

Scientific Committee on Emerging and Newly Identified Health Risks (SCENIHR)

Request for a scientific opinion on

Potential health risks of exposure to noise from personal music players and mobile phones including a music playing function

1. Background

The health effects of exposure to noise have been known for a long time, in particular noise-induced hearing damage such as irreversible hearing loss and impairment. Hearing loss appears to accompany ageing, but noise induced hearing damage can be prevented to a large extent by reducing exposure time and levels. Measures to this effect have been introduced at the workplace.

Recently the attention of the Commission services has been drawn to the need to reassure itself that sufficient preventive measures are in place to prevent hearing damage among children and adolescents from the noise of personal music players and radio communication devices including such a facility^a.

The regulatory framework governing the safety of this equipment is as follows:

- The Radio and Telecommunications Terminal Equipment (R&TTE) Directive^b 1999/5/EC governs the health and safety aspects of radio equipment, including mobile phones;
- The Low Voltage Directive (LVD) 2006/95/EC governing the health and safety of electrical equipment within certain voltage ranges lists the standards referred to below for other types of equipment;
- The General Product Safety Directive^c (GPSD) 2001/95/EC seeks to ensure that all consumer products are safe where this aspect is not further detailed in any other “specific” EU legislation (including personal music players).

^a Digital technologies have stimulated the distribution and use of a new generation of personal music players. The digital music players available on the market have maximum output noise levels of 90 to 120 dB(A). Furthermore, using software available on the internet enables to exceed these levels and reach values of 130 dB(A).

^b Directive 1999/5/EC of the European Parliament and of the Council of 9 March 1999 on radio equipment and telecommunications terminal equipment and the mutual recognition of their conformity

^c Directive 2001/95/EC of the European Parliament and of the Council of 3 December 2001 on general product safety OJ L 11, 15.1.2002

The R&TTE and LV Directives make reference to European Harmonised Standard EN 60065:2002 “Audio, video and similar electronic apparatus - Safety requirements”. This standard provides the technical detail to ensure the safety of users of personal music players with headphones or earphones. It requires compliance with maximum pressure level and maximum voltage outputs measured following the methods described in standards EN 50332-1:2000 and EN 50332-2:2003. None of the standards currently require any specific labelling in respect of noise emissions.

In 2005 the French authorities updated a national Order of 1998 aimed at preventing users of personal audio equipment from suffering long term hearing impairment^a. In addition to the maximum pressure and voltage requirements prescribed in the two harmonised standards mentioned above the French national Order requires information and/or labelling for the end user. The revised Order entered into force on 1 May 2006 and its scope includes both personal audio equipment and mobile telephones.

The Commission considers it necessary to request the Scientific Committee on Emerging and Newly Identified Health Risks (SCENIHR) to assess whether the health of citizens is appropriately protected by the current requirements of the above-mentioned Community directives and European standards.

2. Terms of Reference

The SCENIHR is asked to assess, in the light of current scientific data and knowledge:

1. Whether the exposure to noise from devices like personal music players and mobile phones with this function, at levels corresponding to current permissible noise emissions may cause quantifiable health risks, in particular hearing loss and/or hearing impairment to the user, and to specify the relevant outcomes;
2. In case health risks are identified, the SCENIHR is asked:
 - a) to identify the level of noise emission safeguarding the health of citizens, taking into account the intensity, length and number of exposures to users of personal music players and mobile phones with the same function and
 - b) to identify priority issues for further research.

3. Deadline

March 2008

^a French Order of 8th November 2005 implementing Article L. 5232-1 of the Public Health Code