

PACTS Response to Consultation on transforming the Highways Agency into a government-owned company December 2013

1. Introduction

PACTS is the Parliamentary Advisory Council for Transport Safety – an all-party Parliamentary group which brings together Parliamentarians, organisations and experts to identify and promote evidence-based approaches to transport safety.

PACTS' earlier contribution (November 2013) to *Action for Roads: A network for the 21st century* (Cm 8679, July 2013) highlighted the need for a new approach to improve the road safety quality of the main road network in Britain. Key road safety management issues for the Road Investment Strategy (RIS) and recommendations for related institutional arrangements are outlined below in this response to the Government's *Consultation on transforming the Highways Agency into a government-owned company*.¹

2. Road safety priorities for the Road Investment Strategy (RIS) (Questions 1-3).

- **Road traffic injury represents a large burden on society and the economy**

While substantial reductions in deaths and serious injuries have been achieved over several decades in Britain, the current level remains unacceptably high. In 2012, it was reported that around 25,000 people died or were seriously injured in road traffic crashes. Many died prematurely involving the young and vulnerable with those under 24 years comprising around 20% of death and serious injury according to police-reported data.² Health data indicates that road traffic injury is the leading single cause of death (all causes) in the United Kingdom for those aged between 5 and 24 years.³

The value of preventing road trauma in Britain is estimated at equivalent to 2 per cent of Gross Domestic Product.^{4 5} The DfT estimates that the total value of prevention in 2012 was £15.1 billion rising to £34.3 billion when unreported injury crashes are taken into account.⁶ Large costs from road traffic crashes are sustained by a range of sectors including health, employers and insurance, road and vehicle industries and undermine government policies and returns from related public resource addressing public health, child welfare, sustainable transport and social equity.

This point is accepted by the Chief Executive of the Highways Agency who said "too many people are killed or seriously injured on our roads every year."⁷

¹ Department for Transport (October 2013), <https://www.gov.uk/government/consultations/transforming-the-highways-agency-into-a-government-owned-company>

² Department for Transport (2013) *Reported Road Casualties in Great Britain: Main Results 2012*, 27 June 2013, London.

³ Institute for Health Metrics and Evaluation (2013), *Global Burden of Disease, Injuries and Risk Factors Study 2010*, www.healthmetricsandevaluation.org/gbd/2013

⁴ Road Safety Foundation (2013), *Measuring to Manage: Tracking the safety of Britain's major road network*, Basingstoke

⁵ Department for Transport (2013) *A valuation of road accidents and casualties in Great Britain in 2012*, London.

⁶ Department for Transport (2013) *A valuation of road accidents and casualties in Great Britain in 2012*, London.

⁷ Highways Agency Annual Report 2011-2012.

- ***New, targeted investment in road safety is needed on the strategic road network.***

While comprising only 11% of the total network, the core road network, comprising motorways and A roads outside major urban areas, carries 56% of traffic and produces around 51% of road traffic deaths. This part of the network comprises the busiest of roads, has high strategic priority and attracts large investment and is particularly amenable to targeted treatments of effective, affordable *Safe System* intervention of corridors and surrounding areas. These roads are managed by the Highways Agency and local highway authorities (councils).

The Highway Agency is responsible for some 2% of the length of the English road network, carrying 19% of the traffic and 15% of road deaths (2007-2011). (The lengths of road under the control Highways Agency – Motorways and Trunk Roads - were reduced considerably during the de-trunking programme (2000 onwards) when significant lengths of trunk road were transferred from Highways Agency to local highway authority control.) It is conceivable that some road serving a strategic function may be returned to the Highways Agency at some future point and we have therefore commented on the wider network.

The higher fatal and serious injury risk on rural A roads, in particular, deserves priority attention. The benefits to cost ratio of investment in road safety engineering treatments is high, commonly around 5 on major schemes and even 2 to 3 on parts of the network of better safety quality. Investment in road safety is a key element in improving the general quality of Britain's core road network which, as acknowledged in *Action for Roads*, has fallen behind that of other nations. PACTS notes the recommendation of international organisations that 10% of annual road project funding should be allocated to road safety treatments.

- ***Setting measurable goals and targets for death and serious injury prevention***

The internationally recommended *Safe System* approach requires the examination of contributory factors in road safety engineering and other intervention to shift from a focus on *crash* prevention to a focus on *death and serious injury* prevention.⁸ Research on contributory factors to deaths and serious injuries indicates that intervention to improve speed management and the intrinsic safety of vehicles and the road environment all have the major role to play in addressing this new results focus⁹ The current focus on incident factors is inadequate since it does not address all death and serious injury risk and, therefore, priority intervention.

Within a long-term vision for a safe, sustainable road transport network, desired, measurable safety outcomes for the interim need to be targeted in government transport, health and work-related road safety policies. PACTS believes that, as stated for the environment, strategic road safety goals should remain the responsibility of central government. The Government needs to set a clear, ambitious and measurable results framework for both final outcomes (e.g. deaths, serious injuries, social costs) and intermediate outcomes (e.g. mean

⁸OECD (2008), *Towards Zero: Ambitious Road Safety Targets and the Safe System Approach*, Paris

⁹ Stigson H, Kullgren A and Krafft M, (2011) *Use of Car Crashes Resulting in Injuries To Identify System Weaknesses* , Paper presented at the 22nd International Technical Conference on the Enhanced Safety of Vehicles (ESV). Washington DC, USA. DOT/NHTSA

speeds, safety rating level of road infrastructure (using iRAP, Euro RAP star safety ratings) both nationally and for the main road network and the new highways agency in the Road Investment Strategy (RIS) to provide for targeted, accountable action.

Final outcome targets Setting clear national goals and quantitative targets for death and serious injury prevention is an international success story leading to improved road safety and better use of public resource.¹⁰ In support of a long-term road safety vision for a safe, sustainable road network, PACTS recommends that Government sets challenging but achievable quantitative targets to reduce death and serious injury on the main road network to 2021. Effective practice indicates that such targets are stated in annual performance agreements and in the new highway agency's chief executive employment contracts.¹¹ The Highways Agency annual report should also report on progress with targeted outcomes, both final and intermediate. Currently, the only road safety outcomes reported are deaths.

Intermediate outcome targets Intermediate outcome measures are causally related to final outcomes. The rationale for setting intermediate outcome targets is to give those with responsibilities for the planning, design and operation of the road network control over the outcomes they can affect directly. The aim is to encourage closer safety management of the network to identify and address known death and serious risks. A variety of measures are appropriate for the main road network. These include ratings of the safety quality of the main road network using road assessment programme ratings; measures of mean speed and excess speed; key safety behaviours such as drinking and driving and seat belt use; the safety quality of vehicles and of emergency medical system response.

The Netherlands and New Zealand have set minimum Euro RAP 3-star or 4-star safety ratings for the national network by 2020 following an assessment of costs, benefits and practicality. Sweden has also set a range of targets to 2020 and beyond for network safety performance. The Road Safety Foundation estimates that targeting a minimum 3 star EuroRAP safety standard for motorways and A roads in Britain via a capital investment of £8.2 billion over 20 years, could save 600 lives annually, equivalent to £34 billion over a 20 year life of measures implemented.¹²

- ***The Safe System approach and capacity building***

The *Safe System* intervention strategy and long term goal has been adopted increasingly by national governments and highway authorities., it is promoted to all countries by the OECD, World Bank, World Health Organisation, the International Road Federation and the International Standards Organisation as international best practice.

Safe System builds on the best of previous approaches and promotes innovation and the adoption of technologies based on scientific safety principles which underpin the

¹⁰ OECD (2008), *Towards Zero: Ambitious Road Safety Targets and the Safe System Approach*, Paris

¹¹ OECD (2008), *Towards Zero: Ambitious Road Safety Targets and the Safe System Approach*, Paris

¹² Hill, J and Starrs, C (2011), *Saving lives, saving money. The costs and benefits of achieving safe roads*, Road Safety Foundation and RAC Foundation, <http://www.roadsafetyfoundation.org/media/1107>

effective planning, design, operation and use of the road network.¹³ *Safe System* acknowledges that the road traffic system is inherently risky and that people make common mistakes. *Safe System* intervention pays better attention to human characteristics such as unintentional error and known physical tolerances to injury. For example, the chances of survival for an unprotected pedestrian hit by a vehicle diminish rapidly at speeds greater than 30 km/h, whereas for a properly restrained motor vehicle occupant in the best designed car the critical impact speed is 50 km/h (for side impact crashes) and 70 km/h (for head-on crashes).¹⁴ *Safe System* also acknowledges that small differences in speed can have a large effect on the occurrence and severity of road crashes and injuries. A 1% decrease in average speed corresponds with a 2% decrease in injury crashes, a 3% decrease in serious injury crashes and a 4% decrease in fatal crashes and vice versa.¹⁵

Safe System engineering treatments target the key crash types resulting in death and serious injury – head on impacts, run-off road collisions, side impacts and vulnerable road user collisions. The Road Safety Foundation has recently highlighted the dominance of crashes at junctions leading to serious trauma and of death from running off the road on Britain’s main road network and has outlined successful treatments and evidence-based recommendations for investment strategy.¹⁶

Safe System urban and rural road hierarchies generally aim to find a better match between road function, speed limit and road layout and design. Safety engineering strategies aim to separate oncoming traffic on high-volume, high-speed roads to prevent head-on collisions; provide crash protective roadsides where possible to address run-off road collisions; ensure safe speeds at junctions to reduce fatal and serious side collisions; and ensure safe speeds on roads and streets with dangerous mixed use where effective grade separation of motor vehicles and vulnerable road users may be difficult or unaffordable. Integrating *Safe System* principles through proactive safety planning and design can address intrinsic dangers in the road network, improve protection for non-motorised as well as motorised road users and reduce costs.^{17 18} As part of a suite of tools, road assessment programmes e.g. EuroRAP are being used increasingly in countries to map network injury risks and affordable *Safe System* engineering priorities and investment packages. *Safe System* demonstration programmes and projects using these tools provide a starting point for building capacity and the transfer of knowledge in the highway engineering profession.

- ***The proposed process for establishing the Road Investment Strategy (RIS)***

PACTS support the proposed process for the establishment of the RIS, provided that a comprehensive safety performance framework for the strategic roads network is envisaged by government, as outlined in previous sections. PACTS expresses its

¹³ OECD (2008), *Towards Zero: Ambitious Road Safety Targets and the Safe System Approach*, Paris

¹⁴ Tingvall C and N Haworth (1999) *Vision Zero - An ethical approach to safety and mobility*, Paper presented to the 6th ITE International Conference Road Safety & Traffic Enforcement: Beyond 2000, Melbourne, 6-7 September 1999.

¹⁵ Nilsson, G. (2004) *Traffic safety dimensions and the power model to describe the effect of speed on safety*. Bulletin 221, Lund Institute of Technology, Lund

¹⁶ Road Safety Foundation (2013), *Measuring to Manage: Tracking the safety of Britain’s major road network*

¹⁷ OECD (2008) *Towards Zero: Ambitious road safety targets and the Safe System approach*, OECD, Paris, 2008

¹⁸ Tingvall C, Johansson R, Belin MA, Lie A, *Safe, clean and affordable mobility*, Presentation to World Bank, 2007

readiness to offer expert inputs where necessary and to participate in the on-going government consultation process.

The Government should use the RIS to specify outcomes, such as capacity, access, safety, economic growth, etc. It should be for the Highways Agency to decide how best to deliver these objectives. The Government should avoid the temptation to include a list of schemes in the RIS, as seems to have happened with the HLOS for Network Rail.

PACTS is concerned however that the proposed RIS system may create a disparity between the Strategic Highway Network and those sections of the main road network which are managed by local authorities and which are in need of safety improvements. Funding for the (very limited) network under Highway Agency will be assured and laid out into the future while the network under local highway authority control will continue to be subject to short term planning and funding.

3. The roles and responsibilities of the new Highways Agency (Questions 4-6)

Road safety must be a core responsibility for the new Highways Authority and at least equal in status to access and environmental considerations. PACTS recommends that the road safety role and responsibilities of the new Highway Agency for road safety are clearly defined in legislation, as well as its long-term road safety vision to ensure sustainability and continuity. PACTS regrets that while the HA role for the environment and for environmental objectives and indicators is mentioned, there is no specific mention in the consultation of these specific issues as they affect road safety.

It is also recommended that the new agency conducts a review of its current road safety management capacity, benchmarked against identified international good practice, to identify strengths and weaknesses. In addressing its goals and targets proposed by Government the agency will need to ensure capacity for key institutional management functions – providing a lead road safety unit responsible for the delivery of targets and strategies; coordination with its key partners in the public and private sectors to deliver key interventions in support of its road safety engineering interventions on the strategic road network e.g. combined police enforcement and publicity, employers along the network, implementing new and compatible vehicle/roadside technologies such as crash protection systems and lane marking, improving emergency medical response etc. Capacity will need to be provided to ensure that funding levels are secured which are appropriate to the task; championing road safety at a senior level; ensuring that monitoring and evaluation systems and processes are in place for all data in support of goals and targets, as well as knowledge transfer about successful international and national innovative approaches and treatments using demonstration projects, in-service training and study tours.

4. Who should be the Regulator? (Questions 7-8)

Given that road safety cuts across many sectors and areas of public policy, the regulator needs to be a government department which has existing relationships across the responsible government agencies and which has appropriate road safety competence and capacity. For these reasons PACTS strongly rejects the idea that the ORR should become the regulator. Similarly since the proposal that an external watchdog be set up

for the new Highways Authority is not supported. PACTS prefers a road safety management advisory body for the strategic road network to be established within the auspices of the Department of Transport and for performance to be monitored periodically, albeit by independent road safety management capacity review and expert evaluation, and reported to Parliament.

PACTS

Clutha House
10 Storey's Gate
Westminster
London SW1P 3AY

t 020 7222 7732
f 020 7222 7106
e admin@pacts.org.uk
w www.pacts.org.uk

PACTS is an Associate Parliamentary Group

Registered Office: Clutha House, 10 Storey's Gate, London SW1P 3AY **Co. Reg No.** 2366277 **Charity Reg No.** 1068607 **VAT No.** 503 4869 48