



Chartered Institution of Highways & Transportation response to the release of the Transport Investment Strategy

CIHT welcomes the governments Transport Investment Strategy and the recognition of the vital role that transport plays in stimulating the local as well as national economy.

CIHT has consistently called for a national transport strategy including in its published Manifesto¹ and it is good to see that a number of our recommendations are being taken forward. This new strategy highlights the importance of transport and provides improved certainty and clarity on the future of our transport infrastructure.

The Transport investment strategy sets out a new long-term approach for government infrastructure spending, meaning cash will be targeted at projects that help rebalance the economy.

CIHT welcomes the strategies increased focus on the customer, “to put the travelling public at the heart of our transport choices”. Making the customer a focal point and understanding and considering the customer when making investment decision is vital.

Local roads are set to benefit from a share in a multi-billion pound improvement fund. The strategy features the proposed creation of a new Major Road Network, which would see a share of the annual National Road Fund, funded by VED, given to local authorities to improve or replace the most important A roads under their management. The proposals for the Major Road Network respond to the Rees Jeffreys Road Fund study last year, which highlighted the disparity between the funding and planning of Britain’s motorways, the strategic road network and local authority A roads. The new plans mean that main roads currently overseen by local authorities would share the VED funded National Roads Fund which was previously envisaged to be ring-fenced for national routes. UK VED was £5.8 billion for 2016-17.

The plans aim to improve productivity and connectivity of towns and cities across the country, tackling bottlenecks and traffic jams for road users, and reducing the impact of lorries and through-traffic thundering through rural villages on main roads.

The scheme will also aim to help people get to work or school by better connecting towns and cities, unlock land for new homes, and improve business links, forming a crucial strand of the government’s strategy to rebalance the economy by ensuring wealth is spread across the UK and not just concentrated in the south-east of England.

The strategy also plans for a new ‘rebalancing’ measure, which will judge how investment programmes contribute to a more balanced economy, and prioritises investment that increases productivity or growth, supports new housing, improves reliability and tackles congestion. Investment should support every part of the country, and, where needed, fast track smaller schemes that are proven solutions so passengers and drivers get the benefits more quickly.

The strategy recognises the support transport networks offers to new housing developments. A good mix of modes to new developments is required, as it stands the strategy is more road focussed. It is essential that sustainable transport options are promoted. The strategy is positive in that it is trying to link strategies, what remains important is building good developments that are not car centric. The establishment of the £2.3bn Housing Infrastructure Fund is critical. CIHT have been liaising with Treasury and other government departments on the importance of recognising the link between planning and transport.

¹ [CIHT Making the Journey – A Manifesto for Transport](#)



The strategy forms a vital part of the modern industrial strategy and builds on the progress made in recent years of upgrading the road and rail network. The government is investing more than £61 billion over the 5 years to 2020-21 and has already taken big decisions on transformational projects like HS2 and announced a preference for a new runway at Heathrow.

The below sets out a number of areas CIHT believe need to be recognised when delivering on the strategy.

CIHT welcomes the recognition of the opportunities and challenges created by devolution both nationally and regionally

CIHT has previously called for government to take the opportunity to build on the emergence of sub-national groupings to encourage a more strategic focus to decision making. The emergence of statutory Sub-national Transport Bodies offers new opportunities to feed in local 'strategic' opinion into a national 'strategic' view. Any National Infrastructure Assessment and investment should take advantage of this by working closely with sub-national partnership bodies enabling an integrated/co-ordinated approach to infrastructure planning to meet local 'strategic needs'.

Other areas for consideration:

- Devolved governments in both Scotland and Wales have already demonstrated a more joined up approach in developing transport strategies. There is an opportunity to learn from their approach.
- London provides an example of how a Mayoral approach has allowed for long term planning (for schemes such as Crossrail) and for focus on local networks that help improve health and wellbeing through the support given to walking and cycling.
- The devolution deals present great opportunities for a greater response to local needs but the number of transport authorities across the UK does present challenges in terms of consistency of approach, ineffective use of resources and differing governance standards.
- The move to devolution of greater agglomeration of transport operations, if structured (through governance/executive powers and funded for multi-year periods) correctly will deliver real benefits.
- The availability of funding for transport, especially at a local level will continue to be a concern moving forwards.

A wide view of how infrastructure supports other policy agendas: housing, health and education

The CIHT is pleased that the strategy takes account of other key policy areas such as planning, housing, health and education and how these policy areas work together to deliver the national needs. However, CIHT believes that the strategy should include a maintenance programme for local networks. Local networks are fundamental to the economic, social and environmental wellbeing of communities. It helps to shape the character and quality of the local areas that it serves and makes an important contribution to wider local authority priorities, including regeneration, social inclusion, community safety, education and health.

Spatial strategy and attention to planning

CIHT believes that it is essential that the strategy should be linked to a high-level spatial strategy. There needs to be an integrated approach from Government (national, sub-national and local) and its agencies. This should extend beyond the electoral cycle to produce a long-term spatial strategy that links the future transport needs of the country.



CIHT's response to the National Planning Policy Framework² highlighted the importance of effectively integrating planning and transport to ensure that the objective of delivering sustainable growth is realised. There is a need for changes to the National Planning Policy Framework in order to facilitate better/improved and timely delivery.

Questions such as how future housing requirements will be met must be clear in spatial terms. The strategy recognises the challenges provided by the operation of the current housing market: the majority of housing availability sits within the current housing stock and locational choices are a trade-off between affordability and travel costs. This gives support to an argument that a light touch spatial strategy is important (for example the devolved administrations have been preparing light touch spatial strategies)³.

The strategy must also consider which existing corridors demand investment (particularly regarding public transport, including bus provision with walking and cycling).

Housing, health

Transport investment should consider the interaction between transport, health and housing when developing the case for new transport schemes in the UK. CIHT notes that in recent times, the funders, professional advisers and users have tended to focus only on the direct economic benefits, without factoring in quantified health and wellbeing savings.

For example the current aim of an extra 1 million homes in this parliament, alongside provision of social infrastructure to support this extra provision will rely fundamentally on integrating spatial and transport planning. The aims of productivity and automatic planning permission for brownfield sites runs the risk of not fully considering how such schemes integrate with transport provision. This could miss opportunities for ensuring adequate public transport and particularly walking and cycling: important given the health challenges the UK faces.

Connectivity

Improved connectivity is vital to enabling growth. Clarity and certainty in terms of strategic planning will produce greater confidence amongst investors, business and housing (developers). Cities, towns, villages and rural communities all contribute to the success of the UK economy, increasingly so as the implications of the new digital economy challenge the traditional 'agglomeration model' The CIHT Futures⁴ project helps to set out the need to adopt a new approach to strategic planning, one that embraces a scenario based planning approach.

The weaknesses in connectivity is holding back much of the UK's regions in terms of jobs, enterprise creation, economic growth, and housing. It is therefore important that investment priorities in one area of the country are determined only having taken into account the relative benefit compared to investment made elsewhere.

A customer focus

CIHT welcomes the increased focus on the customer. CIHT has long called on the government to make the customer a focal point and understanding and considering the customer when making investment decision is vital.

- Identify the different classes of groups (customers) who are reliant on the network. As well as different users of the network, these customer groups could include amongst others, adjacent communities, non-users of the network, the environment, heritage and

² [CIHT response to the National Planning Policy Framework](#)

³ [CIHT response to the Transport Select Committee call for Evidence on Local Decision Making on Transport Expenditure.](#)

⁴ [Future Uncertainty in Transport – Understanding and Responding to an Evolving Society, CIHT 2015 - 16](#)

the highway asset itself. These customer needs should include both those that are known early on and those that are defined in terms of required outcomes.

- Identify the different purposes that the network is required to deliver to different customer groups
- Analysis to confirm how the network will best meet the different purposes identified and to identify what investment is required to meet those different purposes of all customers.
- Confirm the wider benefits that will arise from meeting the needs of all customer groups and thereby define the value for money of the investment.
- Identify areas where investment in other modes will better meet the needs of customers and identify the parties best able to deliver that investment.
- Technology enabled solutions are making it possible for customers to have greater visibility of the cost of transport choices, in this sense the market will drive this trend in response to customers' expectations.

Sector needs certainty

Certainty, and continuity of investment over a sustained period is important if overall improvements to the transport network are to be delivered effectively and efficiently. This need for certainty applies to the Government, "client" bodies and the wider supply chain of organisations working in the sector.

It must also show how it will establish regulatory frameworks that are used to determine future levels of investment by public and private sectors. It is essential that any assessment of needs must look to balance investment across all networks and regions so as to maximise the efficiency of both public and private investment.

Certainty of investment over a sustained period will allow progress to be made in terms of developing a truly co-ordinated transport system, one that's networks are more resilient to disruptions – both planned and unplanned.

Funding

Maintenance and resilience of the existing asset, especially the Local Road Network, is too often overlooked with focus on the funding model for capital expenditure on highways maintenance given precedence. It is vital to recognise that the highway maintenance service in local authorities is also dependent on revenue funding from Department for Communities and Local Government (DCLG) and other sources.

It is worth remembering that the Local Road Network (national infrastructure) makes up 98% of roads at an estimated value of £400bn⁵ and is currently subject to the problems of annualised budgets.

Revenue funding is subject to significant economic pressures that affect the ability of local authorities to deliver their highway services. A number of reports have highlighted the need to consider both revenue and capital funding together to ensure an effective and efficient service delivery (NAO⁶, Transport Resilience Review⁷). Without considering the two elements together it is unclear how an effective and efficient service can be delivered.

Skills and workforce shortages

It is important that the strategy does not focus solely on productivity but also recognises the importance of sustainable delivery to achieve its ambition of long-term economic success.

⁵ [Action for Roads](#)

⁶ [NAO report \(2014\) 'Maintaining strategic infrastructure: roads'](#)

⁷ [Transport Resilience Review \(2014\)](#)



The recruitment, careful development and retention of the next generation is central to a vibrant, internationally competitive and diverse industry. Industry trends show that with fewer graduates entering and an ageing current workforce, action must be taken to secure the pipeline of skilled engineers and transportation professionals for the future.

This includes an understanding of who is responsible for tackling the shortage and how we are going to fill the jobs that will be required to deliver the proposed infrastructure. The development of skills is a key area of concern and one that should be carefully considered when reviewing delivery of the UK's needs. The recruitment, development and retention of the next generation is vital to deliver these ambitious plans. In a recent survey of CIHT's Corporate Partners, 96% of respondents anticipated having a skills shortage in the next few years.⁸

CIHT has a suite of career materials and guidance as part of a programme to help the industry deal with the range of technical skills shortages. This includes a diversity and inclusion toolkit which provides practical guidance on data gathering, attracting and retaining a more diverse workforce and on changing culture and behaviour. It is the first toolkit of its kind for the highways and transportation sector and provides a route map to success through diversity and inclusion. If it does not tap into a wider talent pool, the Industry is unlikely to recruit the number of people that it needs to maintain and develop its skills base.

The National Infrastructure Plan for Skills⁹, published by Infrastructure UK, sets out concerns in major sectors like roads, rail and energy. The report found that through growth in infrastructure investment, there would be a demand for over 250,000 construction and over 150,000 engineering workers by 2020, with a shortfall of nearly 100,000 additional workers by the end of the decade. Programmes like HS2 and increased investment in roads will put further stress on the industry's capacity to deliver, the report found. It noted that demand is forecast to outstrip supply over the next five years in all English regions.

The Strategy has a key role in establishing the certainty that would help industry invest in skills and secure the pipeline of engineers and professionals for the future. CIHT welcomed the Department for Transport Skills strategy¹⁰. It is now crucial that the government works with industry very quickly to ensure the skills, capacity (e.g. timetabling of scheduled works to enable the necessary skilled professionals to be available) and capability to deliver these infrastructure projects are available.

In addition to addressing current skill needs, the industry must start to look at the skills that will be needed in the future and factor to those in to any skills development strategy going forward. Government should support a public engagement campaign to promote careers in engineering and related disciplines to young people and their influencers.

Construction materials and equipment

Recent investment in infrastructure such as the £15bn allocated to Highways England for the strategic road network, HS2 and other large programmes of work such as Crossrail, will impact on the availability of materials, plant and equipment in the sector. A 2010 study by BIS estimated that 64% of building materials were imported from the EU. With Brexit, importers may now face duties or limits on quantities, which could lead to further shortages of construction materials or an increase in costs.¹¹ Clarity is essential to provide the certainty

⁸ [Routes to Diversity & Inclusion, CIHT 2015](#)

⁹ [The National Infrastructure Plan for Skills 2015](#)

¹⁰ [Department for Transport Skills Strategy 2016](#)

¹¹ [What does Brexit mean for construction?](#)

required by the supply chain side of the sector, enabling them to invest in resource and capability to deliver the investment envisaged.

Resilience – invest to save, mitigating against disruption

Review the resilience of the UKs infrastructure and move the consideration of resilience from event-driven reviews (Quarmby Review in 2010¹² and the further review on the causes of vulnerability in 2014) to regular review and planning by asset owners themselves, as a fundamental part of maintaining an integrated transport network. CIHT has previously recommended a formal review and commitment for asset and infrastructure resilience assessment to be made a statutory requirement in its response to the Transport Resilience Review¹³ in 2014.

Security – the strategy needs to ensure that a security-minded approach is considered

The strategy should ensure that security issues are fully considered focussing on the security aspects of infrastructure provision in terms of physical and cyber security. This is important when it comes to the potential security implications of moves towards open data and BIM models. It is recommended that PAS 119-5 2015 is strongly championed to ensure such thinking is embedded within the infrastructure community.

The environment

Recognition of sustainability and environment is critical and the strategy is light as currently drafted. The strategy needs to be more than reactive to climate change and recognise that transport infrastructure and everything that comes with it, is one of the drivers of climate change, and therefore we should be pro-active as well as reactive. Large infrastructure projects / schemes usually have ramifications for the natural environment and as a result CIHT would like the strategy to ensure that the programme works to agreed carbon targets.

Considering new and emerging technologies and disruptive trends

The public sector should act as an enabler/facilitator for technology enabled innovation as the market will respond in ways that might not be envisaged. The public sector should provide leadership and a vision on the kind of place we are looking to achieve.

There are a large range of emerging technologies – from increasingly autonomous and electric vehicles to wireless power technology. Print on demand (3D) and drones are just some examples of what might have a disruptive influence on supply chains and logistics.

The way in which technology changes behaviour and demand is one of the uncertain elements faced today – rather than trying to predict, the opportunity is to embrace uncertainty so trying to predict what technology will do is unlikely to be the right approach. If the question is turned around to say – What do the users of our transport networks need? Then there is the opportunity to map which factors affect and influence those needs. They can then be assessed;

- Which of those factors can be controlled and which cannot?
- Where can technology play a part in controlling those factors and who manages that technology?

¹²<http://webarchive.nationalarchives.gov.uk/20111014014059/http://transportwinterresilience.independent.gov.uk/>

¹³ <http://www.ciht.org.uk/en/document-summary/index.cfm/docid/FE7FEF4E-E237-45F7-8C526F39F890E407>



That approach will give a much clearer route to which bits of technology to focus on. Alongside that approach there is then a need to accept that there will be changes that were not predicted and how are these managed?

Decide and provide

CIHT would encourage a move away from a 'predict and provide' approach to one of more 'decide and provide'. When considering the transport investment, consideration should also be given to what society wants the future to look like. CIHT Futures¹⁴ project provides more information and insight into issues such as uncertainty and forecasting.

There is a generational dimension with the priorities of younger people likely to change demand for transport in the future. This is partly being driven by technology and enabled by innovation and this is encouraging/enabling a shift from ownership of transport towards access to transport/connectivity: this is a fundamental shift in terms of attitude and expectations.

It is important when assessing transport investment that the process recognises the wider benefits of (transport) infrastructure. Improved and integrated infrastructure will help tackle some of the big societal changes, including the ageing population, rise in obesity and social exclusion that we face. The benefits of investing in a long-term infrastructure plan will have a positive impact on accessibility, education, protecting the environment and enhancing the quality and functionality of existing places as well as improvement in quality of life and climate change.

¹⁴ [CIHT Futures](#)