

**BACKGROUND BRIEFING** 

Conclusions and recommendations from report 'Are trucks taking their toll?'

January 2009

## Truck transport in Europe: Taking its toll

Road freight transport in Europe currently only pays for its €50bn annual infrastructure costs. The remaining €90bn bill resulting from so-called 'external costs' (environmental, congestion and accident costs) is not paid by the sector but by the rest of society.<sup>1</sup>

Trucks represent a small proportion of vehicles, but a disproportionately large share of negative impacts of road transport. A revision of the so-called 'Eurovignette' Directive is therefore needed to allow the internalisation of these costs in road charging schemes for heavy goods vehicles (HGVs) is an essential step towards a more sustainable transport system.

### Truck transport in context

Road freight transport demand has grown strongly over recent decades, and this trend looks set to continue, with growth of a further 60% forecast up to 2030. Currently 75% of freight transport in the EU is carried by road. As this briefing outlines, road freight transport imposes serious negative impacts on society and the environment.

Whilst heavy goods vehicles (HGVs, over 3.5t) only constitute around 3% of the EU vehicle fleet, the fact that they drive many more kilometers overall than other vehicles, particularly passenger cars, means that around 7% of total vehicle-km in the EU are driven by HGVs. Even so, the proportion of environmental damage, safety risk and congestion caused by these vehicles is disproportionately high compared to their share of kms driven. Policy action must be taken to reduce these negative effects.

### Trucks do not pay their way

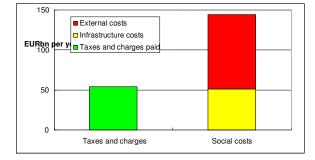


Fig: Cost coverage and external costs in HGV transport

http://www.transportenvironment.org/publications

The total social costs of HGV transport in the EU amount to approx. €144billion per annum. In contrast, €54 billion is the total annual amount of taxes (including fuel taxes) and charges paid by HGV operators. This approximately equates to the infrastructure costs incurred by HGVs (38% of the total external costs). It also means that HGV operators currently make almost no contribution towards their costs incurred in relation to congestion, accidents and environmental damage.

This means that the bulk of the external costs are not paid for by the sector which causes them. In contrast, these costs fall to other road users or residents who suffer from traffic delays, increased risk of accidents, poor air quality and increased noise levels, and also to those who are exposed to the harmful effects of climate change.

The polluter pays principle is enshrined in the EU Treaty, but as long as the transport sector is not obliged to pay for negative effects imposed – or indeed gets a free ride at the expense of others – there is no effective incentive to reduce the harmful impacts on safety, the environment and the economy.

## Disproportionate impacts: congestion, accidents, CO<sub>2</sub>, noise and air quality

Compared to HGVs' share of 3% in the EU vehicle fleet and 7% of vehicle-km driven in the EU, it is particularly alarming that trucks cause:

- **One fifth** (€20 billion) of the annual costs of **road congestion** in the EU. The contribution of trucks to congestion is however considerably higher on certain sections, especially border crossings, alpine passes, port access routes;

- 6,500 road deaths (13%) in the EU each year, meaning that trucks are twice as dangerous per km driven than passenger cars. Accidents involving trucks are so severe, that occupants of other vehicles involved are twice as likely to be killed than injured

- Almost a quarter (23%) of  $CO_2$  emissions from road transport, and 5-6% of total EU CO2 emissions. HGV  $CO_2$  emissions are on track to increase by 95% between 1995 and 2030. Since other sectors have clear commitments for 2020 drawn up under the EU's climate targets, road transport's and HGVs' share of EU  $CO_2$  emissions will represent 38% and 7-8% respectively by 2020.

- Around a quarter of all road fuel consumption, or 500 million barrels of oil per year at a cost of €60billion, and this share is steadily rising, as cars slowly become

<sup>&</sup>lt;sup>1</sup> Source for this background briefing: CE Delft (2009): Are trucks taking their toll? The environmental, safety and congestion impacts of lorries in the EU, commissioned by T&E, available from

more fuel efficient. In contrast, HGV fuel efficiency has not improved in the last 15 years.

- Almost half (47%) of the noise impacts of road transport – about the same impact as passenger cars. At least 210 million Europeans are exposed to levels of road traffic noise which put their health at risk. Each year 110,000 cases of ischemic heart disease and 21,000 deaths in the EU are attributable to noise from lorries;

#### - One third of air pollutant emissions (NOx, PM).

Member States are already entitled to charge passenger car drivers for external costs should they wish to do so. Several European cities already charge drivers for congestion costs, for example. However, since trucks are a major contributor to the external costs of transport, and especially congestion costs, it is essential to the equity of the transport system that EU law allows Member States to charge trucks as well.

# Substantial scope for efficiency improvements

The scope to reduce these impacts, primarily by increasing efficiency within the road freight sector is considerable. Currently, the average utilization of HGV capacity in the EU is 40-45%. By reducing empty driving and making fuller use of loading capacity, as well as by reducing congestion, the sector can offset additional costs with improved efficiency.

Load factors are consistently falling in a number of important countries, so the market is not providing a sufficient incentive to improve. The exceptions to this trend are however Germany and Switzerland, where load factors have improved since the introduction of km-charges for HGVs. Business that offer to match up spare truck capacity with part-loads or return loads are flourishing.

## T&E policy recommendations for the Eurovignette Directive

Distance-based charging for trucks (a small proportion of vehicles, but disproportionately large share of impacts) to reflect their real costs should be the cornerstone of an effective road charging policy to minimize harmful impacts.

1.) Current taxes and charges paid by the road haulage sector only cover the approx. €50bn of infrastructure costs and leave the almost €90bn of external costs virtually uncovered. Proper internalization of external costs is urgently needed to reverse the trend for rapid growth of the negative impacts of road transport. Without a flexible EU legal framework which allows Member States to establish effective charging schemes for trucks on TEN-T roads, trucks alone will contribute 7-8% of total EU CO<sub>2</sub> emissions by 2020.

2.) Since trucks are a disproportionately major cause of congestion (because of their intensive usage and the road space a truck takes up), Member States must be allowed to charge for the congestion impacts of trucks on congested sections of TEN-T roads. Congestion charging for trucks may be seen as a first step to introduce interurban road pricing, with car charging being subsequently introduced. Simultaneous introduction of congestion charging for cars should not be a condition, as in practice this makes it exceedingly difficult for Member States to introduce congestion charging.

3.) The high risk that trucks pose to other road users in accidents must be reflected in charges. The disproportionately high number of road deaths due to truck accidents, and in particular in those countries with otherwise exemplary road safety records, demonstrates that current insurance payments do not effectively manage the real risk imposed on other road users.

4.) Due to the current contribution of HGVs to  $CO_2$  emissions (5%), projected future growth (7-8% in 2020), the practical limitations (fuel tourism) to fuel taxes, and the absence of fuel efficiency standards for trucks, Member States must be permitted to internalize these costs in road charges.

### Further information:

CE Delft (2009): Are trucks taking their toll? The environmental, safety and congestion impacts of lorries in the EU, available from: www.transportenvironment.org/publications

www.transportenvironment.org/public

T&E Website:

t/lid:458

www.transportenvironment.org/Pages/lorry-charging/

'A Price Worth Paying': guide to the existing Eurovignette directive with an overview of road charging in all EU Member States.

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