# Carbon dioxide labelling on consumer goods

# Product carbon footprints as tool for a low-carbon economy

Stabilizing greenhouse gas emissions at a level that prevents a global warming beyond plus two degree celsius is a formidable challenge. The required emission reductions can only be achieved by a series of technological, organizational and social innovations.

# By Fritz Reusswig

One such innovation has been launched in the United Kingdom, where Carbon Trust introduced a carbon label for consumer goods. Potato chips and hair shampoo have been among the first products labelled, but United Kingdom's largest retailer, Tesco, has announced that it would label all its products on the shelf in the coming years. The debate on carbon labels has started all over Europe, for example Migros in Switzerland or Adème in France.

In Germany, a consortium of research and policy organizations, including Öko Institute, Thema1, World Wide Fund For Nature Germany, and the Potsdam Institute for Climate Impact Research, has initiated a pilot project together with ten large companies, comprising Tchibo, dm, Henkel, Rewe Group and others. Its main goal is to develop a common and scientifically sound methodology for product carbon footprints (PCF), and to strive for international standardization. First results will be available later in 2008.

## A structural shift to a low-carbon economy

On average, every single German consumer is responsible for about eleven tons of carbon dioxide emmissions per year. Four tons are related to food, drinks, and other consumer goods. This is more than the building or travel related emissions respectively.

PCFs will be a key instrument to raise consumer awareness, and to create carbon transparency in the domain of consumer goods which actually is either lacking, or distorted by single issue foci like on food miles exclusively. Innovations towards a low-carbon economy will affect all links of value chains, including extraction, manufacturing, transportation, and waste disposal.

It is clear that PCFs alone will not pave the way to a low-carbon economy. On the other hand, PCFs can become one core element of such a structural shift. From an innovation oriented point of view, there are some very interesting aspects of a PCF.

- PCFs are situated at the interface of production and consumption. They reflect the total value chain related emissions, and communicate them to the final consumer. A carbon dioxide label will enable consumers to translate their concerns as citizens into consumption choices, while at the same time they send a signal back to retailers and producers.
- PCFs make sense only if they are part of a constant carbon dioxide reduction strategy of the firms across the value chain. They will complement the instruments of Corporate Carbon Footprints, Carbon Offsetting, and Emissions Trading, which are also evolving in the market.
- PCFs will help to spur innovation processes across the value chain, both technological ones such as new refrigerators, more efficient engines or less carbon intensive materials as well as organizational ones such as energy round tables, more efficient logistics, or more stakeholder involvement. They can help to translate the given innovation potential into real innovation processes.

Interestingly, it has been the private sector, together with science organizations and environmental non-governmental organisations that has set the pace for PCFs in Europe. The international dynamics of the climate and carbon dioxide label debate has convinced many to move forward. Given the high recent public attention to climate change, it is very tempting for a corporation to demonstrate its pro-active engagement, even if this claim is not really backed by real improvements. This risk of green-washing can only be reduced by transparent procedures, by using scientifically sound and widely accepted methodologies, and by independent certification.

These are the criteria that the German PCF Pilot Project does follow. National governments as well as the European Commission are also thinking of a carbon dioxide label, and it remains open whether we will see a harmonized, EU wide solution based on a government or based on a private driven label. In any case, PCFs and carbon dioxide labels provide a very promising tool in powering innovation processes towards the low-carbon economy we urgently need.

### AUTHOR + CONTACT

Fritz Reusswig is sociologist and member of the Transdisciplinary Concepts and Methods department at the Potsdam Institute for Climate Impact Research.



Potsdam Institute for Climate Impact Research (PIK), P.O. Box 601203, 14412 Potsdam, Germany. Tel.: +49 0 331 288-2576, E-Mail: fritz@pik-potsdam.de

(c) 2010 Authors; licensee IÖW and oekom verlag. This is an article distributed under the terms of the Creative Commons Attribution Non-Commercial No Derivates License (<u>http://creativecommons.org/licenses/by-nc-nd/3.0/</u>), which permits unrestricted use, distribution, and reproduction in any medium, provided the original work is properly cited.