

# HS2

Getting the best out of  
**the North East**





High Speed Two (HS2) Limited has been tasked by the Department for Transport (DfT) with managing the delivery of a new national high speed rail network. It is a non-departmental public body wholly owned by the DfT.

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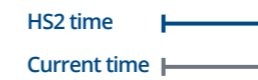
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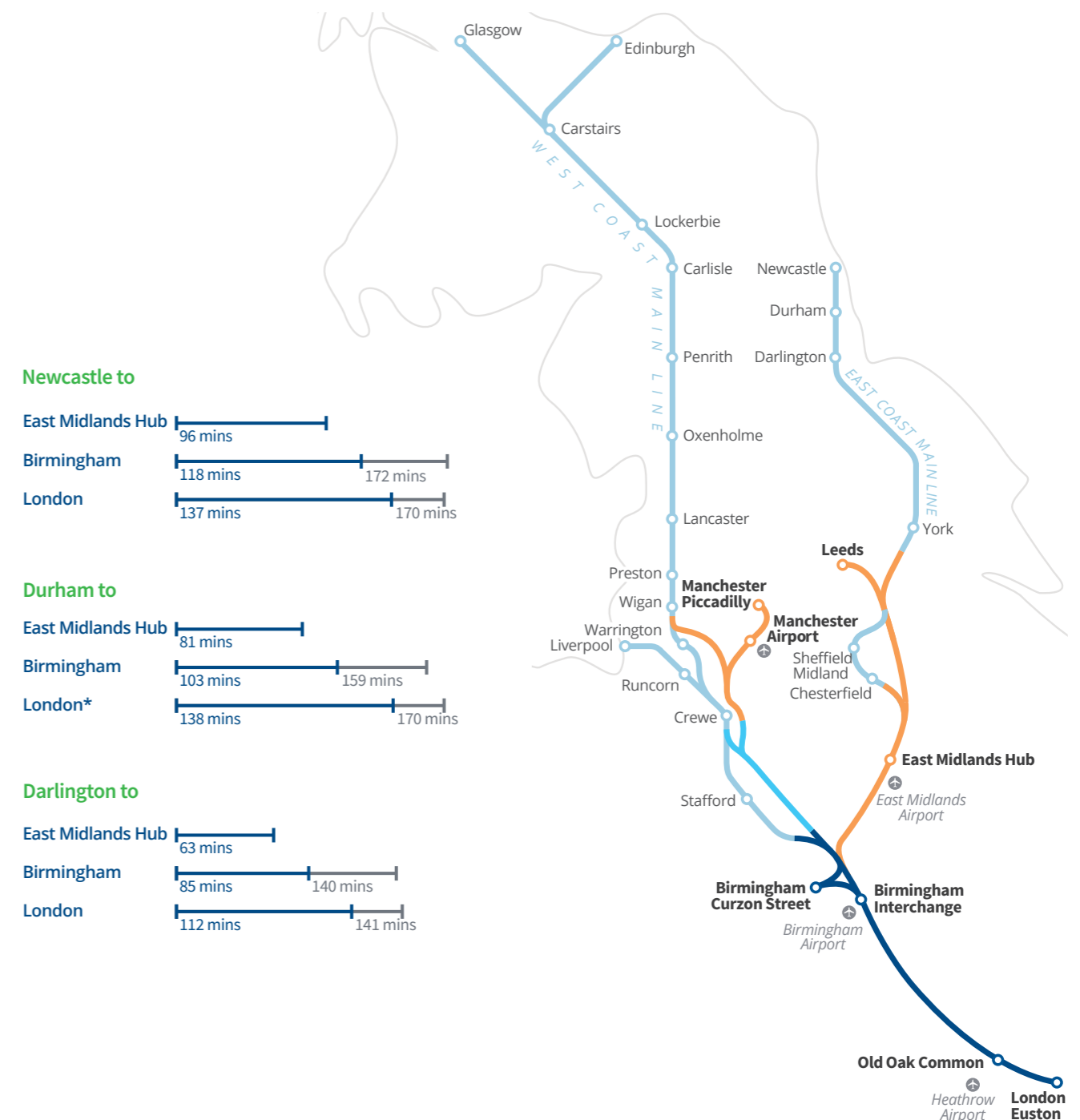
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All times compare fastest HS2 service (full network) with current fastest time.



### HS2 Route Map

- ● Destinations served by HS2
- HS2 line (Phase One – Completed 2026)
- HS2 line (Phase 2a – Completed 2027)
- HS2 line (Phase 2b – Completed 2033)
- HS2 services on existing network



\* Via interchange between HS2 services at York or East Midlands Hub

## The economy of the North East of England – comprising the Local Enterprise Partnership (LEP) areas of the North East and the Tees Valley – is home to advanced manufacturing industries and emerging strengths in the digital sector, supported by a concentration of universities and skills providers

The North East region is home to over 2.5 million people and contributes over £45 billion annually to the UK economy<sup>1</sup>:

- » In the North East LEP area, Newcastle City and the urban areas of Sunderland and Durham are key business and employment locations. Manufacturing of passenger vehicles and the associated supply chain supports over 12,000 jobs in the region, supported by the Automotive and Manufacturing Advanced Practice (AMAP) at the University of Sunderland, and the future technology centre (also in Sunderland) that focuses on low carbon vehicles. The region is home to the UK's second largest business base in the area of subsea and offshore technologies. Life science and healthcare companies employ over 38,000 people in the North East<sup>2</sup>.

- » The Tees Valley contains major employment and economic centres in Darlington, Stockton-On-Tees, Middlesbrough, Hartlepool and Redcar/Cleveland. Process industries such as petrochemicals, polymers and industrial biotech are located close to innovation assets that include the Centre for Process Innovation (which takes in the new National Biologics Manufacturing Centre in Darlington), the Materials Processing Institute and the Welding Institute's Technology Centre in Middlesbrough<sup>3</sup>.
- » A growing digital sector in the North East contains a diverse network of start-ups, small and medium-sized enterprises (SMEs) and established firms in digital technologies.

Sunderland Software City



Image: MAKE it Sunderland

## HS2, as part of an integrated transport network, will help the North East and Tees Valley to narrow their productivity gap

An independent economic review commissioned by the North East LEP identified lower levels of productivity as a structural weakness of the region's economy. The review found that lower levels of productivity in the North East relative to the national average are linked to low skills, underemployment, the nature and type of work mainly on offer, and challenges related to rates of enterprise and innovation. Across all sectors in the North East, only manufacturing has levels of output per worker that are close to the average for England<sup>4</sup>. The North East has set a target to ensure that 70% of new jobs are "better" jobs that offer higher skilled, more productive and better quality opportunities to more people in the area<sup>5</sup>.

In the Tees Valley, productivity is around 90% of the national average. While productivity measured by GVA per employee in the production sector is higher than in the city regions of Leeds, Manchester and Birmingham, the challenge is to raise productivity across all sectors in the Tees Valley region, especially services. Raising levels of productivity is identified as a priority in the region's Strategic Economic Plan<sup>6</sup>.

The smaller scale of urban areas makes it difficult for city regions in the North of England to secure the same degree of scale and success as their counterparts in the South East. In the North the

population is spread out across a number of cities and the density of employment in urban areas is lower than in the rest of England<sup>7</sup>. This is compounded by poorer levels of transport connectivity compared to the South East. Crowding is a growing problem – around a fifth of rail passengers in the North are dissatisfied with the room to sit and stand – and services can be infrequent. The strategic road network in the North suffers from areas of congestion, such as the A19 in the North East and Tees Valley<sup>8</sup>.

HS2 offers faster, more frequent and more reliable travel between cities and areas of the UK and will increase capacity on our congested railways. The eastern leg of Phase Two of HS2 will connect the North East and Tees Valley regions to Yorkshire, the East and West Midlands with HS2 services calling at Darlington, Durham and Newcastle stations. This will improve links between regions that are home to around 11 million people, as well as cutting journey times to London to under 2 hours from Darlington and to around 2 hours 15 minutes from Newcastle. HS2 will allow businesses across the North East and Tees Valley regions to collaborate with supply chains and research and development partners, draw on a deeper pool of skills, access new sources of finance and support networks, and secure new customers in regions across Britain.

## Connections with local and regional transport networks will provide businesses across the North East with access to the HS2 network

- » HS2 services will call at Newcastle station, which acts as a hub connecting Newcastle International Airport, Sunderland and South Tyneside, East Durham, Northumberland and Cumbria. Seamless interchange to local Metro, rail and bus routes means the people of Newcastle and the wider area can access the opportunities offered by HS2<sup>9</sup>.
- » Darlington Borough Council has been working with the Tees Valley Combined Authority, the LEP, Transport for the North and Network Rail on a masterplan to capitalise on HS2 trains serving Darlington Station. The plan sees the station as a crucial economic and transport hub<sup>10</sup>.

Tyne and Wear Metro, Newcastle



Image: Alamy stock photo

## HS2 can help to attract business relocations and create skilled jobs and career opportunities in the North East and Tees Valley

London consistently ranks amongst the world's most attractive cities in which to do business<sup>11</sup>. London is, however, the most costly location among the European cities to do business<sup>12</sup>. HS2 offers businesses the opportunity to relocate or expand their operations in the North East and Tees Valley and realise significant cost savings while retaining easy access to opportunities in the capital. Prime office rents in Newcastle are around one-fifth of rents in the West End of London<sup>13</sup>. Already 17,000 financial and professional services companies are based in the North East, including all of the 'Big Four' accountancy firms and the headquarters of Virgin Money. The region has been successful in attracting shared services activities<sup>14</sup>.

Growing the skills base in the North East and Tees Valley will further enhance the attractiveness of the region for inward investment and businesses seeking to relocate or expand their local presence. The North East has five universities – Durham,

Newcastle, Northumbria, Sunderland<sup>15</sup> and Teesside University. Teesside University is one of the leading universities in animation and computer gaming<sup>16</sup>. This strong local pipeline of skilled graduates is complemented by Newcastle's relative success in attracting many graduates to move into the city for work even though they had not lived or studied there before<sup>17</sup>.

Overall the North East LEP area has more people qualified at a high level of skills than there is currently demand for workers at that skill level, suggesting an opportunity to fill skill gaps if workers can be better matched to job opportunities<sup>18</sup>. HS2 will make the city regions of the North East and Tees Valley more attractive places to live and work by supporting the growth of employment opportunities in knowledge-based sectors that value improved transport links. This will help to create the demand for skilled jobs and better career opportunities for local people in the region.

Teesside University



Image: Alamy stock photo

## Improved transport connections can help to bring small businesses in the North East closer to sources of finance and support networks

Small and medium-sized enterprises (SMEs) employ the majority of the UK private sector workforce. In the North East LEP area, there are over 400 high growth small businesses employing over 15,000 people. These businesses contributed around one-third of the region's economic growth during 2014<sup>19</sup>. The SMEs of the Tees Valley area supply products and services to major manufacturers and supply chains<sup>20</sup>.

The North East is home to a dynamic digital sector. Thousands of software technology, electronic gaming and creative businesses are based in Newcastle, where the presence of some of the UK's biggest digital businesses, such as Sage, and the talent pool provided by the city's universities attract innovative start-ups to the area<sup>21</sup>. The University of Sunderland and Sunderland College are partners in Sunderland Software City, which has supported the growth of over 500 software companies<sup>22</sup>. Middlesbrough's gaming sector is thriving and DigitalCity, born out of Teesside University, supports the digital tech and creative industries<sup>23</sup>.

However, in a survey conducted by TechCity in 2016, 37% of digital businesses surveyed in Newcastle reported limited access to finance as a barrier to growth<sup>24</sup>. While venture capital fund Northstar Ventures has more than £100 million under management in Newcastle<sup>25</sup>, London remains the centre of the UK's financial sector for businesses seeking to access private equity and venture capital. Around 25 venture capital funds were established in London between 2010 and early 2015, helping to cement London's status as Europe's leading venture capital centre<sup>26</sup>. London has been ranked as the number one city in Europe for access to capital for start-up and scale-up digital businesses<sup>27</sup>.

HS2 will help small businesses to grow by reducing the effective distance between London-based investors and small and high growth businesses in the North East and Tees Valley by providing fast, frequent and reliable services to the capital. HS2 can also help Newcastle to strengthen its offer as a destination for conferences and business visitors, providing additional networking opportunities for local businesses.

## By improving connections to research centres and supply chains across Britain, HS2 will support the competitiveness of advanced manufacturing in the Tees Valley and North East city regions

Across the North East region, advanced manufacturing and engineering is globally focused with strong clusters in automotive and medicines manufacturing. Over 62,000 people in the North East LEP area work in advanced manufacturing activities, including in a strong cluster of automotive manufacturers and suppliers. The North East LEP area is also home to 145 companies in the medicines manufacturing industry<sup>28</sup>. In the Tees Valley area, advanced manufacturing accounts for around 20,000 jobs in both multinational companies and locally owned supply chain businesses<sup>29</sup>.

Knowledge sharing, new discoveries and serendipity are encouraged when engineers, scientists and researchers are able to come together and collaborate. HS2 will support face-to-face collaboration in research and innovation by effectively shrinking the distance between manufacturing plants, their suppliers, universities and research centres. Some of the UK's best universities and manufacturing clusters in the North East will be connected to research centres and supply chains in Yorkshire and the Midlands.

Newcastle University



## HS2 will provide businesses in the North East and Tees Valley city regions with access to new customers in the UK and overseas, supporting the region's strengths in exports

HS2 will offer businesses based in the North East and Tees Valley access to businesses in other regions of the UK that could not previously be accessed at a reasonable travel time and cost. This increase in business-to-business connectivity will provide businesses in the region with significant opportunities to forge relationships with new customers, suppliers and research collaborators.

HS2 will help bring the tourism and visitor attractions in the North East closer to markets in the Midlands and South East of England. County Durham welcomed over 19 million visitors in 2016 and the visitor economy employs over 11,000 people in the County<sup>30</sup>. County Durham is drawing increasing numbers of visitors from within the North East and fewer from more distant areas of the UK and overseas. Visit County Durham has made attracting new staying visitors from a wide geographic area a priority, recognising that this can help to increase the number of staying visitors who tend to have higher average spend than day visitors<sup>31</sup>. HS2 will bring Durham within 2 hours and 20 minutes' journey time from London and within 1 hour and 45 minutes from Birmingham, making visits to Durham from those regions easier.

The North East is an exporting powerhouse with net exports from the region of £3.4 billion in 2015. Advanced manufacturing exports from the region have doubled in value since the year 2000, driven in part by strong levels of inward investment into automotive manufacturing. 95% of North East pharmaceutical production is exported, with a value of £1.3 billion in 2014<sup>32</sup>. The process, chemicals and energy sector in the Tees Valley region is a major contributor to UK exports<sup>33</sup>.

Airports connect UK businesses with the global market place. Aviation connectivity supports export growth for manufacturing businesses. A survey of manufacturing businesses showed that the more export intensive a firm becomes, the more critical aviation becomes to their business. Over half of the most export-intensive businesses (with over 75% of their turnover coming from exports) reported that aviation was critical to their company<sup>34</sup>. HS2 will provide fast, frequent and reliable connections between businesses in the North East and Tees Valley and international airports, including Birmingham and Heathrow airports. Heathrow will be accessible via an easy interchange at the HS2 station at Old Oak Common in West London. Old Oak Common will be 2 hours and 10 minutes' journey time by HS2 services from Newcastle and 1 hour and 45 minutes from Darlington.

- <sup>1</sup> 'The Northern Powerhouse Independent Economic Review Workstream 2: City Region & Local Area Profiles – Final Report', SQW and Cambridge Econometrics on behalf of Transport for the North, May 2016.
- <sup>2</sup> 'The Northern Powerhouse Independent Economic Review Workstream 2: City Region & Local Area Profiles – Final Report', SQW and Cambridge Econometrics on behalf of Transport for the North, May 2016.
- <sup>3</sup> 'Tees Valley Strategic Economic Plan 2016-2026', Tees Valley Combined Authority.
- <sup>4</sup> 'North East Independent Economic Review Report', commissioned by North East LEP, April 2013.
- <sup>5</sup> 'The North East Strategic Economic Plan', North East LEP, January 2017.
- <sup>6</sup> 'Tees Valley Strategic Economic Plan 2016-2026', Tees Valley Combined Authority.
- <sup>7</sup> 'Northern Powerhouse Independent Economic Review: Workstream 1: Analysis of the pan-Northern Performance Gap – Final Report', SQW and Cambridge Econometrics, May 2016.
- <sup>8</sup> 'The Northern Powerhouse: One Agenda, One Economy, One North', HM Government & Transport for the North, 2015.
- <sup>9</sup> 'Changing Britain: HS2 Taking Root', HS2 Ltd., October 2016.
- <sup>10</sup> 'Changing Britain: HS2 Taking Root', HS2 Ltd., October 2016.
- <sup>11</sup> London is ranked first in the following 2016 rankings: AT Kearney 'Global Cities'; PWC 'Cities of Opportunity Index'.
- <sup>12</sup> 'Competitive Alternatives, 2016 edition: KPMG's guide to international business locations costs', KPMG.
- <sup>13</sup> CBRE, 2015 Q4 data.
- <sup>14</sup> 'North East Strategic Economic Plan', North East LEP, January 2017.
- <sup>15</sup> 'North East Strategic Economic Plan', North East LEP, January 2017.
- <sup>16</sup> 'Tees Valley Strategic Economic Plan 2016-2026', Tees Valley Combined Authority.
- <sup>17</sup> 'The great British brain drain: an analysis of migration to and from Newcastle', Centre for Cities, May 2017.
- <sup>18</sup> The North East Strategic Economic Plan Evidence Base, May 2016.
- <sup>19</sup> 'North East Strategic Economic Plan', North East LEP, January 2017.
- <sup>20</sup> 'Tees Valley Strategic Economic Plan 2016-2026', Tees Valley Combined Authority.
- <sup>21</sup> 'TechNation 2017', TechCity.
- <sup>22</sup> <http://www.sunderlandsoftwarecity.com/about-sunderland-software-city/>.
- <sup>23</sup> 'TechNation 2017', TechCity.
- <sup>24</sup> 'TechNation 2017', TechCity.
- <sup>25</sup> 'TechNation 2017', TechCity.
- <sup>26</sup> 'Venture capital funds sprout amid rush to invest in London tech', Financial Times, 5 February 2015.
- <sup>27</sup> European Digital City Index 2016. Available at: <https://digitalcityindex.eu/>.
- <sup>28</sup> 'North East Strategic Economic Plan', North East LEP, January 2017.
- <sup>29</sup> 'Tees Valley Strategic Economic Plan 2016-2026', Tees Valley Combined Authority.
- <sup>30</sup> <http://www.visitcountydurham.org/images/uploads/files/Visitor-Economy-Infographic-June-2017.pdf>.
- <sup>31</sup> 'Durham Tourism Management Plan 2016-2020', Visit County Durham, April 2016.
- <sup>32</sup> 'North East Strategic Economic Plan', North East LEP, January 2017.
- <sup>33</sup> 'Tees Valley Strategic Economic Plan 2016-2026', Tees Valley Combined Authority.
- <sup>34</sup> 'Written evidence from EEF – the manufacturers' organisation to the Airports Commission on Shortlisted options for a new runway', EEF, January 2015.

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