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

Request for a scientific opinion on:

Addictiveness and Attractiveness of Tobacco Additives

1. Background

Some 72% - 92% of adult cigarette smokers meet the criteria for dependence¹. While nicotine is recognised as an addictive substance in the tobacco leaf, the risk of addiction to pure nicotine products is very low compared to cigarettes.¹ Currently, it is discussed in the public health community whether lowering the levels of nicotine in tobacco products would make people less addicted and accordingly reduce the consumption of tobacco products.

Tobacco additives were hardly used before 1970, but today they represent up to 10% of the cigarette weight. By altering the taste and smell of cigarettes the products are made more attractive and the smoke more palatable which leads to an increase of smoking initiation. At present, the role of additives on enhancing the addictiveness is not clear.

In order to make tobacco products more attractive, design features are introduced, e.g. package design and cigarette form. In addition, these features are used to undermine the effect of the maximum limits set by the Tobacco Products Directive 2001/37/EC on tar, nicotine and CO yields in cigarettes.

Legal background:

Article 13 of the Tobacco Products Directive (2001/37/EC)² stipulates, that Member States can keep or introduce, in accordance with the Treaty, more stringent rules concerning the manufacture, import, sale, and consumption of tobacco products which they deem necessary in order to protect public health. Member States may prohibit the use of ingredients which have the effect of increasing the addictive properties of tobacco products.

Article 12 of the Tobacco Products Directive invites the Commission to submit a proposal providing a common list of ingredients authorised for tobacco products, taking into account, *inter alia*, their addictiveness.

In its comments to the Green Paper *Towards a Europe free from tobacco smoke: policy options at EU level*, the European Parliament invited the Commission to propose, by 2008 if possible, an amendment to the Directive including an evaluation and authorisation procedure for tobacco additives and an immediate ban on all additives that are addiction-enhancing. In its 2nd Report on the implementation of the Tobacco Products Directive the Commission stresses the need for further work on the addictiveness.

DG SANCO wishes to have a better understanding of the criteria based on which an additive can be considered (classified) as an addictive and/or attractive substance, the role of additives in tobacco products and the role of design features in the attractiveness and addictiveness of a tobacco product.

¹ J.E.Henningfield, M. Zeller "Could Science-Based Regulation Make Tobacco Products Less Attractive"; Yale Journal of Policy, Law and Ethics; 2002, Vol 3, Issue 1

² http://eur-lex.europa.eu/pri/en/oj/dat/2001/l_194/l_19420010718en00260034.pdf

2. Terms of reference

In the light of most recent scientific information, the Scientific Committee is requested to answer the following questions:

- 1. Which are the criteria which will define whether an additive or a combination of additives increases the addictive potency of the final tobacco product?
- 2. What are the methods currently used for assessing the addictive potency of a substance and are they considered adequate?
- 3. Is the development of nicotine addictiveness dose-dependent?
- 4. Which additives are addictive themselves in tobacco products?
- 5. Which additives enhance the addictiveness of nicotine and how?
- 6. Which are the methods to quantify the potency of additives to enhance the addictiveness of nicotine and are they considered adequate?
- 7. Which technical characteristics enhance the addictive potential of tobacco products?
- 8. Which are the criteria based on which an additive or a combination of additives can be considered (classified) attractive?
- 9. What are the methods currently used for assessing attractiveness and are they considered adequate?
- 10. Which additives increase attractiveness of tobacco products?
- 11. What is the association between additives and tobacco consumption (independent of any addictive potential they might have)? Which additives are used to target specific groups?

3. Deadline

June 2010