and the United Kingdom.

## 1 Scope

This European Standard specifies the minimum requirements for the contents of the user manual for Automotive LPG propulsion systems fitted in road vehicles.

This standard does not cover the user manual for forklift trucks or other industrial machinery.

## 2 Terms and definitions

For the purposes of this European Standard, the following terms and definitions apply.

### 2.1

#### **user manual**

document providing information about starting up, running in, operation of, servicing of and minor maintenance of the LPG system

### 2.2

#### **LPG system**

system primarily composed of an LPG container in accordance with prEN 12805 and a number of other components in accordance with prEN 12806

## 3 Symbols and abbreviations

LPG is Liquefied Petroleum Gas

## 4 General

**4.1** The purpose of the user manual is to inform the end-user about the characteristics and safety aspects of the installed LPG system.

**4.2** The user manual shall be issued by the LPG system manufacturer and supplied to the user of the LPG system.

**4.3** The manufacturer of the LPG system shall include all the information that is required to ensure the correct functioning and safe operation of the LPG system.

4.4 The user manual shall be written in the language(s) of the country where the LPG system is sold.

## 5 Contents of the user manual

### 5.1 Technical specifications

The user manual shall contain at least the following:

- a) a description of the system and the main components;
- b) a description of the fuel for which the LPG system is designed;
- c) the necessary information about running in and tuning of the system.

### 5.2 Safety instructions

The user manual shall include sections on the following:

- a) instructions for correct use of the system;
- b) dangers of misuse;
- c) actions to be taken in the event of a gas leak;
- d) adverse effects of extreme ambient conditions such as humidity and temperature;
- e) national regulations for parking, maintenance and re-approval.

### 5.3 Operation of the LPG system

#### 5.3.1 Filling of the LPG container

The user manual shall include the procedure for filling the LPG container.

Particular attention shall be paid to the importance of the maximum filling level of 80 % of the total volume of the container installed in the vehicle.

#### 5.3.2 Switch-over procedure

When the vehicle is dual fuelled, the user manual shall describe the correct method of switching over from one fuel to the other.

#### 5.3.3 Opening / closing of manual valves when fitted

The user manual shall indicate the procedure to operate the manual valves.

NOTE This is particularly important for maintenance of the LPG system.

#### 5.3.4 Level indicator

The user manual shall give information on the location of the level indicator, for example on the dashboard or on the tank. The read-out shall be explained with particular attention to the 80 % filling level.

#### **5.4 Maintenance**

The user manual shall state the frequency and type of maintenance to be carried out, it shall also state that a competent person shall carry out the maintenance.

The user manual shall indicate proper procedures to be followed when a vehicle is repainted and put in a hot painting/drying booth.

#### **5.5 Defects and repair**

The user manual shall indicate which actions shall be taken in the case of a defect and/or when a repair of faulty components of the LPG system is required.

When the LPG system is equipped with a diagnostic system the user manual shall describe its use.

#### **5.6 Scrapping of the system**

The user manual shall give proper instructions for the removal of the system from the vehicle and for scrapping the system/vehicle.

## Bibliography

prEN 12805, *Automotive liquefied petroleum gas components – Containers.*

prEN 12806, *Automotive liquefied petroleum gas components - Other than containers.*





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