KEY PRESENTS

THIS IS THE LNER

The Past, Present and Future of the East Coast Main Line

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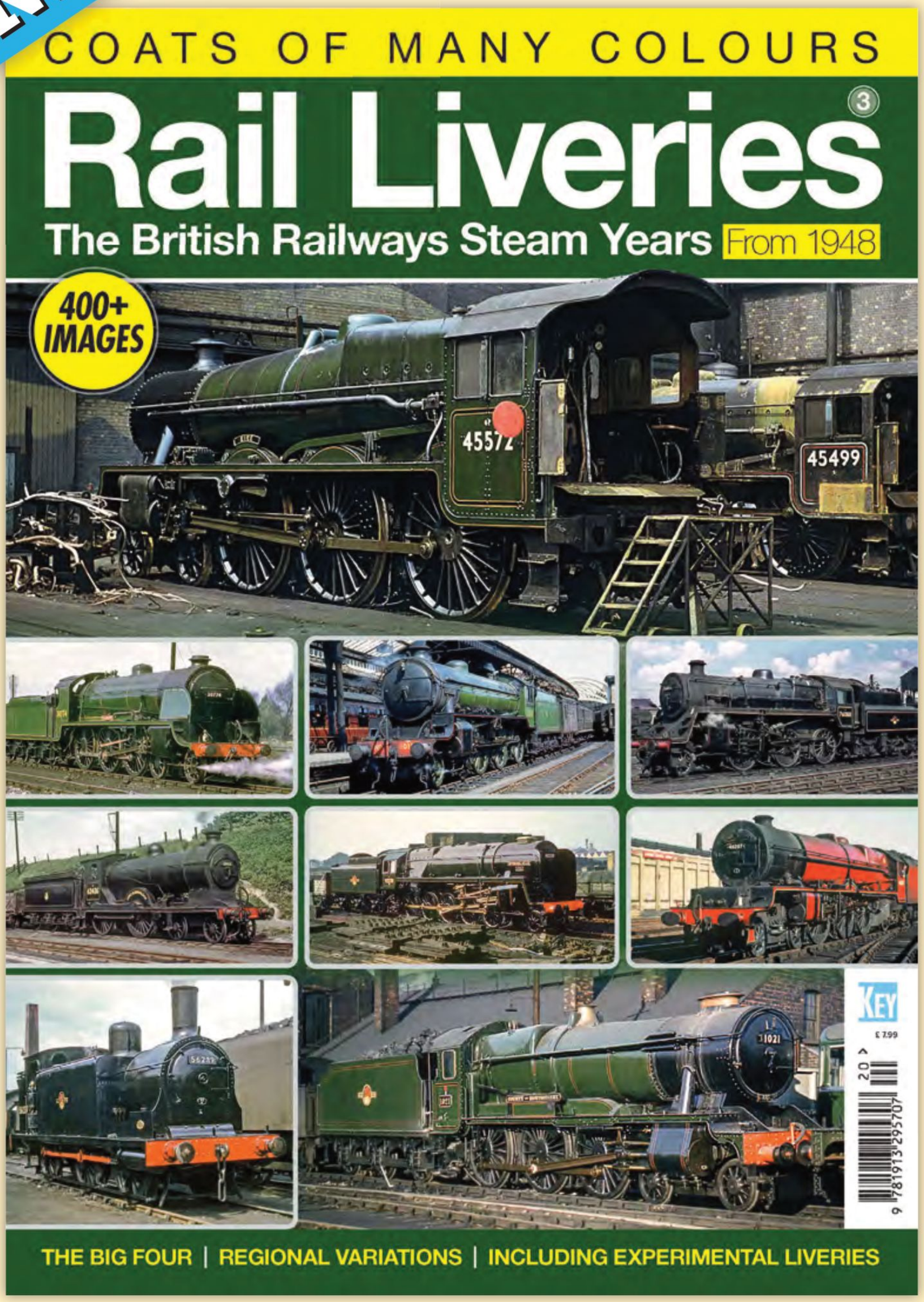

In the third volume of our popular pictorial guide to the UK's rail liveries we reflect on the beginning of nationalisation and the formation of British Railways – the bringing together of the nation's 'Big Four' railways with the handful of 'independent' lines that had escaped the grouping of 1923.

In 1948 the newly formed British Railways executive were faced with trying to provide a corporate image across a collection of some 20,000 steam locomotives in various states of repair. The fact that most were in shades of black or green should have helped but a corporate livery is about much more than the shade of paint, it's about badges, logos, font styles and lining. The Devil is in the detail.

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Foreword

The initials LNER conjure up so much. Probably more than anything else, they represent speed. But the original LNER which came into being nearly a century ago was a huge, diverse organisation.

This was one of the four great rail companies and provided far more than express trains which have passed into railway folklore. It was a huge freight company, particularly with the movement of coal and the LNER owned hotels and ships. Its tentacles stretched way beyond the East Coast Main Line and, of course any mention of LNER conjures up a vision of locomotives such as Flying Scotsman and Mallard and their eminent designer, Sir Nigel Gresley. The LNER was at the forefront of innovation, design and passenger amenities, carriages of that era reflected the art deco period with chrome fittings in abundance.

Nearly one hundred years later, ships, hotels and freight have either gone or passed to dedicated freight companies. What would the LNER's first chairman, William Whitelaw, whose name was emblazoned on an A4 Pacific locomotive, have thought if he was still around today? The current LNER also embodies style and speed but whereas in yesteryear there were only a few notable, crack expresses which hit the headlines, today's East Coast trains all have one thing in common – 125mph. For this reason, it is difficult for the present administration to offer anything out of the ordinary, because all the trains are uniform, offer the same excellent standard, and run at the same speed. Generally, there is a clockface or set timetable, and all towns and cities along the ECML have an infinitely and transformational service that would have been hard to believe when the 'Grouping' took place on January 1, 1923.

Fame and fortune – or should we say, misfortune, have played a key role in the life of the ECML after British Rail and the quarter century since privatisation came to the railways of Britain. We are now on the fifth operator and the second time that the government has been in charge. What this says about the franchising system is an interesting debate, but the fortunes of those private companies which have run it are so dependent on a clear crystal ball when it comes to forecasting future business models and also the state of the economy, none so more than has been with the virus epidemic which has hit the nation and taken its toll on people and businesses including rail companies.

'This is the LNER' looks at numerous aspects of these famous initials. These embrace the original company formed in 1923, known for its Apple Green express locomotives with varnished teak carriages, famous named trains, posters and its liking for Gill Sans lettering - and how this former LNER lives on today. Life after BR is covered with reviews of the companies which have come and gone on the East Coast Main Line since 1995 – all four of them - and then we come to the present LNER, basking in the history of its forebear, for LNER and its immediate predecessor, Virgin Trains East Coast, have been quick to capitalise on photo opportunities using legendary traction from past eras.

The present administration manages 11 stations from Peterborough in the south to Berwick in the north. Being government controlled has in no way stopped the enterprising management in expanding services with a vengeance, with more to come. Plus, LNER has a new toy. The Hitachi-built AT300 type train, commissioned by the government under its InterCity Express Programme (IEP), and dubbed Azuma by LNER is turning heads all along the ECML. These Azumas have already wiped out the long-lived IC125 HST trains, so admired by the public, and inroads are being made into the IC225 sets – all of this is included within the cover, as well as featuring the magnificent farewell to the HST tour and some of the more unusual workings. Find out more, and what's in store as we meet up with LNER's Director of Engineering.

The editor and publisher hope you find the publication of interest and entertaining. **LNER**

The Class 91s entered service on March 3, 1989. Bounds Green depot staff brought deserved praise on themselves when, to mark the impending 30th anniversary of the class, they turned out 91119 in original InterCity swallow livery which made its debut in these colours on November 13, 2018 working the 1D22 1633 King's Cross-Leeds. It is the hallmark of a good company not to forget its past and to celebrate it. Number 91119 powers north at Houndwood, Berwickshire, on April 22, 2019 in charge of the 1S18 1300 King's Cross-Edinburgh. (Peter J Robinson)

Highland beauty: Not long into its 580-mile journey, the 0755 HST (leading power car 43251 and rear 43300) heads south past the unspoilt countryside at Moy on April 13, 2019. This service, the longest operated by LNER, went over to Azuma operation on December 9, 2019. (Finbarr O'Neil)

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COVER IMAGE: LNER Azuma Class 801/1 801112 pilots its classmate 801103 as they approach Frinkley Lane Level Crossing, Hougham, Lincolnshire, working the 1A18 0845 Leeds to London King's Cross service on December 11, 2019. 65 of these stylish trains will form the backbone of the East Coast Main Line's services for the next 30 years or more. (Mike Brook)

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Introduction

It is perhaps surprising that it has taken nearly 25 years since the beginning of the current privatisation era for the operator of the East Coast services to latch onto the obvious, famous and synonymous with speed and innovation, LNER name, one of the 'Big Four' rail companies formed by the Grouping in 1923. Two other TOCs realised the potential in resurrecting famed names from the past, as nostalgia tends to forget the poorer aspects of operation but remembers the best. These are Southern Railway (branded as Southern) and Great Western Railway, operated by Govia Thameslink Railway and First Group respectively.

The original LNER, whilst far from the most affluent of the big four, led the way in traction and rolling stock innovations. Passengers could enjoy such luxuries as hairdressing salons, cinema cars and a variety of restaurant facilities including the popular Cambridge Buffet Car Express. It ran, arguably, the most famous service of all – The Flying Scotsman – with not only the most well-known steam locomotive of all – the A3 Pacific 4472 Flying Scotsman – but also from 1935 the streamlined express 'The Silver Jubilee,' followed in 1937 by 'The West Riding Ltd' and 'The Coronation.' These were powered by the ultimate in steam traction – Gresley's magnificent A4 Pacifics. Over 80 years later, today's LNER administration's new Azuma trainsets with their sleek fronts rocket along at 125mph, the same speed as A4 Mallard reached (126mph) on Stoke bank on July 3, 1938, except today, every LNER service runs at this speed and the East Coast route is utterly transformed from yesteryear.

East Coast Revolution

The step change in transforming trains on the East Coast Main Line and Great Western Main Line was occasioned by the increasing age of, primarily, the High Speed Train sets which date from 1976 (on the Western) and 1978 (on

RIGHT: **Hitachi organised a press visit to officially open its Newton Aycliffe assembly plant on September 3, 2015. Spotlighted, literally, was one of the brand-new driving cars from set 800002, destined for First Great Western. The set carried this startling livery application whilst under test, finally receiving First Great Western's green house colours at the North Pole depot.** (Richard Tuplin) BELOW: **Modern efficiency: This was the clean production line in Hitachi's £82 million Newton Aycliffe factory on September 3, 2015. Variations of the AT300 type were under assembly for both First Great Western (Class 800), and Virgin Trains East Coast (Class 800 and 801). Class 385 units destined for ScotRail can also be spotted.** (Richard Tuplin)

the Eastern). The East Coast's IC225s, the Class 91/Mk.4 sets, were also past their 25th birthday and replacement of both would be required in the foreseeable future.

So, was born the InterCity Express Programme (IEP). This was conceived in 2005 and in 2007, three shortlisted bidders were invited by the government to tender, these being Express Rail Alliance (comprising Siemens, Angel Trains, Babcock & Brown and Bombardier), Hitachi Europe and Alstom-Barclays Rail Group. Alstom withdrew the following year. A new bidder came on the scene just before tenders closed, this being Agility Trains comprising Barclays, John Laing and Hitachi. It was Agility that won the order (worth £4.5bn), for this Hitachi AT300 type train, the order being placed on February 12, 2009. The contract included a maintenance deal of 27 1/2 years duration. There would be a mixture of five-coach sets and nine-coach sets, some all electric, some bimodal and some all diesel (for the GWR). The latter were later dropped on environmental and economic reasons, instead to be all electric. These were amended again to bimodal units. Delays affecting the electrification of the Great Western Main Line had an effect on the types offered for the GWR.

For the East Coast (Virgin Trains East Coast, later LNER), there are in place orders for 65 trainsets. These comprise:

13 x nine-coach bimodal (Class 800/1)
10 x five-coach bimodal (Class 800/2)
12 x five-coach all-electric (Class 801/1)
30 x nine-coach all-electric (Class 801/2)

These totals include a later order (worth £1.2bn) placed on July 18, 2013 which was an option for the 30 Class 801/2 sets, these to replace the Class 91/Mk.4 sets (IC225s). The total number of carriages for the East Coast services total 497.

More Azumas will be required by LNER to embrace all its expansion and frequency aspirations.

Logo Reflecting Yesteryear

A nice touch to bygone days is the LNER logo of today's operator. It would have been too easy just to copy the original LNER logo, but the new design is similar, but markedly different to that of nearly 100 years ago. For instance, the 'N' and 'E' are bolden, just as in the original. The original ➘

was set in a lozenge whereas the current logo has distinctive extended verticals on the 'N', setting it apart. It was designed by a specialist company under a contract with the government's (DfT) Operator of Last Resort. LNER tweaked it and chose the colour. It was felt the finished product had an art deco feel to it – so reminiscent of the original LNER.

LNER is the fifth operator since privatisation. Previous private operators have struggled to keep up with the premium payments to the Government. There have been two instances where the government has stepped in with its Operator of Last Resort when incumbents were obliged to 'hand in the keys.' LNER is owned by the government. It took over from Virgin Trains East Coast (owned 90% by Stagecoach and 10% by Virgin) when it could no longer keep up the payments.

It was in May 2018 when Virgin relinquished its hold and LNER was born. The then secretary of state for transport, Chris Grayling, announced the news to the House of Commons on May 16 of that year.

LNER to Embrace Great Northern

The Statement to the House referred to "... we will start with the launch of the new, long-term brand for the East Coast Mainline through the recreation of one of Britain's iconic rail brands, the London North Eastern Railway (LNER)".

For once, the use of that hackneyed word 'iconic' was correct.

The statement contained a further surprise – the possibility of embracing the Great Northern services, currently operated by Govia Thameslink Railway, into the LNER empire. The GTR franchise is up for renewal in 2021. Whether operating suburban trains with long-distance high-speed trains makes for good bedfellows is an interesting discussion, for it would mean that LNER services would reach Cambridge and King's Lynn.

Until 2025

The announcement was made with the intention that the new organisation would run the East Coast for a two-year period pending the introduction of a public-private partnership. This would be a further innovation differing from past practice, because the Conservative government philosophy has always preferred private enterprise to nationalised industries. Whilst many franchises worked well, e.g., C2C and Chiltern Railways to quote just two, it was the dreadful poor service of others which riled the public, encouraging many calls (from both commuters and the Labour opposition) for the railways to be nationalised once more. Those voices tended to forget that Network Rail was already in effect nationalised, as its spending comes under the Treasury, and they also conveniently forgot the staggering investment sums which the private companies had brought into Britain's railways since 1995.

To bring the story up to date, another revelation was made in July 2019 that, according to filings made to European authorities, the Department of Transport was to make a direct award to LNER to run services beyond the initial intended date of June 28, 2020 until 2025. Nationalised rail service was back in fashion!

Although there are no press releases relating to this, a Department for Transport spokesman reported: "The current contract with LNER expires on June 28, 2020. This update notifies the market that our intention is to enter into a new direct award contract with LNER. This will ensure a smooth transition for passengers and staff into the East Coast Partnership and means the recommendations of the Williams Rail Review can be implemented as quickly as possible."

The DfT's extension given to LNER is unique. It is the first time that an extension to a contract which is known as a 'Direct Award Prior Information Notice' has been issued to a government-controlled franchise in the post privatisation era.

BELOW: **Hitachi built three pre-production AT300s and 10 production sets at Kasado, Japan, prior to the Newton Aycliffe factory assembling the remaining trains. Bodyshells were shipped into Middlesbrough Docks and road hauled to the factory. The initial testing of the AT300 type took place, as with all new traction, on the Old Dalby test track in Nottinghamshire. There then followed nocturnal testing on the East Coast Main Line between Peterborough and Grantham. For this, GB Railfreight specially fitted Class 66/7 66751 with the required coupling and it was solely rostered for the frequent duty of hauling 800001 (one of the intended GWR units) from Old Dalby to Peterborough and back for its testing programme. In this view, the 66/7 arrives at Peterborough at 2205 with the 5E98 Old Dalby-Tallington prior to overnight testing to Grantham on May 15, 2015.** (John Hennis)

ABOVE: **When LNER took over from Virgin Trains East Coast, it was quick to start promoting its new product and all along the route publicised the Azumas. Within a week of taking over from Virgin Trains, LNER provided this unnumbered Driving Pantograph Trailer Second (DPTS) Azuma car for display and promotion at The Discovery Museum in Newcastle Upon Tyne. In reality, it was 800101. It was pictured on June 29, 2018 during The Great Exhibition of the North which also featured Stephenson's Rocket. LNER's final livery was still under wraps at this stage, hence this driving car carried interim branding, with just a hint of what was to come.** (Jeff Mckever)

Naming Rights

LNER has certainly hit the deck flying. Since coming into being, the company has already dramatically improved the through services to and from the capital to both Harrogate and Lincoln.

Its new trains, many of which are bi modal, are new in service to LNER and not Virgin, for whilst a handful were delivered in Virgin Trains East Coast days, none entered service with the previous franchisee.

The marketing name of these new Hitachi-built trainsets is Azuma. This name came about as a result of a competition aimed at LNER employees across the business which, quoting LNER's Media Manager, Richard Salkeld, was an excellent move because it embraced the employees who bought into it and felt they were part of the process. A number of names were considered and LNER wanted a Japanese theme. Names were carefully checked in case they meant, or had, other connotations! Whereas the HSTs were branded as InterCity 125s and the Class 91/Mk.4 trailers as IC225s, these were relatively self-explanatory. With the name 'Azuma' the difference is that its meaning has to be explained! As we now know, because we have been told so often, Azuma means 'East' in Japanese. With many station indicators showing that the service is formed of an Azuma, coupled with station announcements, the brand name will soon be entwined into everyday railway parlance.

The entry into service of a new fleet, whilst inevitably bringing teething issues, does allow a new look, new brand and a general uplift in public perception. With the same management in place as run by Virgin Trains East Coast - which attained a high passenger satisfaction threshold - there is both continuity of a good service, whilst opening the doors to further expansion and new markets.

Whilst its formation was not planned or intended, LNER has come on the scene by fate and misfortune, occasioned by the previous franchisee running into financial difficulties. It could not have entered the fray at a better time – new trains, a stylish marketing brand and image, smart and distinctive staff and a willingness to expand to improve seating capacity and to increase services to both time-honoured stations, but also some off of the beaten East Coast Main Line.

Since the new order took over, already two destinations have seen a huge increase in trains serving them and another in the North East is set to follow. There are several others crying out for a direct service to and from 'The Cross.'

Politicians infuriatingly are frequently seen and heard as saying they want 'a better service' but never explain just what 'better' means. LNER is where they should be looking, as the benchmark has been set on the ECML.

Railway historians, devotees of the original LNER, and just a few people who can actually remember the London & North Eastern Railway, hold this famous company in high esteem. The present administration has started well in continuing the tradition set by the first LNER, particularly improvements to passengers needs and services, and the omens look really good for the next five years at least. Furthermore, the extension granted to LNER to run to 2025 will now embrace an opportunity to publicise and celebrate its achievements, whilst paying homage to its forebear. The centenary of the formation of the London & North Eastern Railway falls in 2023 and already discussions have taken place with the LNER Coach Association, based on the North Yorkshire Moors Railway, who is keen to celebrate this milestone. The LNER's most celebrated locomotive, Flying Scotsman, also attains its 100th birthday in February 2023. LNER

In the Beginning

For a quarter of a century, the London North Eastern Railway set new standards with speed, passenger amenities and freight traffic. Its streamlined trains with Sir Nigel Gresley's legendary A4 Pacifics captured the hearts of the British public, not forgetting its own celebrity locomotives, *Flying Scotsman* and world record holder for steam traction, *Mallard*.

January 1, 1923 and a wholescale revolution of the railways of Great Britain was underway. The London & North Eastern Railway (LNER) was born. It was one of four main companies formed from the hundreds of private railways, some large and others only a few miles in length, when the 1921 Railways Act came into being.

The Grouping had come about because during World War One, the government had controlled the railways by means of a Railway Executive, formed of general managers and chaired by the London & South Western Railway GM, Sir Herbert Walker. Such was its success in managing the railways during the conflict that the Select Committee on Transport concluded there was little point returning to the pre-war way of operating and that the unification of the entire operation would be desirable. Sir Eric Geddes, formerly a director of the North Eastern Railway was appointed by the Prime Minister, Lloyd George, to the first-time position of minister of transport. This led to the Railways Act advocating there were to be four main railway companies.

Making up the new LNER were six main companies: Great Northern Railway (GNR), North Eastern Railway (NER), Hull & Barnsley Railway (H&BR), Great Central Railway (GCR), North British Railway (NBR) and the Great North of Scotland Railway (GNoSR). Before the act came into being, in 1922, the Hull & Barnsley was absorbed into its long-time competitor, the NER.

With one stroke, the new LNER was responsible for operating the entire line from London to Edinburgh – and beyond to Aberdeen and Glasgow. Three of the former constituent companies, GNR, NER and NBR, had successfully been operating the London to Edinburgh route by means of a collaboration with dedicated stock – East Coast Joint Stock. The fact that the three constituent companies which had worked together successfully in running the through services were now under 'one roof' was almost a seamless transition.

There had been considerable debate late into 1922 as to the name for the new company. Two had become front runners – North East Railway Company and Great North Railway Company. However, the final choice was London & North Eastern Railway. Only wagon lettering was abbreviated to 'NE' which at least permitted all 120,000 of the North Eastern Railway's fleet to remain as they were. Later, L&NER was abbreviated to LNER.

During the next 25 years, the huge LNER was to experience highs and lows. In the first couple of years, coal exports took a drastic downturn. When formed the LNER moved 102 million tons of coal. By 1925 the figure was 87 million.

One bright light was the increase in freight on the former Great Eastern territory, thanks in the main to the growth of the sugar beet industry. By 1925, freight business was up by 20% compared to the pre-war figure and the LNER directors reacted by building a new marshalling yard at Whitemoor, near March in Cambridgeshire.

Two major public events took place early on in the LNER era. In 1924, the British Empire

BELOW: **The first A4 Pacific designed by Nigel Gresley, 2509 Silver Link, enters Darlington station on June 27, 1937 with the Up 'Silver Jubilee.' This was one of the elite streamlined trains of the LNER. The articulated carriages can clearly be seen on the first 'twin' set. Gresley was keen on articulated carriages as considerable weight was saved. This was applied to express stock as well as suburban carriage sets, such as the 'Quad Art' sets used on London GN suburban services. Carriages from the pre-grouping North Eastern Railway, including clerestory examples, can be seen in the background. (WB Greenfield,** North Eastern Locomotive Group Collection)

ABOVE: **Here is Gresley's unique W1 4-6-4 locomotive, 10000. It was built in 1929 mainly at Darlington Works, with components constructed elsewhere, notably Yarrow & Company, Glasgow, who built ships and boilers. It had a Yarrow high pressure water-tube boiler with a working pressure of 450 pounds per square inch. Because of the secrecy in which it was built, it was nick-named the 'hush hush.' The picture shows 10000 in charge of the Up 'Queen of Scots' Pullman, formed of the K class Pullman stock at Eryholme, south of Darlington, on June 21, 1930. Pullman trains were an integral part of LNER operations and lasted through to the BR era, ceasing on the East Coast in March 1978. The W1 locomotive was rebuilt in 1936 at Doncaster Works with a conventional boiler. Numbered 60700 by British Railways upon nationalisation, it was withdrawn on June 1, 1959 and scrapped at Doncaster. (William Rodgerson,** JW Armstrong Trust)

Exhibition was held at Wembley at which was exhibited a gleaming A1 Pacific 4472 Flying Scotsman. Then in 1925, the railways' centenary was celebrated. This included a procession along the former Stockton & Darlington Railway – a cavalcade of locomotives and rolling stock from all of the 'Big Four.' One development from this huge event was the decision to form a LNER museum, initially planned for Darlington, but eventually housed at York on the site of the original station within the city walls. York Railway Museum opened in 1928.

Another nadir was the General Strike of 1926. Railwaymen struck in sympathy with the miners and the LNER suffered severe financial repercussions. To illustrate this, in the first five years of the LNER's existence, net income was 1923 - £14,047,221; 1924 - £11,717, 667; 1925 - £10,129,069 and by 1926 it had dropped to £4,636,878.

Coal supply became scarce due to the miners' strike and the LNER had to resort to buying imports – of dubious quality – to get by.

There were several years of depression which followed and in 1928 all LNER staff from directors to workers agreed to take a 2.5% reduction in salaries and wages until 1930.

During these lean years, there had been one memorable occasion, that of the first non-stop run from London King's Cross to Edinburgh in May 1928. The LNER used its by now celebrity A1 Flying Scotsman, adding even more to its popularity and legend.

Golden Years

The period from 1934 to 1939 was the pinnacle of the LNER's achievements. It had introduced the streamlined 'Coronation' in 1935 to celebrate the 25 years of King George V's reign. Chief mechanical engineer Nigel Gresley had introduced his masterpiece, the ultimate in steam traction, the A4 Pacifics. The first four were adorned in silver and grey to match the coaching stock. It was a showpiece train, to be followed in 1937 by two more, the 'West Riding Limited' and the 'Silver Jubilee.'

The LNER was the first to run expresses at an average of start to stop of 70mph. Then there was the smashing of the world speed record for steam traction set by A4 Mallard on July 3, 1938. All of these developments catapulted the LNER to the top of the public's esteem of the railways.

Infrastructure improvements during the 1930s included widening the East Coast Main Line north of York to Northallerton, the opening of new marshalling yards at Mottram and Hull and a new fish dock at Grimsby.

In March 1939, Sir Ronald Matthews took over as chairman, his name, too, adorning an A4 Pacific, 4500 which had originally been named Garganey.

Rolling Stock

Generally regarded as being the finest-looking carriages in the country, the basic outline of Gresley's gangwayed stock stood the test of time for decades, starting from the eminent designer's days when he was with the Great Northern Railway. The elliptical roofs and varnished teak livery added to the finished product.

In 1935 the introduction of the streamlined carriages for the 'Coronation' service introduced new levels of luxury. The carriages were articulated, with two twins and, later, one triplet. This made a saving in weight of 10% on traditional stock, quite significant when running a high speed service between Newcastle and London in four hours.

When Edward Thompson succeeded Sir Nigel Gresley (who had been knighted in 1941 and who died in office in 1946) he was inevitably compared to his predecessor, unfavourably in some quarters. Thompson did produce some excellent locomotive designs, top of which has to be the B1 4-6-0.

In 1945, he introduced the more austere design of carriages, particularly internally. They, however, still looked the part and in the main were wooden framed with metal cladding, painted to look like wood, i.e., scumbled. Their 'trademark' was the oval windows at the end of each carriage.

The War Years

The government took control of the railways two days before the outbreak of World War Two on September 2, 1939. The railways of Britain took a battering during the conflict which lasted half as long as the 'war to end all wars.' These were often the target of enemy bombing and the LNER lost thousands of staff. Women played a key role in replacing men who were engaged with fighting the enemy, these ladies often being found in the motive power depots helping to prepare locomotives. The LNER coped well during this traumatic time, aided by the high standard of maintenance and equipment which had been built up prior to the outbreak.

With Labour assuming government control in 1945, it easily introduced its 1947 Transport Act, so nationalising the complete railway system. The LNER came to an end on December 31, 1947, its last board meeting being held on March 5, 1948 presided over by Sir Ronald Matthews.

In 25 years, this company had seen and endured colossal changes and suffered enormously, but achieved great successes. It is the LNER's legacy that it is regarded as one of the all-time great railway companies. LNER

GNER

Great North Eastern Railway

Several different train operating companies – TOCs – have held franchises on the East Coast Main Line since privatisation. In 1996 GNER were handed the baton.

BELOW: **Sir Kenneth Grange's stylish design for the High Speed Train power car is displayed to full advantage – power and beauty combined. This is an attribute which the original LNER's chief mechanical engineer, Sir Nigel Gresley and his team accomplished with aplomb. Add to that one of the most acclaimed liveries of a privatised rail company and a superb picture is guaranteed. Screaming north past Chilton, Ferryhill, is power car 43109 pushing the 0955 Aberdeen to King's Cross on January 27, 2007. The leading power car was 43006.** (Peter J Robinson)

Privatisation of the East Coast Main Line got off to a spectacular start with the first franchise being awarded to Sea Containers-owned Great North Eastern Railway (GNER). Sea Containers, headed by the ebullient James Sherwood, ran the prestigious VSOE Pullman and hence the contract to run East Coast services came with a high expectation, built on a proven track record for quality travel. Start date was April 28, 1996. Termination date (franchise removed by the government) was December 8, 2007.

Of course, East Coast stock were not Pullman carriages, but the incumbent High Speed Trains (HSTs) and the Class 91/Mk.4 stock. GNER's entrance was a visual treat – a much-admired blue with red stripe colour scheme, with the Mk.4 carriages each having a large crest placed centrally emblazoned with 'Route of The Flying Scotsman'. This really was the epitome of style.

Indeed, there was praise for the GNER name in that, like the present LNER, there was more than a nod to its ancestry. Also, like LNER, the 'N' and 'E' were bolden. The blue and red reflected the former Great Eastern Railway colours. In addition, GNER also used eight Class 373/2 'North of London' Eurostar sets. These ill-fated units had originally been intended to work from stations in the UK, through the Channel Tunnel to Paris – an operational exercise which never came to fruition – except for freight. The Eurostar units were only deployed on Leeds and York services due to gauging issues north of York. The use of Eurostars was a five-year reign, from May 2000 to December 2005.

Finally, GNER had a 'one-off' in the form of the unique, Brush-built Class 89 89001. Dubbed 'The Badger' on account of its sleek, dropped nose, this Co-Co had been built as a demonstrator by Brush Traction in the hope of winning a fleet order for the ECML. The choice went to GEC Alstom with its Bo-Bo Class 91 ➘

ABOVE: **Passengers from Edinburgh on GNER's 1740 Edinburgh-Newcastle service had more for their money on September 18, 2004 as it took the long way around due to engineering work. The HST, formed with power cars 43118 and 43115, power past Slateford in the Edinburgh suburbs heading towards Carstairs, thence the West Coast Main Line up to Carlisle and then the Tyne Valley line to Newcastle. The line veering off to the right is the connection to the Edinburgh 'Suburban' line. (Ian Lothian)** LEFT: **This one-off Class 89 demonstrator was built by Brush Traction. Hopes that it would result in a production order to power East Coast expresses were dashed when the decision went to the Alstom/Crewe Works assembled Class 91. GNER took the demonstrator under its wing and it was frequently used on Leeds-King's Cross services. A serious failure side-lined the 'Badger', as it was known, seen here at Wabtec's Doncaster plant on July 26, 2003. 89001 survived in the preservation sector, hopefully to run on the East Coast Main Line again one day.** (Richard Tuplin)

"The government made it clear that rail operators that fall into financial difficulty should expect to surrender the franchise and not receive financial support. To do otherwise could set the precedent that we are willing to bail out operators at extra cost to the taxpayer."

design. 89001 was acquired by GNER and began service – to Leeds and Bradford – in March 1997. It was widely liked by both crews and the rail fraternity, but was withdrawn after a serious failure in 2001 when water ingressed into some of its traction motors. The cost of its repair could not be justified and it passed to the preservation sector.

GNER contracted with English Welsh & Scottish Railway (EWS) to provide 'Thunderbird' locomotives at strategic locations to assist with failures and for providing power when services had to be diverted. After Class 47s were initially used, the 'Thunderbird' duties settled down to the 100mph Class 67. There was also a hired-in Class 90, 90026, which EWS painted in GNER colours. However, it was often away on duties on the West Coast Main Line rather than deputising for Class 91s.

Downfall of a Notable Operator

In December 2006, the Department of Transport intervened after a troubled year in which GNER's financial position was aired in public and it stripped the East Coast operator of the franchise, a sad end to such an enterprising company which clearly strived to put quality first. GNER was asked to continue running the service until a new operator could be found. This news came in August 2007 when National Express won the right to run East Coast services, beating rival bidders Virgin Rail Group, Arriva and First Group.

GNER's tenure came to an end when the 2030 London King's Cross-Newcastle service left on December 8, 2007. To this day, GNER is remembered with affection by most users of East Coast services.

Robert Mckenzie, chief executive of Sea Containers and chairman of GNER, was reported as saying the rail company did not breach its franchise agreement but would not be able to meet payments that were due to start in May. "A renegotiation of the contract would have been preferred, but that was not available," Mr Mackenzie concluded. The terms of the franchise would have required the company to see a 10% rise in revenue the previous year. The figure in reality was only 3%. GNER put this down to higher than planned electricity prices, a reduction in compensation payments from Network Rail, and reduced passenger loadings due to terrorist incidents in the capital on July 5, 2005.

The then transport secretary, Douglas Alexander, reported: "The government made it clear that rail operators that fall into financial difficulty should expect to surrender the franchise and not receive financial support. To do otherwise could set the precedent that we are willing to bail out operators at extra cost to the taxpayer."

Ironically at the same time GNER was relieved of its franchise for failing to be able to meet its £1.3bn premium payment obligations to the government, the Department for Transport gave £1.4bn to Virgin West Coast to help offset higher track changes. Virgin, (actually Stagecoach & Virgin) within a short space of time would also take over running the East Coast Main Line.

So, the East Coast's first privatised operation faltered because the franchisee got its sums wrong and could not keep up the required payments. Little did anyone know that this was to set a pattern for many years to come. LNER

ABOVE: **Illustrating the two types of power on the East Coast Main Line which held sway for over three decades, four in the case of the HST, is this fortuitous passing portrait depicting a GNER northbound York to Edinburgh service, headed by Class 91 91010, passing the 0955 Aberdeen to York HST on March 13, 2001. The location is Aycliffe, between Darlington and Durham. The ECML was blocked between York and Doncaster in the aftermath of the Heck accident.** (Peter J Robinson) **Left: The Durham coast line has often been used as one of the main diversionary routes when the ECML is closed for engineering work. The route from Newcastle is via Sunderland, West Hartlepool, Norton East to South curve, Eaglescliffe and Northallerton to gain the ECML. Rail express systems (Res) liveried Class 47/7 47772 was on 'drag' duty on April 12, 2006, pictured hauling the 1E11 1300 Glasgow to King's Cross and diverted via the Durham coast line on April 12, 1998 at Hawthorn Dene. The Class 91 91030 was dead in tow, of course, and would take over at York. Such diversions often took place over the Easter holiday to enable engineering work on the electrified main line between Newcastle and Northallerton. (Peter J Robinson)** BELOW: **The Northumberland coast line is one of the most attractive parts of the East Coast Main Line – and duly justifies the name of this premier route from London to Scotland. The West Coast Main Line only has a short stretch next to the sea at Hest Bank. Making its way north on time and having just crossed over the Border two miles earlier, the 1245 King's Cross-Glasgow, powered by Class 91 91026, hurries past Lamberton.** (Peter J Robinson)

National Express East Coast

After GNER's operation of the East Coat Main Line services ended, the government awarded the franchise to National Express.

National Express East Coast, a subsidiary of the Birmingham-based National Express Group, learned on August 14, 2007 that it was to become the second franchisee to operate the East Coast Main Line services, starting on December 9, 2007 and running until March 31, 2015. A condition imposed saw the final 17 months dependent upon operating targets being met.

Somewhat ominously, in view of the failed GNER operation which could not keep up payments amounting to £1.3 billion, the premium offered over the length of the franchise by NXEC was £1.4bn.

As part of its commitment and winning the ECML franchise, the company was intending to spend £7.4 million on station upgrades, improve performance so that nine out of ten trains ran to time (an optimistic vision considering so many external factors affect train performance), and reducing its delay minutes by 29% over the length of the term. By 2010, NXEC wished to have a Public Performance Measure (PPM) of 90.1% which is the measure of whether trains arrived either on time or up to ten minutes behind schedule.

As regards improving the train service, there would be a new two-hourly King's Cross-Lincoln service and a similar frequency to York would commence, calling at intermediate stations. This recalled the former Deltic-hauled semi-fast service during the late 1970s and early 1980s.

Of interest, the company would retain full ↘

ABOVE: **Curiously, Class 91 91111 was the only one in the fleet to be painted in National Express East Coast house colours. All the HSTs were so adorned, but none of the Mk.4 trailers – a strange omission. Displaying its unique finery, 91111 wheels the 1100 King's Cross-Edinburgh past Horn Burn, Reston, on March 21, 2009. The East Coast Main Line has just left the Berwickshire coast at Burnmouth and turned inland at this point. There are calls to re-open the station at Reston, the original of which succumbed to Dr Beeching on May 4, 1964. (Peter J Robinson)**

LEFT: **Climbing up to cross the Forth Bridge at Jamestown on April 19, 2008 is the 1245 Aberdeen-King's Cross, with power cars 43238 (leading) and 43306 (rear). The line which can be seen on the right running beneath the main line is the Rosyth branch which joins the main line at Inverkeithing through which the HST has just passed. National Express East Coast was quite content to 'make do' with the basic GNER livery, with the red stripe, now white, and the small letters 'national express' shown in grey and red. To operate the prestigious East Coast Main Line services with so little visual publicity was a strange business decision, unless the company was conscious of the cost. (Ian Lothian)**

BELOW: **Engineering work was taking place north of Newcastle on September 5, 2009, necessitating diversion along the Tyne Valley line to Carlisle and the West Coast Main Line to Carstairs, thence to Edinburgh. The driver of NXEC-liveried power car 43307 which was leading an Edinburgh-London King's Cross waves to his colleague in power car 43313 heading west towards Carlisle with an Edinburgh bound service. The two HSTs are passing Blaydon, 51/2 miles from Newcastle. The distinctive North Eastern Railway design N2 signal box had 27 levers. Blaydon was at one time a busy location and even had its own locomotive depot, coded 52C and which closed for good on March 15, 1965.** (Robert Pritchard)

ABOVE: **Throughout the short 'reign' of NXEC, this was the order of the day, livery-wise, for the Class 91/Mk.4 fleet with the exception of 91111. Here is 91118 with a modest lower case 'national express' on the bodyside stripe racing through the Scottish borders passing Houndwood with the 0900 King's Cross-Glasgow on October 16, 2008. The road on the left is the A1. (Peter J Robinson)** RIGHT: **East Coast services were having to go the long way around – via the Tyne Valley and West Coast Main Line – on October 17, 2009 as the route between Newcastle and Edinburgh was closed for engineering work. National Express East Coast's 1F61 0855 Edinburgh-Newcastle was powering past Wandel to the north of Abington when caught by the camera. Leading was power car 43313, with 43367 bringing up the rear. To reduce the number of loco-hauled diversions and the number of 'Thunderbird' hired-in locomotives, HSTs were generally concentrated on services in the northern part of the country when engineering diversion were planned, as seen here.** (Ian Lothian). BELOW: **With National Express East Coast taking over the franchise on December 9, 2007, this was the first HST to be outshopped in the NXEC livery. Powering south three days later, this was a service from Leeds, headed by power car 43300, and is passing Helpston Junction, five miles north of Peterborough. The lines in the foreground are the 'Midland' lines which diverge from the ECML after Helpston and head west through Stamford to Leicester.** (John Rudd)

dining facilities on 87 weekday services.

At the time of the award, National Express East Coast indicated that it might well raise unregulated fares by an average of 2.1% above inflation.

Ominous Signs

After only two years' operating ECML services, National Express East Coast was suffering poor results – the recession was taking its toll and passengers numbers had dropped. In the first three months of 2009, revenue grew by only 3% - this compared to 9% over the whole of 2008. The company was unable to fulfil its commitment to pay the government the premiums it had signed up to. Talks were held with the government to see if the contract could be renegotiated, but the request was declined. Although no premium payments had been missed, it was clear to NXEC it could not continue in the prevailing economic climate.

Just before the government announced it would strip NXEC of the right to run East Coast services, National Express Group's Chief Executive, Richard Bowker, formerly of the Strategic Railway Authority, revealed he was stepping down from his position.

On July 1, 2009 it was confirmed that the Government was taking over control of the East Coast, with NXEC 'handing back the keys.' Labour's secretary of state for transport, Lord Adonis, who had made the announcement of stripping NXEC of the franchise, also later reported: "It is simply unacceptable to reap the benefits of contracts when times are good, only to walk away from them when times become more challenging".

The franchise would be operated by the government controlled Directly Operated Railways which would trade as East Coast. Ms Elaine Holt, Chief Executive of DOR, would head the new enterprise using experts from the railway industry.

National Express East Coast came to an end on November 13, 2009.

The repercussion of NXEC losing the franchise did not end there. Because National Express operated two other franchises – C2C and East Anglia – this raised the matter as to whether National Express should forfeit these two franchises as well as it had defaulted on the East Coast one. As it was, Lord Adonis did not extend the East Anglia operation for National Express when the time arrived for an extension to be considered.

So, for the second time since the operation of the East Coast Main Line had been placed in the hands of the private sector, a company had managed to get its sums wrong, aided in large measure by the recession.

It highlighted how difficult it was for a rail company to financially plan years ahead during the life of a franchise when there was so much which directly impacted on its financial performance. LNER

East Coast

With GNER and National Express East Coast both having been stripped of the East Coat franchise, the government brought things 'in house'.

BELOW: **It was a glorious day for photographing East Coast trains on September 29, 2011. This HST was working a northbound service when it hove into view across a field at Grove Road, near Retford. Such is the wonder of modern technology that it can be revealed that the leading power car was 43320! Sadly, the rear one remains anonymous.** (Richard Tuplin)

When Lord Adonis, secretary of State for Transport, stripped National Express East Coast of its East Coast franchise in 2009, this was not the first time the government had taken back an ailing franchise and operated it under government control, i.e. by the government's Directly Operated Railways. This was a business made up of experienced railway personnel with significant experience in running the railway.

Elaine Holt at the helm of Directly Operated Railways to which she was appointed chairman in 2009 took over East Coast (the trading name of the East Coast Main Line Company) Mrs Holt was determined to improve services for the public when it took over from National Express on November 14, 2009. Managing director of East Coast, under DOR, was Karen Boswell. It had been the intention of the government to place the franchise back in the private sector by December 2013 but, curiously, and a foretaste of the future, the secretary of state for transport revealed in March 2013 that this would not happen until February 2015. So, East Coast would be run by Directly Operated Railways for a remarkable five and a quarter years – quite a fascinating decision from a government averse to nationalised industries and committed to the private sector.

It was not all plain sailing – the punctuality of East Coast services in 2010 was poor – indeed, the Rail Regulator pointed out that during the first three months of 2010, the previous operator, National Express had attained an average punctuality figure of 88.6% whereas East Coast were below this at 86%. East Coast's MD reckoned 60% of the delays were due to infrastructure problems including the growing incidents of theft of copper wires. She also cited the oft-quoted matter of train door problems, occasioned by eliminating the specialist contractor by the ➘

ABOVE: **The practice of advertising on trains is considered demeaning by some rail followers, but the commercial aspect is always to the fore in today's society! Resplendent in a SKY 1 publicity livery, 91125 hurries the 1S15 1130 King's Cross to Edinburgh past Brafferton, just north of Darlington, on March 10, 2014.** (Peter J Robinson) LEFT: **Despite having an uninspiring livery for the duration of its tenure of the East Coast Main Line services, the company did provide some colourful variation to the monotony with two advertising liveries. This East Coast IC225 set certainly turned heads – a complete rake adorned in 'Skyfall' livery – advertising the availability of the 2012 James Bond film of the same name available from then on DVD and Blu-ray. The Bounds Green set selected was paired with Class 91 91107 deliberately renumbered back to its original identity of 91007 for the occasion. This film was the largest grossing Bond film of the 23 of the series to that date, taking over £1bn worldwide. This location is Ricknall Grange, Aycliffe near Ferryhill. The picture taken on February 16, 2013 shows the 1Z07 0833 King's Cross-Edinburgh 'Bondex' special conveying Eon Productions film company officials and actors. 91007 has clearly had attention given to its bogies.** (Peter J Robinson) BELOW: **A dilemma – when to press the shutter? This fortunate momentary gathering of National Express-operated trains took place at Hurn Road bridge, three miles north of Peterborough on May 29, 2012. On the left, 91124, still to be adorned in East Coast grey, propels its southbound service, whilst next to it, 91122 heads north, overtaking 91120 on the 'Midland' line. This line is wired for 25KV as far as Helpston Jn where it will cross over to the ECML, and follow 91132 northwards.** (John Hennis)

ABOVE: **Another welcome development by East Coast from the all-pervading grey was the unveiling of pioneer Class 91 91101 in purple with Flying Scotsman branding. This took place on May 23, 2011 at the start of the new timetable and the introduction of the four-hour service from Edinburgh to London. It was also the start of a long reign of celebrity status for 91101 as it continued to carry 'Scotsman' branding when Virgin Trains East Coast re-liveried the loco in the Virgin house colours – and, commendably, LNER has also retained its notable appearance. Admirably displaying how it brightened up the East Coast vista is this view showing the Class 91 at full speed on a King's Cross-Newcastle working at Werrington Junction, just north of Peterborough, on October 16, 2014.** (John Rudd)

previous administrator. This contractor was re-instated and the problem disappeared.

East Coast managers oversaw the introduction of the new timetable in May 2010 which added 20 services and an extra 10,800 seats. Notable developments during this tenure of office saw the introduction of a four-hour Edinburgh-London King's Cross service and hot complimentary meals for First Class passengers.

Perhaps one disappointing aspect of this franchise was the rather uninspiring livery of the trains – grey with purple lettering. This was said to be in order to make it easy for the next private franchise operator, when appointed in due course, to relivery the trains!

A nice quote from Elaine Holt was: "And I think you have to ask yourself whether the private sector has done such a bad job when it's possible to travel from London to Scotland for £15". She was also on record as saying: "I do believe that the private sector does bring value to running railways, and eventually, the natural home for East Coast railways is back in the private sector."

Mrs Holt stood down from Directly Operated Railways at the end of 2011 after failing to agree new terms with them. She then joined National Express as a rail bid director.

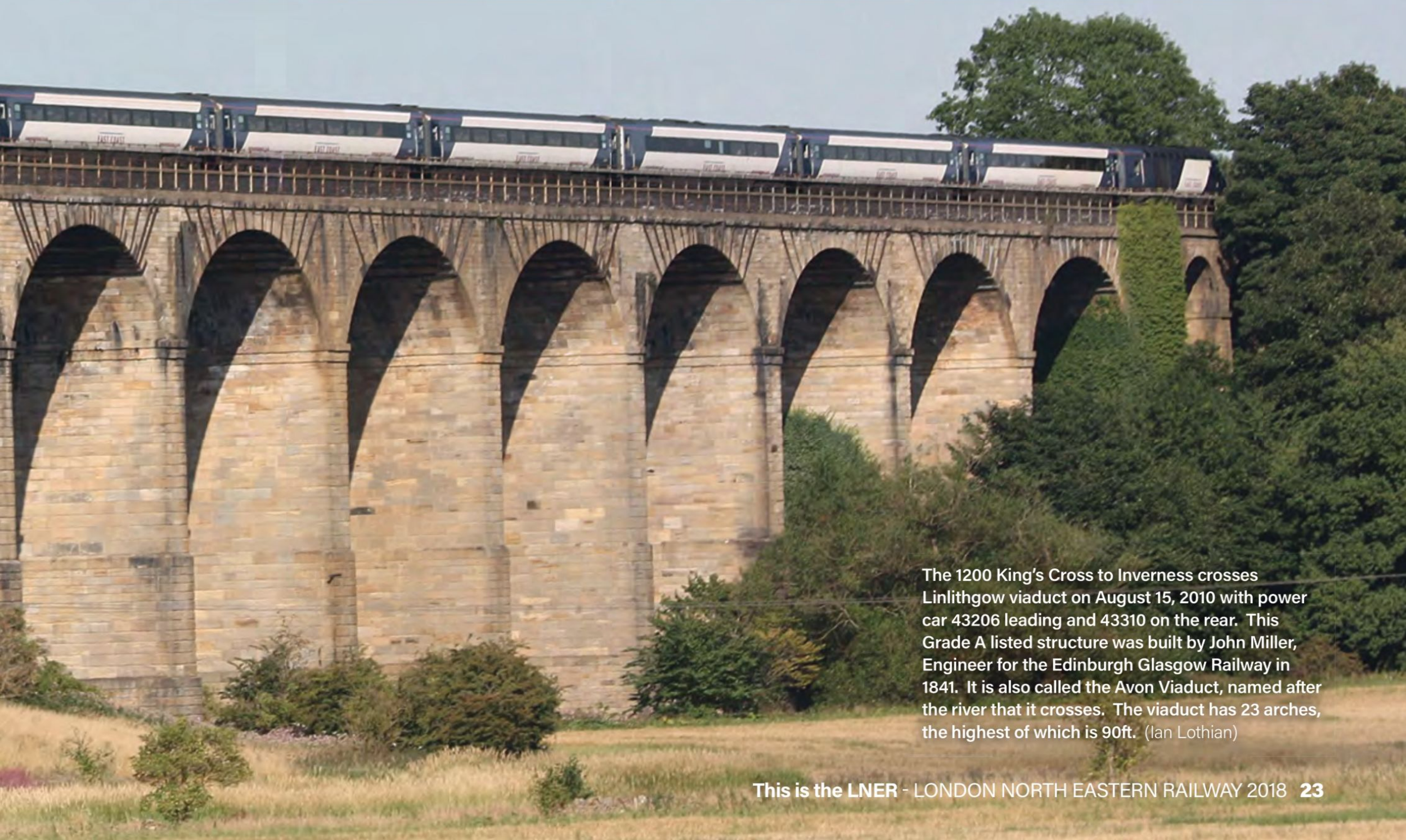
Definitely a success

Was East Coast a success? A resounding 'yes.' In its last full year of operating, EC returned a record £235 million to the government. In total it had returned over £1 billion over the five year period. Considering that the two

ABOVE: **This is the first through train from London for over 19 years arriving at Harrogate on May 23, 2011 (1733 ex King's Cross), headed by 43317. Prior to May 1992, there had only been a one way morning Harrogate to King's Cross working, with the evening return having been discontinued. Turn the clock forward to today and the spa town enjoys six Azuma services daily to and from London. (David Russell)**
BELOW: **On May 22, 2011 East Coast started direct Lincoln-London Kings Cross services, albeit reduced in number than they had originally been publicised. There was one train a day to London leaving Lincoln at 0730 Monday-Friday and 0733 on Saturday, with none to London on Sundays. The return weekday service left King's Cross at 1906 Monday-Friday, 1808 on Saturday, and there was a booked train on a Sunday at 1908. A pre-service publicity special ran on May 8, 2011, pictured entering Lincoln which had run empty stock from Leeds Neville Hill. Leading power car was 43312, with the rear (named later that day Lincolnshire Echo) 43208.** (Richard Tuplin)

private predecessors (GNER and National Express) had failed in this respect, this was a highly creditable performance. Inevitably, this gave ammunition to the railway unions who advocated nationalising the railways citing that East Coast's success was proof of the pudding. However, the government was intent on returning the East Coast route to the private sector and issued tenders to would-be bidders on October 25, 2013. These subsequently materialised to be Keolis/Eurostar, Stagecoach/Virgin and First Group. The news that Virgin Trains East Coast had been selected came on November 27, 2014. Bearing in mind that GNER and National Express had defaulted in paying the government premiums of £1.4bn and £1.3bn over the length of the franchise, VTEC had won the franchise which involved paying the government £3.3 billion. Start date was March 1, 2015.

Karen Boswell, who had been East Coast's MD since 2009 right through to the start of the Virgin Trains East Coast franchise, went on to become Hitachi's group chief administration officer and Hitachi Rail Europe's managing director. LNER



The 1200 King's Cross to Inverness crosses Linlithgow viaduct on August 15, 2010 with power car 43206 leading and 43310 on the rear. This Grade A listed structure was built by John Miller, Engineer for the Edinburgh Glasgow Railway in 1841. It is also called the Avon Viaduct, named after the river that it crosses. The viaduct has 23 arches, the highest of which is 90ft. (Ian Lothian)

Virgin Trains East Coast

Privatisation was back in vogue and one of the UK's leading entrepreneurs was just the man to head up the East Coast operations.

It's showtime. March 1, 2015 and all eyes were on Richard Branson, Britain's successful, flamboyant and publicity-minded entrepreneur, as a new company took over operations from the interim government-controlled East Coast. Despite Stagecoach having 90% of the venture and Virgin 10%, it was the latter which gave its name to the business. Virgin Trains was well established as a successful operator on the West Coast and the abundant use of red in its livery made Virgin Trains stand out from the rest. Soon the East Coast fleet – HSTs and Class 91/Mk.4 sets would be seen emblazoned in the eye-catching livery. With 'Virgin' in large letters adorning the side of the trains, no-one could miss who was running the show. It was an eight-year franchise, expiring in 2023.

At the helm was chief executive officer David Horne who had previously been in charge of East Midlands Railway.

When Virgin Trains took over, some 22 million passengers were using the ECML express trains. These figures continued to rise and by the end of the second year (2017) the figure had risen to 24 million.

During its tenure of office, VTEC introduced a daily service to Stirling and ↘

ABOVE: **The publicity-orientated entrepreneur, himself, Richard Branson, enjoys the attention at a press call at King's Cross on March 16, 2016 amid the media scrum on the occasion of exhibiting the first Azuma in Virgin livery – 800101. This was the date the 'Azuma' brand name was first launched. The unit was available for external inspection only, the interior was devoid of seats as it was a pre-series test unit.** (Robert Pritchard) RIGHT: **Rolling into Newcastle Central on March 26, 2018 is Class 91 91129 in charge of VTEC's 1S13 1100 London King's Cross-Edinburgh, on time at 1352. The introduction of Virgin Trains to East Coast Main Line station brought with it a welcome splash of colour, immediately noticeable to passengers. This trend has continued with LNER which has retained the basic red.** (Stephen Spears) RIGHT BELOW: **Passengers from London to Aberdeen cross three magnificent bridges - the Royal Border Bridge at Berwick, the awesome Forth Bridge and this one, the ever-impressive Tay Bridge – all 3,290 metres (10,780ft) and 57 spans of it. It opened for traffic on June 11, 1887, replacing the original which had collapsed on December 28, 1879. Virgin's 1E11, the 0752 from Aberdeen to King's Cross, crosses the Tay Bridge on its way south on May 16, 2018. Of interest, the photographer failed to identify the power cars on this occasion due to a police car stopping and asking why he was standing on steps with an arm around a lamppost taking pictures of a train! The policeman was not told to mind his own business!** (Ian Lothian) LEFT: **The first evidence of Virgin Trains taking over East Coast services was the adorning of HST power cars and Class 91s with a large, wide red diagonal telling the world that this was a Virgin train. Power car 43310 sports such an identity as it leads the 0755 Inverness to King's Cross along the Edinburgh-Glasgow main line at Park Farm, to the east of Linlithgow, with 43257 the trailing power car on April 9, 2015.** (Ian Lothian)

It was not to be that Virgin Trains East Coast would 'live long enough' to see the Hitachi AT300 units in public service. This was because the franchise came to an end prematurely before they had finished their commissioning. The nine-coach pre-series test unit 800101 took part in more than one press event and undertook a huge amount of mileage accumulation and driver training runs. It was the only one to be adorned in Virgin embellishments and, uniquely, carry Japanese writing. In this view, the Virgin/Hitachi promoting unit heads north over Relly Mill viaduct, just south of Durham, on March 26, 2018. (Peter J Robinson)

ABOVE: **This was an unusual sight in the Virgin Trains East Coast era. Occasionally, Class 91 locomotives double head, propelling southwards, this often returning one back to Bounds Green depot after attention at Wabtec's works at Doncaster. One actually under power, working 'blunt end' first and heading north is really exceptional. This example took place on May 26, 2016. 91102 was in charge of a service to Leeds when captured by the camera passing Werrington Junction, north of Peterborough.** (John Rudd)

LEFT: **A remarkable cavalcade took place north of York on Sunday April 23, 2017 when, at 0600, four generations of East Coast power slowly made their way in parallel the ten miles from Tollerton to York. It was staged to celebrate 'the past, present and future' of Britain's railway and Virgin Trains East Coast was in the forefront of the event. It was jointly organised by Network Rail, The National Railway Museum, Hitachi, Virgin Trains East Coast and Welcome to Yorkshire, the Yorkshire tourism promoter. The 'stars' of the show were A3 Flying Scotsman, Hitachi IEP 800101, VTEC IC225 (DVT 82205 and Class 91 91105) and VTEC HST (power cars 43238 and 43290). The cavalcade paused at The Sidings restaurant, Shipton. There was another performer on the day, but, sadly, relegated to the rear of Flying Scotsman, this being the NRM's Deltic 55002 King's Own Yorkshire Light Infantry, the precursor of high-speed travel in the country and the first diesel to travel at 100mph. There was also disappointment for the many observers gathered at Overton near York, for the Hitachi AT300 unit moved forward on its own, leaving the three remaining 'exhibits' to follow on to York later.** (Richard Tuplin)

also to Sunderland, an extension from and to Newcastle. These started on December 14, 2015 and on the same date, Hull saw an extra evening service instigated via Selby. Traction-wise, 2016 was the year we began to see Class 90s in operation on the ECML, Virgin hiring in three from DB Cargo. This was because of shortages of Class 91 electric locomotives on the Mk.4 sets. The 90s were used on services to Newark ostensibly, but also York and Leeds. The Tyneside city saw a Class 90 booked on a Sunday King's Cross-Newcastle working.

Also of note, the following year, An additional HST was placed on the books, this coming from East Midlands Trains – a colourful sight amid all the red of VTEC.

The franchise was intended to run until 2023. Premiums payable to the government over that period amounted to a highly challenging £3.3 billion. Inability to keep up with these premiums saw Stagecoach/ Virgin come to the conclusion it could not continue. In November 2017, Chris Grayling, then transport secretary, announced that the contact was to be discontinued and in May 2018 that the deal was to be terminated early. VTEC's last day was June 23, 2018, so ending the most colourful period in the post privatisation era of the East Coast Main Line. Ushered in was the government-controlled (Operator of Last Resort, as it had become known), LNER. The famous initials were back, 67 years since they last adorned locomotives and carriages.

Third Time Unlucky

The fact that a third operator had run into financial problems did nothing for the reputation of the present franchising system. For Virgin Trains to bid over double what its forebears had done did raise eyebrows but the company was optimistic it could win increased business. Was the tempting offer of such a high premium too much of a carrot for the Whitehall mandarins to turn down? What this third failure did was to effect a change in policy in that if and when the East Coast services were once again offered to the private sector to run, then it would be operated as an East Coast Partnership. This would be a new form of franchising and involved the private sector having an increased role in the infrastructure requirements. As March 2020 dawned, the Williams report into railway franchising had yet to be published – this was expected to make stringent changes to the process which, certainly for the East Coast Main Line, had caused dire problems for three operators and inconvenience and embarrassment for the Department for Transport. LNER

LNER

In the post-privatisation era and under a conservative government, we're now back with a state-owned operator on the East Coast Main Line.

The 'new' LNER came into being on June 24, 2018. In fact, only one thing had changed from the previous administration, Virgin Trains East Coast, and that was the owner. The government now owned this Train Operating Company and bestowed upon it the famous initials/name, LNER. Even the management stayed the same – it was business as normal, but internally the new company had to adhere to government regulations which included freedom of information matters and procurement procedures.

David Horne who had been appointed to managing director of VTEC in March 2015 continued in the same position with LNER. He had 3,000 staff on the books, a drop of 10% on the previous year. An impressive 22.3 million passenger journeys were made in the year July 2018 to July 2019, a rise of 2.2% over one year. The rail company serves 49 stations and manages 11 of these. Its trains cover 13.5 million miles annually and 60% of its passengers finish or start their journey at King's Cross.

TOP: **The Azuma effect. It's exciting, it's fast and futuristic and it captures the imagination. Taken at Doncaster, this surreal image could have been anywhere along the East Coast Main Line. The time traveller has arrived! (Paul Fitzpatrick)** ABOVE: **In charge of LNER is David Horne as managing director. He joined the railways in 1993 just before the privatised era and worked in various sectors before becoming associated with East Midlands Trains in 2005, rising to become MD in 2011. In March 2015 he moved to take over the same position at Virgin Trains East Coast and continues that role with LNER.** (Robert Pritchard) LEFT: **Shortly before departure with the southbound 'Highland Chieftain', 1E13 0755 Inverness–King's Cross, 800104 is given a traditional Highland send-off on December 10, 2019. The Azuma had arrived, courtesy of 1W96, the 1200 from King's Cross, the previous day. This was the inaugural 'Highland Chieftain' to be operated by one of the LNER Azuma units. Of interest is that the Azuma is not quite capable, by just a few minutes, of keeping the timings of a HST over the difficult terrain up to Perth. LNER has been quick to publicise the environmental benefits of the Azuma on this route as this service now uses diesel power for only 145 miles of the 580-mile total. This equates to saving a third of the former carbon footprint. David Horne, LNER's MD, has been quoted as saying that an Azuma between London and Edinburgh produces only a sixth of the carbon dioxide emissions of a plane between the two capitals.** (Ian Beardsley)

A wet Aberdeen on November 26, 2019 saw the start of Azuma services to London. LNER pulled out the stops to give the first train a good send off, with excellent resultant publicity. Number 800104, which had been given 'Celebrating Scotland' branding in addition to its normal livery, was the debut Azuma. It formed the 0752 to London King's Cross. (Richard Tuplin)

ABOVE: **'Traffic Light' seat reservation innovation in the Azuma.** (Robert Pritchard)
LEFT: **Sign of the times: As seen in a Mk.4 First Class trailer. But I wanted to go to Newcastle . . .** (Murray Brown)
BELOW: **We're getting the message!** (Peter Marsh)

March 8, 2020 was International Womens' Day. LNER not only celebrated this by running an all-lady crewed service, but also doctored its 'Flying Scotsman' emblazoned 'celebrity' Driving Van Trailer 82205 to become Flying Scotswoman. It worked the up service of the same name from Edinburgh on March 8. Craigentinny staff had undertaken the changes. This eye-catching vehicle, propelled by 91113, was running in reverse formation approaching Durham on 1S12 1010 King's Cross to Edinburgh on March 22, 2020. The set had been turned at Newcastle the previous evening and was about to be turned there again using the High-Level Bridge. It is noticeable how LNER is benefitting from publicity from its veteran IC225 trains, both by this example and also that three of its Class 91 locomotives carry special liveries. (Peter J Robinson)

Surprise Announcement

The intention of the Department for Transport's Operator of Last Resort for the running of the new company was that it would only be for a short period pending a new administration taking over which, when it came to fruition, would be a joint public/private partnership. The surprise came in July 2019 when the DfT announced LNER had been given a direct award to continue running services until 2025. This made it the second longest franchise awarded since GNER had originally assumed control for East Coast services.

LNER is in the fortunate position to be introducing the wholescale fleet renewal thanks to the Hitachi AT300 product which has been given the name Azuma on the East Coast. There will be 65 sets in total of four types; nine-coach bimodal, five-coach bimodal, nine-coach all electric and five-coach all electric. Out have gone the 15 High Speed Train sets (HSTs), and the IC225 sets (Class 91 and Mk.4 trailers) will gradually be withdrawn, although a small number are to be retained until at least December 2021.

Azuma Introductions

While the first Azumas were delivered during VTEC's tenure of office, none entered service. Thus, LNER has reaped the huge benefit and publicity when it has launched these remarkable, sleek and agile sets into service. Notable dates for introductions during 2019 were Lincoln services on October 21; Aberdeen on November 25; Inverness on December 9 and Harrogate on December 15. Leeds services had started on May 15 of that year, with Hull commencing a day later. Edinburgh witnessed its first Azuma service on August 1, 2019, whilst two days earlier, publicity-aware LNER had lined up one of its new Azuma sets alongside the steam speed record holder Mallard at York station.

The Azuma expansion plans continue with Huddersfield about to join the network with a direct service to and from London King's Cross, whilst plans to serve Middlesbrough are underway, though very much dependent upon infrastructure works by Network Rail. From May 18, 2020, Bradford Forster Square will see a doubling of its services to and from London.

Soon there will be regular (every two hours) four-hour services from Edinburgh to London and not just the one at present. LNER

ABOVE: **LNER managers have been keen to embrace past eras whilst introducing their state of the art Azumas. They went to extraordinary lengths and expense to mark the end of their East Coast HST fleet in style – repainting a seven-coach set in original colours. This was a magnificent way to celebrate the passing of the fleet and to pay homage to 42 years' outstanding service where one of the power cars had attained 8.75 million miles in its illustrious history. Looking resplendent in the original Inter City 125 livery, the 1Z48 Edinburgh-Leeds leg of the HST farewell tour awaits departure from Dunbar on December 20, 2019. Power cars are W43006 on the front and E43112 on the rear. The new platform one in the down direction had just been opened on December 15. See 'Farewell to the HST' on pages 90-95.** (Stuart Edwards) RIGHT: **'Will you no come back again?' goes the famous Scottish song, to which the answer is 'Yes, of course, but it will be in an Azuma.' In the dying days of HST operation, the 0952 Aberdeen to Kings Cross approaches Dalmeny on December 9, 2019 as it crosses the Forth Bridge in glorious light. Power car 43307 is leading with 43308 on the rear. The final HST working of this service a few days later took place in funereal conditions on a very dark day with heavy rain and an almost gale force wind.** (Ian Lothian)

Unusual

Besides the diet of everyday train services, there have been, and continue to be, some unusual workings. These include light engine Class 91s – always an odd sight because we are so used to seeing them in full flight with their Mk.4s in tow or being propelled – then occasional failure necessitating being towed back to depot and, in more recent times, the sad sight of redundant Mk.4 sets being towed for store at Worksop and, highly likely, eventual scrapping.

ABOVE: **Class 91 91101 was sent Light Engine from Bounds Green to Doncaster Wabtec for Works' attention on August 2, 2019. The 'Flying Scotsman' livery adorned Class 91 is crossing over from the Midland lines to the ECML at Helpston. The working was 0Z12 1028 Bounds Green TMD-Doncaster West Yard. On the right is the Grade II listed grain warehouse built by the Midland Railway on the Syston to Peterborough line, opened in 1846. (Murray Brown)** BELOW: **LNER used DB Cargo Class 67 'Thunderbird' 67012, still in former Wrexham & Shropshire grey livery, to power an empty coaching stock (ECS) from Doncaster to Bounds Green depot on Monday September 24, 2019. The Mk.4 set, with failed Class 91 on the rear with pantograph down, heads south past the former Hurn Road crossing, just north of Werrington Junction. It is the practice to return Class 91s requiring attention to Bounds Green depot.** (Murray Brown)

GB Railfreight has the contract to haul redundant ex-LNER Mk.4 sets away from Bounds Green and Ferme Park Yard to storage at Worksop. Number 66755 was on 'undertaker' duty on January 27 2020 when it hauled BN21 set for its final time over the East Coast Main Line after over 30 years of service. BN21 comprised numbers 12222, 12461, 12441, 12476, 12323, 10330, 11244, 11321, 11421 and 82227 to store. The ensemble is seen approaching Lolham, Lincolnshire - the 5Z91 0927 Bounds Green-Worksop. (Murray Brown)

Workings

ABOVE: **Powering northwards at Burton Coggles on the racing stretch between Peterborough and Grantham are Class 91s 91112 with 91119 in tow atop a 5Z12 working, an empty coaching stock from Bounds Green depot bound for Doncaster West Yard. The InterCity-liveried Class 91, which had been cleaned by Bounds Green staff, was en route to the Locomotive Services Open Day at its Crewe depot, held on Saturday June 8, 2019. The electric locomotive was hauled from Doncaster West Yard to Crewe on the Friday before the event. (John Rudd)** LEFT: **Pairings of Class 91 locomotives are not uncommon, but a pairing with one facing the 'wrong' way to normal operation is certainly out of the ordinary. One such occurrence took place on May 15, 2019 when 91126 suffered a transformer fault. To the rescue came sister 91122 – except, unusually, it was facing, i.e. main driving cab, towards London. The set, that day, worked both to Leeds and Newcastle and it was returning from the latter when the pairing was spotted about to enter Stoke Tunnel just a few miles south of Grantham. 91122 and its failed sister was propelling the 13.29 Newcastle-King's Cross working.** (John Hennis)

ABOVE: **On January 23 2020, GB Railfreight's 66702 powers the 5Z91 0926 Bounds Green TMD to Worksop Down Yard conveying BN20 set. The store yard at Worksop is managed by the Harry Needle Railroad Company where not only ex LNER Mk.4 sets are retained pending disposal or further use, but also other trains including brand new Class 345 units destined for use on the new £18bn Crossrail line. This convoy is passing over the A16 at Tallington crossing, Lincolnshire, with the Whistle Stop Inn on the left at 11.34am. The Driving Van Trailer on the rear was 82200 - possible vehicle designated for the national collection. (Murray Brown)** BELOW: **It is not the end of the road for two of the former LNER Class 91 machines. After they came off lease, owner, Eversholt Leasing, has sold 91117 and 91120 to Europhoenix for further use, ostensibly as test bed locomotives for the imminent Kettering to Corby electrification scheme. After being vinyled at Bounds Green depot, the pair was hauled to Europhoenix's Leicester depot on October 5, 2019 by GB Railfreight's 66786. Presenting a remarkable transformation from their former LNER identity, the duo is seen heading west on the Helpston-Stamford line.** (John Rudd)

ABOVE: **Following its last revenue-earning run on July 22, 2019 Class 91 91108 was sent Light Engine (LE) as a 0X91 1155 Bounds Green depot-Doncaster the following day, July 23. Instead of being used immediately for spares recovery, though, it was temporarily reprieved for a few days before final retirement and spares recovery within Wabtec's Doncaster plant. Here 91108 is crossing from the Midland lines to the ECML in the background at Helpston. The northbound Midland line only is wired for 25kV, including the crossover at Helpston, to allow northbound ECML services to be overtaken between Peterborough and Helpston, a distance of just over five miles.** (Murray Brown)

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Newcastle Central

Gateway to the northeast, Tyneside and Hadrian's Wall.

Newcastle Central

Serving a population of 268,064 (2011 census)

Originally built at a cost of some £100,000 by the Newcastle & Berwick Railway from 1847 – officially opened on August 29, 1850

It is Grade I listed – one of six stations so designated

268.6 miles (432.323km) from London King's Cross

Passenger usage 8.914 million (2018/19)

Interchange passengers 0.376 million

Number of platforms: 12

Newcastle Central is one of the great cathedral stations. Its inception came about when the Newcastle & Carlisle Railway put pressure on George Hudson's (the 'Railway King') Newcastle & Berwick Railway to build a central station, this resulting in George Hudson commissioning architect John Dodson to produce an edifice fit for the city. This would allow Edinburgh to be linked with the line south of the Tyne and thence to York and beyond. The High Level Bridge allowed this to happen, although trains from Edinburgh had to reverse to head south and vice versa. Queen Victoria officially opened Central station on August 29, 1850. It was not until October 1, 1906 that the King Edward VII bridge was opened at the south west end of the station, thus affording through working without reversal of Anglo-Scottish trains and it is this arrangement that survives to this day.

The North Eastern Railway was formed in 1854 embracing these earlier concerns. Central station was the largest station on the NER and at one time handled almost 1,200 trains daily, arriving and departing. Worthy of mention is the NER's electric system which started on March 2, 1904. This was a 600V third rail system a circular route taking in, from Newcastle Central, Heaton, Percy Main, Tynemouth, Whitley Bay, Monkseaton, Backworth and South Gosforth to the terminus at New Bridge Street. From 1917, it became possible to provide a complete circular system starting and finishing at the Central station. In 1938, the LNER electrified ➘

The west end of Central station is the setting for this picture on November 18, 2019 depicting two LNER trains, both waiting to head north. On the left, new Class 800 Azuma 800111 adjacent to HST Class 43 43318. The roof bay covering the Azuma on the left was not part of the original station when built. (Jeff Mckever)

ABOVE: **Edinburgh Craigentinny-based HST power car 43319 leads the King's Cross to Aberdeen working over the King Edward Bridge and into the Central station on October 30, 2019. Until this bridge was opened in 1906, trains such as this from London would have had to cross the Tyne using the High Level Bridge and enter Central station from the west. This then necessitated a reversal to proceed north to Edinburgh.** (Stephen Spears)
LEFT: **The Azuma – the shape of things here – and to come. It really is a superb shape, as illustrated here with 800102, one of the nine-coach bi-modal sets, waiting at Newcastle Central on September 30, 2019. In the background is the old order, Class 91 91119, bedecked in original InterCity livery, one of three Class 91s to carry non-standard livery and widely appreciated by rail aficionados.** (Kevin Cotterell)

the South Tyneside line from South Shields to Newcastle.

Serving the commuters of Tyneside, it lasted incredibly until 1967 when ageing equipment saw its closure in 1967, being replaced by diesel multiple units.

The advent of the Tyneside Metro system saw the withdrawal of many heavy rail suburban services and this brought about the closure of platforms at the west end of the station, formerly used by the electric services and, latterly by DMUs. This is now a car park. These local services used the famed diamond crossing which sat below the Newcastle Keep to access the High Level Bridge. When the ECML was electrified in the late 1980s, extensive remodelling and resignalling took place which resulted in the diamond crossings being removed.

An extra island platform was added on the east side of Central where good lines previously existed.

Since being built, Central station has undergone several expansions and major alterations, these continuing until the present era.

A major revamp of Central Station costing £8.6 million was completed in 2014 which saw the historic portico pedestrianised. Its 19th century arches were glazed, the walls sandblasted, and retail outlets introduced. Inside, the ticket office was reduced in size and handed over to more retail facilities. In all, the gloomy begrimed entrance was totally transformed.

Besides LNER, services are operated by Cross Country, Northern and TransPennine Express.

First Group will be operating a budget London King's Cross-Edinburgh service from 2021. LNER

ABOVE: **Keep the faith! This is the shape of things to come – for the next 30 years. The 1S21 1430 King's Cross-Edinburgh gets underway from Central on January 22, 2020. Formed of Azuma 801205, the set is about to pass the Newcastle Keep. To the left of the Azuma were once platforms used by the electric, later DMU, services and which crossed over the main lines in front of the Keep by using the famous diamond crossings.** (Stephen Spears) BELOW: **A 14mm lens shows off LNER's DVT 82225 at the east end of Newcastle station in an impressive way. The date was September 30, 2019 and LNER's service to London King's Cross was the 1530 from Edinburgh.** (Kevin Cotterell)

BELOW: **An unusual view of a southbound LNER train leaving Newcastle's Central station. It is curving round onto the King Edward Bridge. The date was December 14, 2019 and the service, headed by DVT 82224, was the 1E15 1230 from Edinburgh. Dominating the skyline is another Grade I listed building, that of St Mary's Cathedral which dates from 1844. Forth Banks Goods once occupied the land in the left foreground.** (Robert Pritchard)

Grantham

The Lincolnshire town famous for being the birthplace of former prime minister Margaret Thatcher. It's also where Isaac Newton was schooled.

The original station, known as Old Wharf, was built by the Ambergate, Nottingham, Boston & Eastern Junction Railway in 1850. The site of the present structure dates from August 1, 1852 and was opened by the Great Northern Railway. The Old Wharf station closed the next day.

Today, a housing estate occupies the site of the former Grantham steam shed, coded 34F which closed on September 9, 1963. This was immediately to the west side of Grantham station. The station still exudes some character and feel of its by-gone era, only the amenities having been modernised.

The only major rebuilding took place in 1937 when the Down platform was extended to 950ft (290 metres).

Besides LNER, services are operated by East Midlands Railway, Grand Central and Hull Trains.➘

TOP: **Three days after the start of the Azuma timetable, 800108 passes through Grantham on May 18, 2019, working a 5Q11 0943 King's Cross-Leeds empty stock test service.** (Mike Brook) ABOVE: **Virgin Trains East Coast started the practice of hiring DB Cargo's Class 90 to fill in for non-available Class 91 locomotives and LNER continued the tradition. These locomotives were, indeed, a useful stop gap measure, albeit limited to 110mph. Here, 90029 waits at Grantham propelling the 1A37 1515 from Leeds to London. The date was a sunny September 24, 2018. The hire of Class 90s came to an end with the introduction of the Azumas into service in May 2019.** (Chris Sansome)

ABOVE: **On May 16, 2019, a day after the Azuma timetable was introduced, a spotless Azuma arrives from the north and slows to a stop on a mileage accumulation run to Peterborough.** (David Page) BELOW: **Drawing to a stop, the 1A15 0715 from Leeds to London is formed on March 11, 2020 by 800105. Next stop is Stevenage.** (Murray Brown)

Grantham Station

Serving a population of 44,559 (Est 2018)

105 miles, 38 chains (169.7km) from London King's Cross

Passenger usage 1.413 million (2018/19)

Platforms: Four

ABOVE: **Class 800/1 nine-coach bi-mode 800113 speeds through Grantham on May 18, 2019 with a 5Q21 working, a 1039 Peterborough-York empty stock driver training and mileage accumulation run. LNER's 'Big Day' began three days earlier with the start of the May 2019 timetable.** (Mike Brook)
LEFT: **DVT 82205 in its distinctive 'Scotsman' regalia sets out from Grantham station on March 11, 2020 at the front of the 1A08 0715 Leeds-King's Cross, with 91113 propelling.** (Murray Brown)

Berwick

Just south of the Scottish border and straddling the picturesque River Tweed

Berwick's original station was built by the North British Railway in 1846 but the site of the present structure dates from a year later when part of Berwick Castle was demolished to make way for it. The LNER rebuilt the station in 1927.

In 2018, LNER, along with the Rail Heritage Trust, were instrumental in effecting improvements to Berwick station which were aimed at restoring some of the station's original features. Amongst these were the ticket office reverting to its original position, heritage architraves added to the concourse area and an original LNER drinking water fountain restored to working order – a really nice touch. Modern amenities were also added, including a new Costa outlet. To mark these welcome interventions, completed in December 2018, an official blue heritage plaque was unveiled, this reading:

'The North British Railway built Berwick on Tweed station in 1843, on the site of a 12th century castle. In 1913 it designed a new station, with many Scottish overtones in its design, but the Great War prevented construction until 1924. Thus, the London & North Eastern Railway built the present station, with its island platform and footbridge. The station is Listed Grade II'

Besides LNER, services are operated by Cross Country and TransPennine Express. ➘

Berwick Station

Serving a population of 12,043 (2011 census)

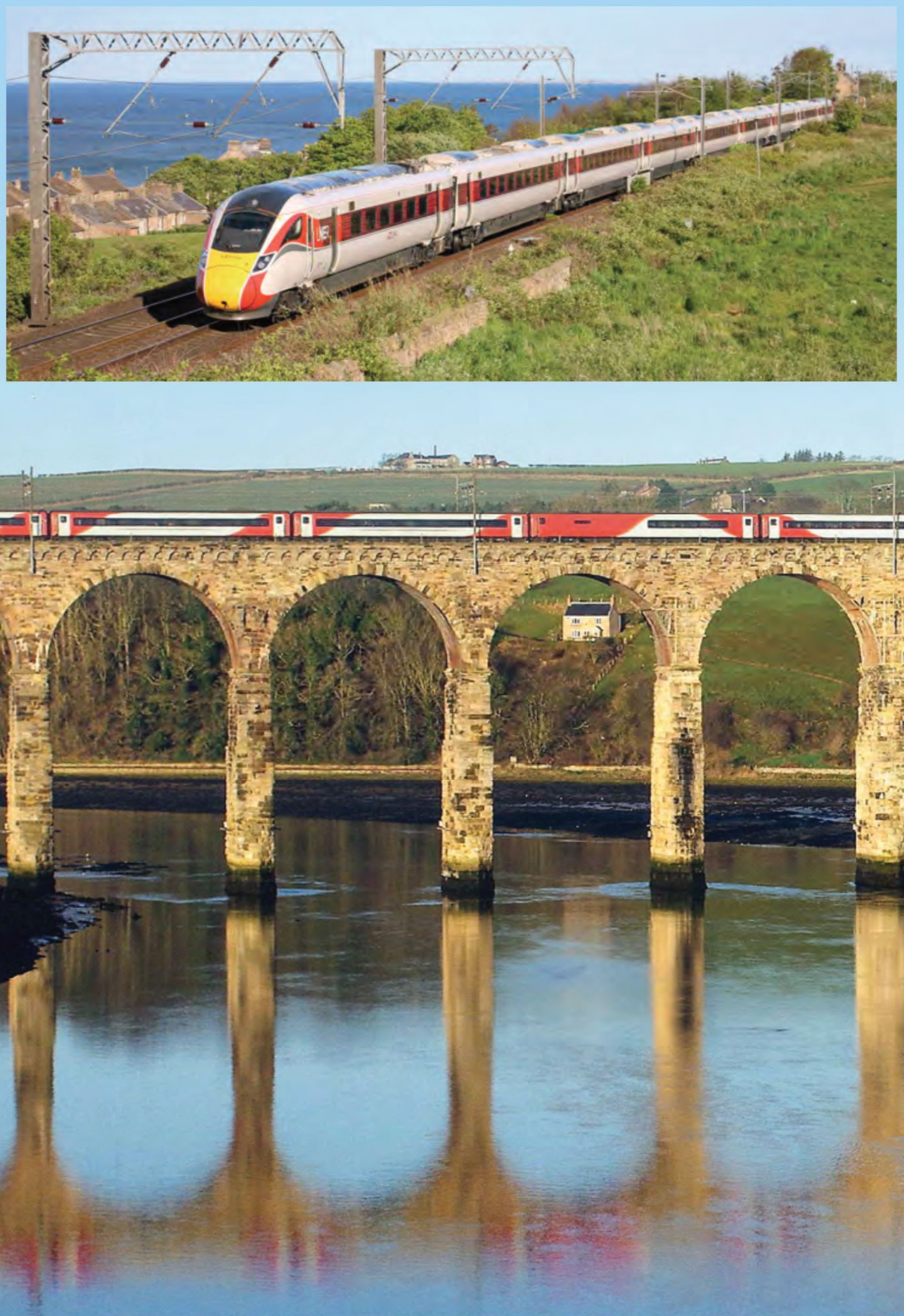
Berwick is the smallest of the stations managed by LNER. It is also England's most northerly station, being three miles south of the Scottish Border at Marshall Meadows

335 miles, 56 chains (540.3km) from London King's Cross

Passenger usage 0.571 million (2018/19)

Interchange passengers 1,219

Platforms: One single island with two faces



ABOVE: **Approaching Berwick station and crossing the Royal Border Bridge is Class 91 91117 with the 1S03 0856 Newcastle-Edinburgh. The date was August 22, 2019.** (Mark Lewis) LEFT: **Undoubtedly, one of the finest stretches of the East Coast Main is that along the Northumberland coast line and just north of Marshall Meadows, the border with Scotland, where the ECML turns inland at Reston. LNER all electric nine-coach Azuma 800108 seen heading towards Tweedmouth at Berwick-Upon-Tweed working a test run 5Q45 from Newcastle to Craigentinny depot, Edinburgh. The date was May 23, 2019.** (Gareth Paterson) BELOW: **Berwick is dominated by one of the finest viaducts in the country – the Royal Border Bridge which crosses the River Tweed. It was built by the York, Newcastle & Berwick Railway, opening in 1850. The Newcastle & Berwick Railway had reached Tweedmouth in 1847 on the south side of the river but this company was soon absorbed into the York, Newcastle & Berwick Railway which then took on the responsibility of building the bridge to Berwick, thus linking up with the North British Railway line to Edinburgh. The bridge, designed by Robert Stephenson, was ceremonially opened by Queen Victoria en route from Castle Howard to Edinburgh on August 29, 1850. The Queen allowed the use of the word 'Royal' in its title except the bridge, in reality, does not cross any border! It is 720 yards long, has 28 spans and the rails are 120ft above the Tweed. In its pleasing and highly distinctive InterCity Swallow livery and recognisable from half a mile away, 91119 propels the 1E09 0930 Edinburgh-King's Cross across the magnificent structure on December 31, 2019.** (J Brian Carter)

ABOVE: **Heading south at Berwick on May 17, 2019 was all-electric Class 800/1 Azuma 800105. This was a driver training run - 5Q44 Edinburgh to Newcastle. The unusual layout, unique amongst LNER-managed stations, of having only one island platform is illustrated here showing the footbridge linking the main station to the platform. The red sandstone building including the platform canopy was granted Grade II listing on May 26, 1971. (James Stokes)**

BELOW: **Number 800108 approaches Berwick station on diesel power working the 1829 Doncaster-Edinburgh Millerhill test train on May 9, 2019. The introduction of the Azumas on the East Coast Main Line has necessitated two additional power supply upgrades, these being at Doncaster (to provide Doncaster Carr depot to be independent of the ECML power supply) and at Marshall Meadows, the border between England and Scotland. Until the latter is operational, likely in 2021, some Azumas will have to operate under diesel power for about 30 miles either side of the border so that they do not overload the system.** (Malcolm Braim)

Doncaster Station

An important passenger interchange between the East Coast Main Line and services running across the north of England.

The original station was built by the Great Northern Railway in 1849, replacing a temporary station built a year previously and the LNER rebuilt the present station in 1938. In 2006, a footway connection to the new Frenchgate Shopping Centre was facilitated. On December 12, 2016, an additional platform zero was opened on the site of the former cattle dock. This allowed services to and from Hull and the Scarborough line to use the station without conflicting with the East Coast Main Line itself.

There is a scheme to transform the entrance to Doncaster station involving Doncaster Council, LNER and South Yorkshire Passenger Transport Executive. The forecourt will be opened up, the car park moved to the site of the Royal Mail sorting terminal, and LNER has provided a glass canopy for the station front. A sum of £7.75 million ➘

ABOVE: **Photographed from Doncaster's new platform zero, Azuma 800103 has travelled from Hitachi's Carr depot, south of the station, through platform one and is now accessing the line north on a test working to Leeds on November 9, 2018. (Peter Marsh)**

TOP: **A familiar sight at Doncaster station is one of the Class 91 locomotives parked in the south bay, usually waiting to return to Bounds Green depot after attention in the adjacent Wabtec works which are situated on the west side of the station. The spotless bogies are the clue here that 91106 has visited the Works, pictured on June 28, 2019. The loco returned to Bounds Green later that day.** (Richard Tuplin)

has been secured by the Council from the Sheffield City Region Local Growth Fund which will underpin the majority of the project.

The station booking hall and offices are Grade II listed.

On December 14, 2016, a new platform, zero, was opened at a cost of £21 million, this will serve local services to the east of Doncaster provided by Northern. The cost was influenced by the necessity to provide a fully accessible overbridge linking it to the rest of the station.

Besides LNER, services are operated by Cross Country, Grand Central, Northern, Hull Trains and TransPennine Express. LNER

Doncaster Station

Serving a population of 109,805 (2011 census)

155 miles, 75 chains (251km) from London King's Cross

Passenger usage 3.918 million (2018/19)

Interchange passengers 1.729 million

Platforms: Nine

RIGHT: **Dateline: June 22, 2019. On a mileage accumulation run, one of the nine-coach Azumas is about to head south. In the northbound platform is the 0833 King's Cross-Leeds.** (Peter Marsh)

BELOW: **There is often activity on the west side of the station, which is where Wabtec's works are sited, part of the original Doncaster Works complex. Class 91 91132 has arrived from Bounds Green for attention and is being shunted into a holding siding by Wabtec's resident Class 08 shunter 08853. The date was June 22, 2019.** (Peter Marsh)

LEFT: **Azuma 800110 is pictured having arrived in platform one at Doncaster, with a driver familiarisation run from York on June 28, 2019. The set subsequently departed to Doncaster Carr depot. This is one of two platforms used for southbound departures to London.** (Richard Tuplin)

BELOW: **Now passed into history, this was the scene which could be savoured at Doncaster for four decades – a HST at full tilt through Doncaster station. Cars 43307 and 43367 power through the centre road at Doncaster on September 25, 2018, providing the traction for the 1500 London King's Cross to Aberdeen service.** (Richard Tuplin)

Enhanced LNER services to Harrogate

Since taking over services on the East Coast, LNER has already added to the coverage of its predecessor. Harrogate was one of the first towns to benefit.

The spa town, famed for its sulphur water springs and baths, the 200-acre Stray grassland and, in recent years, by Betty's Tea Room and the Spring Flower Show, has had a rough deal when it comes to rail services to and from the capital. In the 1960s, it had no less than two Pullman trains, the 'Yorkshire Pullman' and the 'Queen of Scots'.

In BR's InterCity era, there was but one daily service in each direction, but this dwindled to a morning-only service. In 2011, after a gap of 19 years, East Coast introduced an HST in each direction, morning and evening. Today, thanks to LNER, there is the best-ever service to and from the capital, courtesy of the bimodal Azuma fleet. This amounts, like that to and from Lincoln, to six return trains and started on December 15, 2019. Both nine-coach and two five-coach bimodal sets are diagrammed.

However, should the go-ahead be given to the fitting of five-coach Class 800/2 units with a battery pack, the Harrogate line would be an ideal route on which to use them, being a 36-mile return journey off the 25kV.

Daily Azumas leave Harrogate at 0734, 0936, 1136, 1336, 1523 and 1736. The first departure arrives as empty stock from Leeds Neville Hill and to where the last arrival from London returns. LNER

RIGHT TOP: **Celebrity train – the first Azuma-operated service train to Harrogate - 800109 on the 1D28 1820 Peterborough-Harrogate, pictured waiting to return empty stock to Neville Hill depot, Leeds. The date was August 24, 2019. It wasn't just the train which was the celebrity. The photographer had the distinction of riding the very last LNER HST service – the control special from Harrogate to Leeds on December 15 – and the very first Azuma to Harrogate.** (David Russell) RIGHT BOTTOM: **Nine-coach bimodal 800103 visited Harrogate on February 11, 2019 after arriving from Doncaster Carr IEP Depot, on a driver training run. It left soon afterwards back to Doncaster. This was, it is believed, the first LNER liveried Azuma to visit the Yorkshire town. The architectural aspect of Harrogate's station changed for the worse in the 1960s when most of it was demolished and replaced by a more soulless structure, although some buildings remained. Half the station was completely covered over by an office block tower which could be seen from many miles away and which spoiled the skyline of the spa town.** (Joel Coulson)
LEFT: **An unusual telephoto view of the north end of Harrogate station. To facilitate the arrival of the Azumas, Network Rail has relayed a new siding on the Up side of the line just north of the station – long enough to accommodate two five-coach sets. After arrival from Leeds in platform one, the Azuma reverses to the crossover south of the station, then proceeds through platform three, out of the station, and into the new siding. Here the crew is booked for their Physical Needs Break (PNB). When time for departure, the Azuma draws forward into platform three, as seen here on February 1, 2020 to form the 1136 to London.** (Mark Rushton)

Over the weekends of September 21/22 and 28/29, 2019, LNER ran shuttles with a pair of Azumas between Leeds and Harrogate to provide extra capacity in connection with the UCI Road World Championships. 800108 crosses the beautiful Crimple Viaduct on the outskirts of Harrogate on the September 21 arriving with an inbound service. This structure dates from 1847, opened by the York and North Midland Railway with its Church Fenton-Harrogate branch. With its 31 arches of 50ft spans, it was 624 yards long and 110 feet tall. At the far right of this picture, the original railway to Harrogate ran underneath, the Leeds and Thirsk Railway, which entered Harrogate from the north. In 1862, a connection was made linking the Leeds and Thirsk with the Y&NMR and involved a sharp 90° corner at the south end of this graceful structure which the Azuma has just negotiated. The original line from Church Fenton and Wetherby closed in January 1964. (David Russell)

Enhanced LNER services to Lincoln

For nearly ten years, Lincoln was served with just one through train to and from the capital. Now LNER has transformed the timetable, with no less than six services daily.

ABOVE: **On the inaugural day of the start of LNER's six-a-day service to London, October 21, 2019, five-coach Azuma 800203 slows to a stop in Lincoln. Lincoln's other, and first station, St Marks on the Midland line had closed on May 11, 1985, resulting in the word 'Central' being dropped from the city's now only station. The Azuma is passing the grade I listed St Mary le Wigford parish church. The Great Northern Railway High Street signal box, dating from 1874 and which had 36 levers, used to control the crossing but was closed in the resignalling of Lincoln in 2008, all signalling now undertaken from a new centre near West Holmes. Like the church next to it, the signal box is a listed structure, but, unlike the parish church, only grade II. Some relief came to the endless delays to pedestrians and road users on June 25, 2016 when the £12m footbridge was opened. At the time, some 140 trains used the crossing daily as did an estimated 35,000 pedestrians and cyclists.** (Mark Nicholls) LEFT: **Azuma 800205 ends its journey with the 1B84 1206 from London King's Cross on November 20, 2019. It will form the 1527 return to 'The Cross'. On the left waiting the 'right away' is Network Rail's Railhead Treatment Train with DB Cargo's Class 66 66197 officiating.** (Paul Townsend)

Considering its size – approximately 100,000 residents – Lincoln has been poorly served over many years regarding trains to and from the capital. East Coast began the renaissance way back in May 2011 with one return daily trip, weekdays and Saturdays, but only as a King's Cross-Lincoln working on a Sunday. Roll on nearly ten years and LNER has done Lincoln proud. From October 2019, there are now six daily return services. They run at two-hourly intervals. This noticeable improvement to the timetable has been made possible by the release of the bimodal Class 800/2 five-coach Azumas from the London-Leeds services.

Could there be a business case, however, for LNER to run the first morning trip to London via the 'Joint' line to Peterborough, and a return evening working? This would offer residents at Sleaford a through service and also restore a through working for those at Spalding who were deprived of such a facility with the closure of the East Lincolnshire line to Grimsby in October 1970. Running via the 'Joint' is actually a slightly shorter route than used by the Lincoln Azumas (via Newark), but the journey time to Peterborough would take longer.

Azumas leave Lincoln at 0730, 1127, 1324, 1527, 1727 and 2025. LNER

ABOVE: **Lincoln Azumas use the former Midland Railway line between Lincoln and Newark, accessing the East Coast Main Line via the connection installed in 1965. Midland Railway architecture is prominent. This is Swinderby, pictured on December 7, 2019, and shows a Lincoln-bound service passing through, formed of 800201. The Midland 3a design signal box at the end of the platform dates from 1901.** (Adrian Wilson) LEFT: **LNER started operating a regular Azuma service from King's Cross to Lincoln from October 21, 2019. However, ahead of that date, there were several Azuma diversions via the city because of ECML engineering works. On August 25, 2019 800112 passes Brayford Wharf, Lincoln, with the diverted 1300 Edinburgh-Peterborough. To the left of the photographer was the site of the former Lincoln motive power depot, coded 40A. This closed to steam on January 5, 1964. The magnificent Gothic cathedral dominates the skyline and can be seen many miles from Lincoln. Construction started in 1072 and continued through the Middle Ages. For a staggering 238 years, from 1311 to 1548, it held the title of the tallest building in the world. Some 200,000 people visit the cathedral annually. Its stonemasons use around 100 tonnes of the local stone – the quarry is owned by the cathedral – annually for its repairs and maintenance.** (Robert Pritchard)

Newark North Gate

Unusually for a town of its size, Newark boasts two stations. LNER operates Newark North Gate

North Gate station was built by the Great Northern Railway in 1852, opening on July 15 of that year. The present structure is Grade II listed, as is Newark's other station, Castle, on the Lincoln-Nottingham line. It is the North Gate's west side buildings on Appleton Gate which were the impetus for listed protection and still exude much of the original architecture, including an awning over what was the bay platform (now a footpath) which served the services which ran south to Bottesford and on to Market Harborough and Northampton.

This section of line, from Newark to Bottesford, survived for freight traffic until 1988.

In keeping with its listed status, North Gate has a magnificent station clock on the down platform one, built by Potts & Sons, Leeds – this has recently been renovated.

North Gate's island platform is very much a modern, functional and nondescript structure.

LNER's increased Azuma service to and from Lincoln which started in December 2019, uses the connection between the ECML and the Midland Railway Nottingham-Lincoln line which was opened in the BR era in 1965. This was constructed following the cessation of services from Grantham to Lincoln on November 1, 1965.

Interestingly, the Newark-Lincoln line, originally built by the Midland Railway and over which the Azumas now provide the two-hourly service to and from 'The Cross', may well be a candidate for Azumas fitted with battery cells, should a trial be considered. The return journey equates to a round trip of 33 miles, well within the capacity of a battery cell. This reduces the carbon footprint even further by not using diesel traction, and the battery cell is charged once the Azuma comes back under the 25Kv overhead at Newark.

Besides LNER, services at Newark North Gate are operated by East Midlands Railway.

The view of Newark North Gate looking south. On the right are the GNR buildings which warranted grade II listing. The island platform serves southbound LNER services (platform two) and (platform three to the far left) those to and from Lincoln, including the now excellent six LNER trains per day to and from Lincoln. Slowing to a stop is an 11-coach Azuma which was forming the 1E14 1200 Edinburgh-King's Cross. (Murray Brown)

ABOVE: **Pulling away from North Gate's platform three on March 21, 2020 is bimodal Azuma 800201 at 1554, spot on time. This was forming the 1B87 1527 from Lincoln to 'The Cross'. These five-coach Class 800/2 units are absolutely ideal for this type of service, running on diesel power for the 16.5 miles between Lincoln and Newark. On the left is the northbound platform two, the western face of which was the bay platform for the trains to Bottesford, withdrawn at the outbreak of the second world war on September 11, 1939, although the route remained open for freight until the late 1980s.** (Murray Brown)

LEFT: **This is the 1E12 0744 Aberdeen to London King's Cross pulling away from Newark on March 21, 2020 with 11-coach bimodal Class 800/1 801113 officiating. In the northbound platform is the 1N85 1306 King's Cross-York, an IC225 set.** (Murray Brown)

LEFT BOTTOM: **Newark is famed for its flat crossing, the last one on the ECML. Others used to be found at Newcastle, York and Retford. Pictured on October 22, 2019 is the 1E11 0752 Aberdeen-King's Cross HST with power cars 43317 and 43336. There is a 100mph restriction to ECML trains. On the right is the 1965 connection allowing access to and from Newark North Gate by Lincoln trains. Network Rail's East Midlands Route Utilisation Strategy has put forward plans for further development to eradicate this crossing by means of a graded flyover which would take the Midland Nottingham-Lincoln line over the ECML. This would increase capacity on both routes, speed up services, and improve punctuality.** (Finbarr O'Neil)

Newark North Gate

Serving a population of 27,700 (2011 census)

120 miles, 8 chains (193.3km) from London King's Cross

Passenger usage 0.961 million (2018/19)

Interchange passengers 0.236 million

Platforms: Three

ABOVE: **All eyes are on the Class 90 approaching. LNER, like its predecessor, hired in DB Cargo Class 90 locomotives to help out when availability was poor, particularly with the Class 91 fleet. These 90s were used on the shorter distance services, such as Newark, Leeds and York, although a Sunday working did take one to Newcastle. Here is 90039 snaking over from the down line and into platform three at Newark North Gate with the 1B86 1606 from London King's Cross which would terminate here. The date was May 27, 2019.** (Terry Callaghan)

BELOW: **After having paused at Peterborough, Newark was the next call for the 1S19 1330 King's Cross-Edinburgh on March 21, 2020. All electric nine-coach Azuma 801205 pulls out on time at 1445, next stop Doncaster. Newark North Gate station is a strange mix of old and new, the down platform buildings and furniture contrasting with the modern up platform.** (Murray Brown)

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Out with the Old In with the New

It's a major transition for LNER as the company introduces increasing numbers of its impressive Hitachi-built AT300 units – Azumas – whilst juggling how long to keep its veteran IC225 sets.

Out with the old: With just over six weeks left before an Azuma took over the diagram, the HST forming the 0755 Inverness-London warms up on October 23, 2019. At 580 miles, this service is the longest operated by LNER. The indicator board is nearly as impressive as the HST. LNER has been quick to point out the environmental advantages of using a bimodal Azuma on account of the vast reduction of using diesel power when under the 25kV overhead lines. (Finbarr O'Neil)

"The Department for Transport negotiated the contract which is for a period of 27 ½ years. This periodicity does not start until the last Azuma is delivered. A train nominally has a 30-year life, so the Department put in place a contract which pretty much covered the whole life of the train"

It's interesting times at LNER headquarters located in East Coast House in Skeldergate, York. And the individual who has one of the most fascinating vocations is head of engineering, John Doughty. He is overseeing a massive change in traction and rolling stock – out with the old and in with the new.

The engineering head has been here before. John oversaw the transition from locomotive-hauled Mk.2/3 stock to the 'Pendolino' fleet on the West Coast Main Line. His early career saw him based at Wembley, Oxley and Longsight depots, after which he became fleet engineer based at Birmingham for the Virgin fleet. A stint with private industry in the form of Angel Trains Leasing followed where he was HST fleet engineer. For train operating experience, he can count on his period as head of engineering business development with Stagecoach's South Western Railway. He rolled up to York with Virgin Trains East Coast and now LNER in January 2016 – and he's all set to introduce yet another new fleet.

John has already phased out the 15 High Speed Train sets. That happened at the end of 2019. These remarkable trainsets were first introduced onto the ECML in 1978 – not a bad innings. Nine of the LNER sets are destined for further use with East Midlands Railway.

A start has been made on withdrawing the Class 91/Mk.4 IC225 sets. They made their debut in 1988, but it has very recently been revealed that some sets are to be retained until at least December 2021 and possibly beyond. But more of that later.

The new order is the sleek, stylish Hitachi-built sets resulting from the Government's InterCity Express Programme (IEP).

Introducing a brand-new fleet of 65 Azuma trains is quite a challenge, as it is with all new train types. On top of that, there is a fundamental shift from the past in the way of maintenance.

There is a preference in today's railways for a build and maintain contract. Thus, Hitachi not only builds the Azuma fleet, but is responsible for maintaining it. With that come obligations under contract to supply the right number of trains at the required time for daily service. There is a close collaboration of both LNER and Hitachi to achieve this goal.

The main centre for maintenance is the purpose-built depot at Doncaster Carr, constructed on the site of the former steam/diesel depot.

LNER's two other depots – Craigentinny in Edinburgh and Bounds Green in London - have also gone over to Hitachi-operated depots, the staff transferring under the TUPE arrangements in similar fashion to when a new Train Operating Company takes over running services – the staff stay the same and are protected. TUPE – Transfer of Undertakings (Protection of Employment) Regulations - was first introduced way back in 1981 and provides staff with safeguards and continuity of employment when a business is moved to another. In the world of railway franchising, this is a frequent occurrence.

Azuma Availability

When a brand new fleet is introduced, together with how it is operated and maintained, it would be unfair to saddle the maintainer with immediate and, perhaps unattainable targets, so for the first five years, there is a sensible sliding scale regarding availability of Azuma sets needed at the start of day.

John Doughty explains: "We still have the responsibility of delivering the trains and their safety. It has (using Hitachi) taken on a new dimension, The Department for Transport negotiated the contract which is for a period of 27 1/2 years. This periodicity does not start until the last Azuma is delivered. A train nominally has a 30-year life, so the Department put in place a contract which pretty much covered the whole life of the train".

"The way the IEP contract works – it is in the public domain – is totally different to anything previously undertaken. The GWR and LNER contracts are essentially the same. If the maintainer does not provide the train on time, they don't receive the set availability payment (SAP) for the day. There is a bedding in process in that non availability of an Azuma for service means a SAP payment of only 25% for the first year, 50% for year two, 75% for year three. Then there is a two-year gap and only after five years does the full 100% kick in if LNER does not have a correct formation booked train to work the planned service."

In March 2020, the second anniversary of the deal, the 50% figure was triggered. There have been some instances where a five-coach Azuma set has been provided and not the booked nine-coach set.

Government Control

LNER operates as a normal commercial business, even though it comes under the government's Operator of Last Resort company. There were a few things LNER had to change procedurally, for example, freedom of information requests and complying with government procurement rules. LNER has a contact with the department just as Virgin Trains East Coast did. Instead of being called a Franchise Agreement, it is called a Services Agreement, but otherwise it is the same. The premiums payable to the government were adjusted because, clearly under VTEC they weren't affordable. So, the payments now reflect the present climate and ability ↘

Out with the old: The end has come after 41 years in service. Dateline: Friday, October 11, 2019: 43206 and 43316 provide the motive power for the 0752 LNER service from Aberdeen to London King's Cross as the train crosses the Forth Rail Bridge and approaches Dalmeny, near South Queensferry. (Finbarr O'Neil)

to pay, though LNER is still subject to the vagaries of the economy, like any other train operator.

Measuring Performance

LNER uses the MTIN (Miles per Technical Incident Number) method for expressing failures (casualties) in association with delays. For many years previously, it was called 'Miles per Casualty'. The MTIN figure is miles between an incident causing a delay to the service of three minutes or greater, or a cancellation, and is an average value for any train within a particular fleet.

The figures for the latest period available (in March 2020) and the Moving Annual Average (MAA) figure below it – which is more of a realistic measure - is:

IC225	*14,019*
MAA	*13,786*
Class 800 bi-mode	*7,400*
MAA	*9,298*
Class 801 Elec	*25,809*
MAA	*16,707*

Is the Azuma fleet performing well? John Doughty was pleased with how they were doing: "Reliability is good. The only issue we have is with the generator units on the bi-mode units". This is one of the main factors which is causing the lower MTIN figure for the Class 800 fleet. "When the trains are out there, they are good which is great considering they are brand new".

He did admit honestly that LNER struggled with availability of sets, especially when the HST sets were withdrawn last year but availability had improved since then.

'Thunderbird' Provision

DB Cargo is contracted by LNER to supply four Class 67 locomotives for use on diversion work (for hauling the electric-only Azumas) and in the event of complete failure. These are stationed at Bounds Green, Doncaster West Yard, Newcastle Holding Sidings and Craigentinny. All have drivers rostered

from 6am to midnight. LNER has also used GB Railfreight to assist with mileage accumulation runs. Although these are run predominantly with LNER drivers, if, for instance, an Azuma has suffered an incident during its 'running in' period, then GBRf has assisted LNER crews. Each Azuma has to run a total of 2,000 trouble free miles before it can be considered for entry into passenger service. The first set of each type had a target of 5,000 miles. If there is a fault during this period, the mileage is reset to zero – the train must again attain 2,000 trouble-free miles. John Doughty has a team of eight engineers who are commissioning these new trains.

Solving Signalling Issues

Not all maintenance work is being undertaken on home territory. Azumas are being sent to Eastleigh depot to have modification work effected. This is primarily reactor filter modifications, implemented to counteract the electro-magnetic signalling issues found when the units were under test, particularly north of York but also, John Doughty recalls, around Stoke Tunnel just south of Grantham. Problems encountered included the signal telegrams being missed and there were examples of signal reversions, i.e. signals turned to red before they should. There was a traction software modification rolled out quickly after the problem was diagnosed but this had limited effect. There were also modifications implemented by Network Rail, in particular screening cables, to the infrastructure, essentially to immunise its equipment. It is not helped by the fact that Network Rail's signalling is not all the same type or age. This work still left some interference, so the final fix was these filter reactors being fitted to all trains. This work necessitates four or five days downtime to undertake. Whilst at Eastleigh, some smaller mods are also put in hand. Many of the Azumas have been dealt with and there is a programme to deal with the remainder over the next 12 months. New Azumas are being dealt with first before they enter traffic because it is not easy to take Class 800s and 801s out of service for such a downtime because of the effect on availability. The May 2020 timetable has been adjusted to allow some leeway to permit the modifications to be undertaken.

Expanding Azuma Services

Besides the welcome increase in services to Harrogate and Lincoln, each location now having six services daily to and from King's Cross, LNER has its eyes set on further expansion.

Huddersfield is one of the planned destinations, and driver training and route learning is taking place. From the May timetable change, there will be one through working to King's Cross and back. The Azuma diagram starts at Leeds Neville Hill at 0451 to form the 1A06 0550 Huddersfield-London. The return leaves Kings Cross as the 1D03 1803 to Skipton. At Leeds, one of the two five-coach Class 800/2 units detaches, one going forward to Skipton and the Huddersfield one running as the 1H26, arriving at the West Yorkshire town at 2058. It then runs empty to Neville Hill, leaving at 2123, with a depot arrival at 2217.

Why only one return service daily? It's all to do with pathing. The Leeds-Huddersfield route is exceptionally busy – there are six services per hour through most of the day, excluding the Wakefield-Huddersfield trains, which makes additional paths exceptionally limited.

The wish of LNER to serve Middlesbrough is a different matter as this depends on Network Rail undertaking infrastructure alterations. Because this new service will see several through trains to and from the capital, LNER is looking at how to resource this route. Furthermore, these Azumas will take the direct route to King's Cross and back using the Eaglescliffe-Northallerton line rather than running via Darlington where a reversal would be necessary. There is no start date mentioned, but whilst December 2021 might be an admirable aspiration, this cannot be confirmed yet.

Another destination or starting location which formerly had a through service to London is Cleethorpes. Stakeholders in that vicinity have been pushing for a revived through service to London. LNER would have to investigate the business case to take it further.

More Trains Needed

The timetable as wanted, not only by LNER, but also by predecessor Virgin Trains East Coast would entail more Azumas than the 54 daily diagrammed out of a total of 65. Thus, to provide this capacity and to tide over the operator until additional units might be procured, the Class 91/Mk.4 sets will continue – at least some of them. From December 2021, LNER is planning to use all 6.5 paths available to the company on the ECML. There will be eight long-distance high-speed paths available per hour. Besides those used by LNER, the remaining will be utilised by Open Access Operators, Hull Trains, Grand Central and, newcomer First Group.

Presently, LNER can run five paths per hour, but has not the trainsets to run 6.5. This is all part of LNER's plan to reduce journey times yet improve stopping services. At present, only the Up 'Flying Scotsman' service has a four-hour schedule. LNER wants this time achieved on a bi-hourly frequency. To show how ambitious LNER are for reduced journey times between the two capitals, John Doughty feels that LNER only has about a third of the potential business to be had. The airlines are in his, and his colleagues', sights. Alternative bi-hourly services between Scotland and England will be the 'stoppers', allowing greater connectivity. Similarly, Leeds will see faster services and, in between, services with increased stopping patterns.

When the full fleet is delivered, The LNER management require➘

ABOVE: **It's May 2019 and John Doughty (right) hands over the key of the first LNER Azuma in service to driver, Graham Brown.** LEFT: **Out with the old: Class 91 91117 makes its last run in revenue-earning service for LNER. It propels the 1E18 1400 Edinburgh-King's Cross past Cock Lane footbridge, north of Peterborough, at 1749 on Wednesday September 25, 2019. It started the day working the 1Y03 0444 Newcastle-King's Cross, followed by the 1S09 0900 King's Cross-Edinburgh before making its final sortie south. On the right are the earthworks in association with the Werrington dive-under project which will improve punctuality for LNER by removing conflicting moves onto the Spalding line. Up to a dozen of the Class 91s could be reprieved until at least December 2021 and beyond.** (Murray Brown)

the following Azumas in traffic:

Class 800/1 nine-coach bi-mode – ten in service (13 in fleet);

Class 800/2 five-coach bi-mode – eight in traffic (ten in fleet);

Class 801/1 five-coach electric – ten in traffic (12 in fleet);

Class 801/2 nine-coach electric – 26 in traffic (30 in fleet)

That's a total of 54 in traffic out of fleet of 65. However, it is felt that this number will be insufficient for all planned and future services; eight further trains are required. Five of these need the 0.5 paths (out of the 6.5 hourly paths) whilst the other three are for strengthening, i.e. five-coach Azumas would be strengthened by an additional five-coach set to cater for expanding passenger numbers.

Those serving Huddersfield and Lincoln have to be five-coach sets because of platform size limitations. "The capacity we are in the process of putting in now with the Azuma fleet gives us a big uplift because of the more seats per train". These extra eight sets will allow most of the LNER services in the future to be nine or ten coach sets, with only around 8% being single five-coach Azuma workings.

Did LNER consider keeping its 15-strong fleet of HSTs by converting them to sliding door operation and fitting retention tanks? Three other train operating companies took this course of action (CrossCountry, Abellio [ScotRail] and GWR). The answer was 'yes.'

In the event, it was decided not to progress this action – it would have been a sizeable investment and LNER would have been at the back of the queue to have the conversions undertaken, which would have meant the sets would not have been compliant by the end of 2019, the deadline for the disability regulations.

Maintenance Regime

Hitachi Rail's maintenance regime of LNER's Azuma fleet is calendar based, with some condition-based additions. The Azuma trains have thousands of digital sensors monitored by the Train Management System which alerts when performance issues arise and can then be planned into the maintenance schedule. Remote condition monitoring (i.e., the TMS) provides the engineers with the most efficient way to ensure train safety and fleet performance.

There are two levels of maintenance; there is a 10-day examination and a 50-day exam. Within the 50-day exam, there are a large number of variations depending on what the particular Azuma is deemed to require. The one-day exam takes an overnight; the 50-day sees the Azuma stopped for 36 hours.

Because the wear rates of a new train are unknown for quite a time, there will be alterations to the maintenance regime to cater for such eventualities. In this respect, there is a move to combine the two differing examinations into a single 30-day exam.

The 50-day inspections for the nine-car bi-modes (800/1s) are dealt with at Doncaster Carr depot; Bounds Green is allocated the nine-car electric Azumas (801/2s). Doncaster also undertakes exams on the five-coach sets, both bi-modes (800/2s) and electric (801/1s). Craigentinny helps out as required, but also undertakes other Hitachi work.

The overhaul programme is presently set at 750,000 miles. This could be extended and is very much driven by the life of a wheel. To give some idea, the Mk.4 trailers run 1.1 million miles between overhauls, while the Class 91s run 500,000 miles between visits to Wabtec's works in Doncaster. HST trailers ran 600,000 miles between major attention whilst the power cars ran 480,000 miles. LNER increased this to 620,000 miles.

These huge figures compared to traction of yesteryear have come about mainly due to improvements in wheel management.

Availability was not helped when Class 800/1 800109 suffered collision damage at Neville Hill at 2140 on November 13, 2019 when it caught up and ran (at 14mph) into an HST set, also moving forward at 5mph. Extensive damage was caused to the nose end of 800109 and two trailers were derailed. The RAIB has considered the evidence and it is now a question of putting repairs in hand. Work has started on the strip down at Wolverton Works to where the Azuma was sent by road. It was Hitachi's decision to send the train to Wolverton – sending it back to Newton Aycliffe plant, where construction is still in full swing, would have disrupted the production flow.

Some Class 91s

Spares are an issue for the Class 91 electric locomotives. Number 91108 was the first to be stood down and 91103 has also been decreed by owner, Eversholt Leasing that it can be used for spares recovery.

"The IC225 has always been problematical for spare parts", says LNER's director of engineering, "because it is a small fleet and they are bespoke locomotives". Withdrawals are not just down to mileage accumulation, but also what Eversholt Leasing has in store for locomotives which may be required for further use elsewhere.

LNER has announced it is to retain some Class 91s at least up to December 2021 and maybe beyond. This means that Wabtec, Doncaster, will have to restart overhauling those required for further use and the Mk.4 trailers. It may not be possible to acquire additional Azuma sets until 2023, so the Class 91/Mk.4 sets to be retained may well have to run another three to four years. Although still being finalised, it is envisaged that ten sets will be wanted, with 14 or 15 locomotives to run with them. LNER did consider a plan to run seven Mk.4 trailers with a Class 91 at each end but this has recently been ruled out. Current collection was seen as a potential problem as each Class 91 takes 300 amps, together with the pantograph design. Azumas are equipped with a modern design lightweight pantograph.

Retaining a smaller number of Class 91/Mk.4 sets for another four years will give LNER a celebrity fleet, guaranteed to attract extra revenues from those who hold these trains in high esteem.

Looking to the future, especially with reducing carbon footprint in mind, the Azuma fleet is already championing the way. For instance, the 580-mile Inverness-King's Cross service has already reduced the carbon footprint by up to a third compared to the previous use by an HST on diesel power all the way. With the Azuma, it runs on 25kV for 435 miles, leaving only 145 miles on diesel power. Although not confirmed by LNER, there have been suggestions of replacing one of the generator packs on a bi-mode Azuma and, instead, fitting a battery pack. This could allow Azumas to work to Harrogate and Huddersfield from Leeds and to Lincoln from Newark using battery power, as all three destinations are under 40 miles for a round trip. The battery pack would be charged once the Azuma reached the 25KV lines once more. LNER

The writer is most appreciative to John Doughty, director of engineering and Richard Salkeld, LNER's media manager, for facilitating this insight into the engineering aspects of the new Azuma fleet and the now veteran (32 years!) Class 91/Mk.4 IC225s.

LEFT: Old and new in tandem: A symbolic meeting of old and new engineering technology took place on York station on July 30, 2019 when the elite of former and current LNER met up. The A4 Pacific Mallard was towed round from the confines of the National Railway Museum to be placed in the bay platform with 800113 parked adjacent. Here was 80 years of East Coast power on show. The event was to showcase the start of services to and from York using the new Azuma fleet on Thursday, August 1. (Robert Pritchard) BELOW: In with the new: With introducing the 65 Azuma sets and keeping the availability up to scratch, the LNER engineering team has plenty to keep it busy. On top of that, at least ten IC225 sets must be kept in running order until at least December 2021. The new order is seen at the old order! This is the 1700 King's Cross-Edinburgh pausing at the classic location, the northbound platform, at York on October 28, 2019. Somehow, since York's platforms were renumbered, it doesn't seem right, for this platform will always be remembered as nine, not five as it is now! (Peter Marsh)

Durham

ABOVE: **Still a long way to go, 256 miles, the driver in Driving Van Trailer 82230 with the 1E12 11.00 Edinburgh-King's Cross slows to a stop at Durham on April 11, 2019. Durham originally had four tracks through the station, but the down fast line was removed as part of realigning tracks to allow higher speeds. The station, fortunately, still retains considerable ambience of past glories, whilst being tastefully updated for today's passenger who, quite rightly, seeks a far greater spread of information than provided in yesteryear. The west side of the station – the west range and canopy – were given Grade II listing on March 10, 1988. (LNER)**
RIGHT: **After the cathedral, the second most imposing structure in the city of Durham is the viaduct. Dating from 1857 when the Leamside-Durham-Bishop Auckland line opened to traffic on April 1 of that year, it became part of the main east coast route from January 1872. It has 11 arches of 60ft width. Crossing the imposing structure and approaching the station on April 4, 2019 is power car 43277 leading the 1500 King's Cross-Stirling. Sister 43305 was on the rear.** (Robert Pritchard) BELOW: **This is the north end of Durham station with DVT 82207 leading the 1600 Edinburgh-King's Cross on April 4, 2019 (91106 is powering at the rear). The service has just completed the shortest distance between two LNER-managed stations – 14 1/2 miles.** (Robert Pritchard)

Known for its stunning Norman cathedral and castle, Durham has long been an important staging post.

ABOVE: **What a backdrop! The magnificent cathedral dominates the Durham skyline as it has done for 1,000 years. Its correct name is the Cathedral Church of Christ, Blessed Mary the Virgin and St Cuthbert of Durham and it is regarded as one of the finest examples of Norman architecture in the country. The cathedral and castle adjacent to the station were awarded UNESCO World Heritage Site status in 1986. Dominating this LNER train is the venerable Class 91 91131, a mere 29 years old at the time of this photograph. It is propelling the 1630 Edinburgh-King's Cross service on May 15, 2019, non-stop through Durham.** (Stephen Spears)

Durham's station was built by the North Eastern Railway in 1857. This was on the NER's route from Leamside to Bishop Auckland. By 1871, the NER had built a line from Tursdale in the south, through Durham station then north to Newcastle via the Team Valley – this then became the main line, now the East Coast Main Line, from January 15, 1872.

Great North Eastern Railway, the first franchise holder of the East Coast route, refurbished Durham station in the two ➘

Durham

Serving a population of 47,785 (2011 census)

254miles, 53 chains (409.8m) from London King's Cross

Passenger usage 2.823 million (2018/19)

Interchange passengers 3,983

Platforms: Two

years from 2006. Since then, Durham County Council has improved access by constructing a cycleway and the latest improvement has seen platform one (southbound) extended to 230 metres to accommodate the Azuma trainsets. The west side (range and canopy) is listed.

The reason why there is a different – and some would say, incongruous – non-matching platform awning on the up platform for trains to the south is that in 1969, to speed up the Deltic-hauled expresses, it was necessary to re-align the tracks to improve the approach speed of the up main line onto the viaduct. The up centre line was removed to permit re-alignment.

Three years later, all of the tracks were moved to the east, this necessitating narrowing of the up platform and, regrettably, the demolition of Thomas Prosser's attractive veranda (in the same style as the one on the down platform). The replacement structure has been quoted as "inelegant" and "clumsy".

Besides LNER, services are operated by CrossCountry, Northern and TransPennine Express. LNER

ABOVE: **Putting things into perspective: The new order at Durham – August 19, 2019 was the first day of Azuma services on the King's Cross-Edinburgh route. This is the 1730 from London King's Cross of that day slowing to a stop at the shire capital. A sizeable proportion of the 700,000 annual visitors to the cathedral use the station for this purpose and Durham is often on the charter train itineraries.** (Dave Hewitt) BELOW: **LNER is in the twilight zone – darkness descends on Durham on September 30, 2019 as a southbound IC225 makes its way off the viaduct and heads towards the next stop at Darlington and the 'Cross.'** (Stephen Spears)

Peterborough

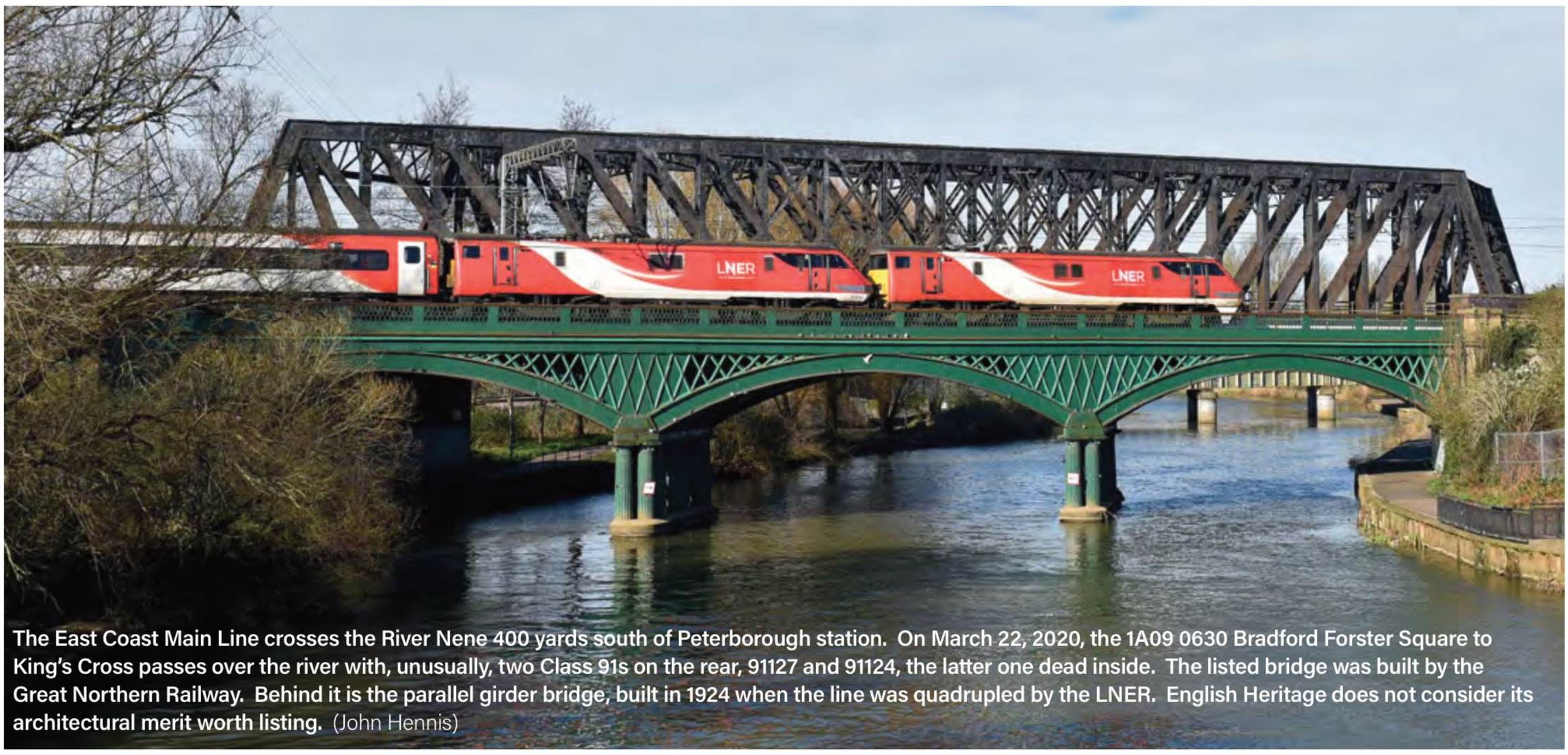
Less than an hour from the capital, Peterborough is well inside the new commuter belt.

Powering through on the up fast line is the 1A31 1315 from Leeds to Kings Cross. The date was March 6, 2020. DVT 82220 is up front, with Class 91 91105 propelling. The platform which the 1A31 is passing is a fairly recent addition. Originally, there was a plan to have a segregated, dedicated platform here for north of London Eurostar services which never came to fruition. Peterborough station is very much utilitarian. Only the 1852-built Great Northern Hotel opposite the entrance exudes any ambience and character of a bygone era. (Murray Brown)

Investors are being sought for a £43m planned development for Peterborough station and the area, to the west of Peterborough city centre, will be known as the 'Station Quarter.' This includes two multi-storey car parks, one on the site of the large existing ground level car park to the east of the lines and the second in Midland Road to the west side of the station. This is anticipated to reduce the traffic on Bourges Boulevard and the Queensgate roundabout and make access to the city centre more accessible for pedestrians. The Grade II listed Great Northern Railway Hotel and other historical railway buildings will, of course, remain. One of these is the Grade II* listed Crescent Wagon Shops, built by the Midland Railway and situated alongside Midland Road. The project is a collaboration involving LNER, Network Rail, Peterborough City Council and the Cambridgeshire and Peterborough combined authority.

Peterborough is one of UK's stations which offers a choice of services to the capital. LNER provides the 125mph fastest services, whilst Great Northern (part of Govia Thameslink Railway) offers the alternative, slower (1hr 10 mins) and cheaper service to London, most trains of which continue through London St Pancras International south to Horsham. These are formed of the 12-coach Class 700 EMUs. However, there is only LNER to take passengers north of Peterborough because Grand Central and Hull Trains are not permitted to set down or pick up at the station, this being to stop commuters using them, resulting in unfilled seats going north or overcrowding going south.

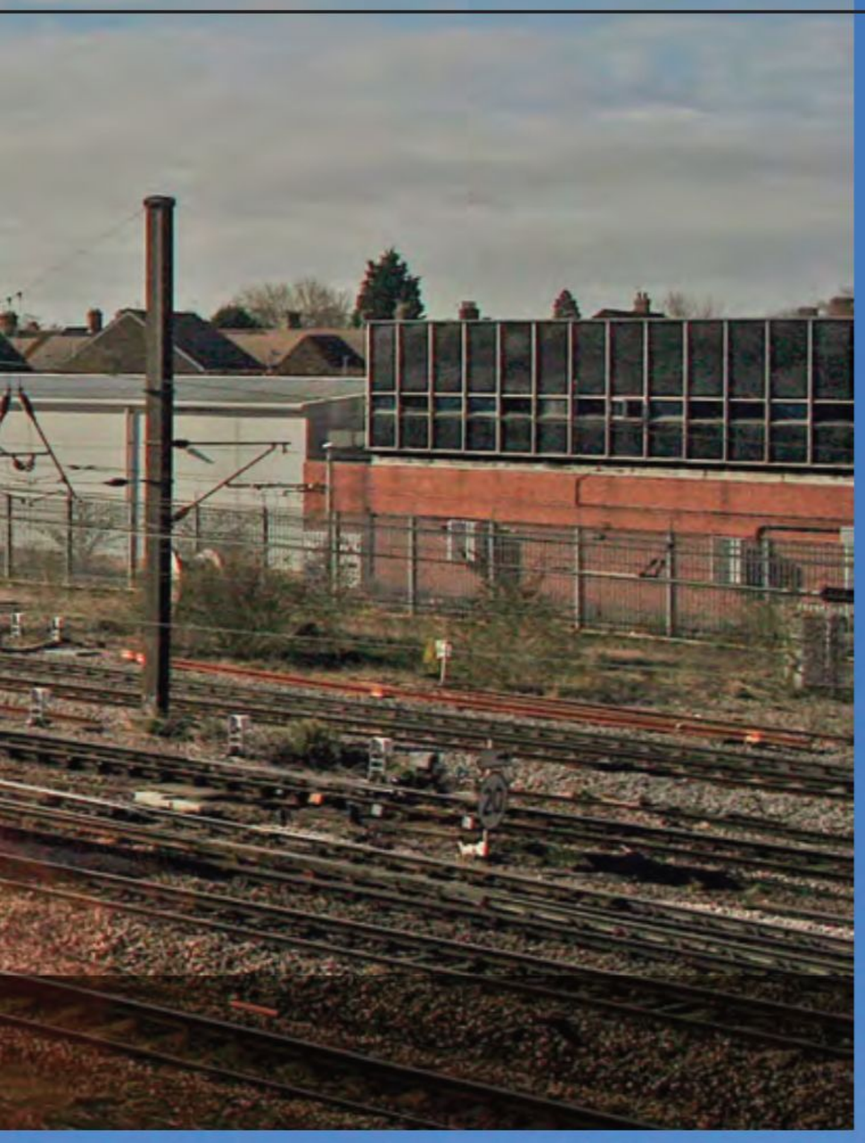
Besides LNER, services are operated by Great Northern, CrossCountry, Greater Anglia and East Midland Railway.



The East Coast Main Line crosses the River Nene 400 yards south of Peterborough station. On March 22, 2020, the 1A09 0630 Bradford Forster Square to King's Cross passes over the river with, unusually, two Class 91s on the rear, 91127 and 91124, the latter one dead inside. The listed bridge was built by the Great Northern Railway. Behind it is the parallel girder bridge, built in 1924 when the line was quadrupled by the LNER. English Heritage does not consider its architectural merit worth listing. (John Hennis)

Nine-coach all-electric 801223 was on mileage accumulation runs in early March 2020. Forming a 5Q82 0902 Peterborough-Darlington trip, this new Azuma pulls out of Peterborough station on March 3 to gain the down fast line north. Peterborough Power Box is on the far right – signalling control from this location will soon be displaced by the Regional Operating Centre at York. (Murray Brown)

LEFT: **91104 bowed out of service with LNER on Monday January 27, 2020. It propelled the 1E20 1500 Edinburgh-King's Cross, seen here at its last stop at Peterborough. It wasn't quite the intended finale, for 91104 was reprieved and returned to service the next day, but only for a few services before finally being withdrawn.** (Murray Brown) RIGHT: **Just under five miles north of Peterborough can be found a rarity – a manually operated gated level crossing. It is the last, but one, such crossing on the East Coast Main Line - quite a distinction when 125mph trains are operating. The other survivor is Grassthorpe Lane level crossing between Newark and Retford. The crossing is on Peterborough's popular 'Green Wheel' route used by many walkers, cyclists and horse riders. On March 21, 2020, the 1030 from King's Cross hurries past, en route to Edinburgh.** (Murray Brown)



Peterborough

Serving a population of 201,041 (mid 2019 est)

Originally built by the Great Northern Railway in August 1850

76 miles 29 chains from London King's Cross

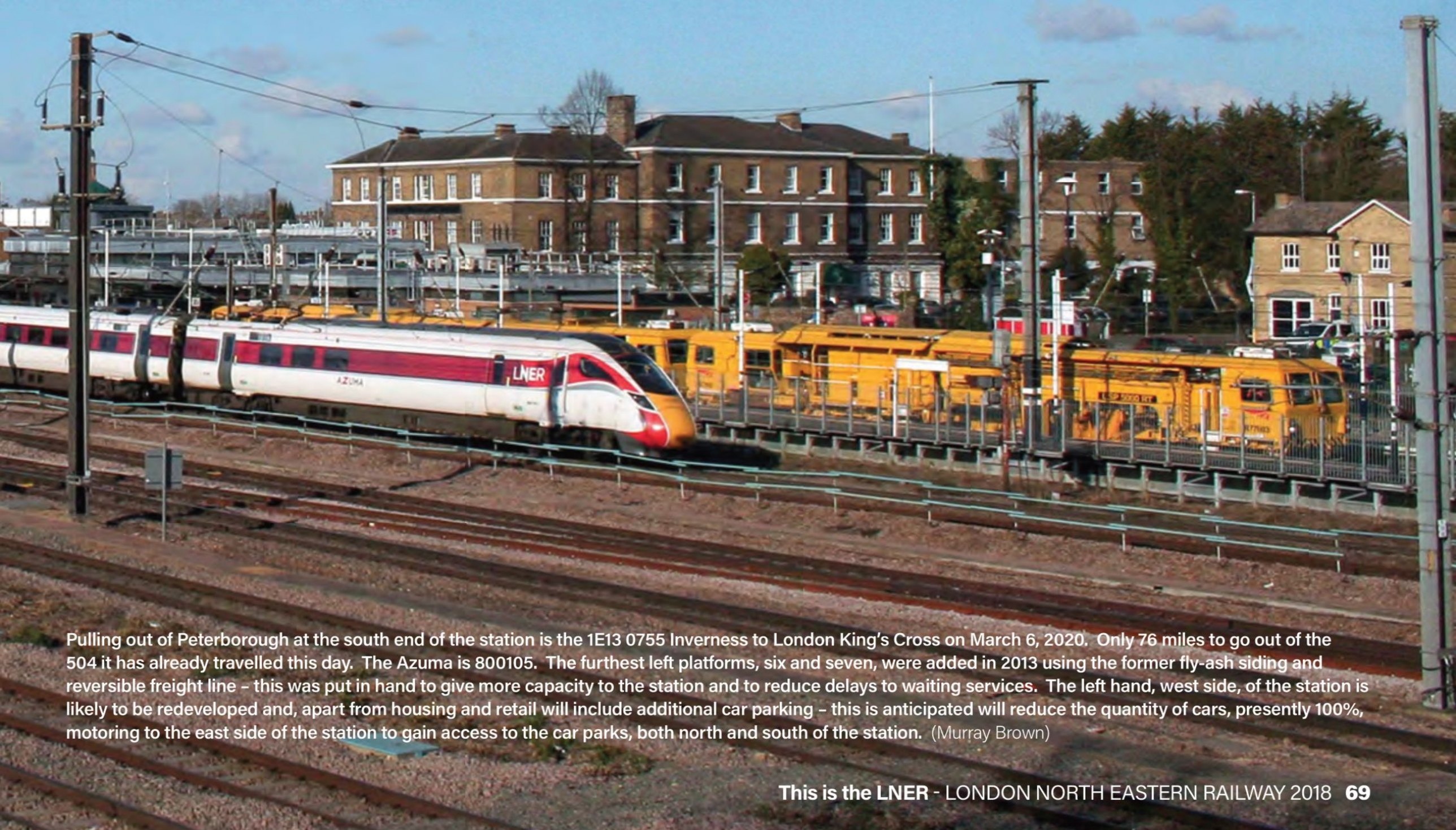
Passenger usage 5.060 million (2018/19)

Interchange passengers 1.060 million

Extensively remodelled in the early 1970s, eradicating the notorious 25mph 'dog leg' through the station. Non-stop trains travel at 105mph

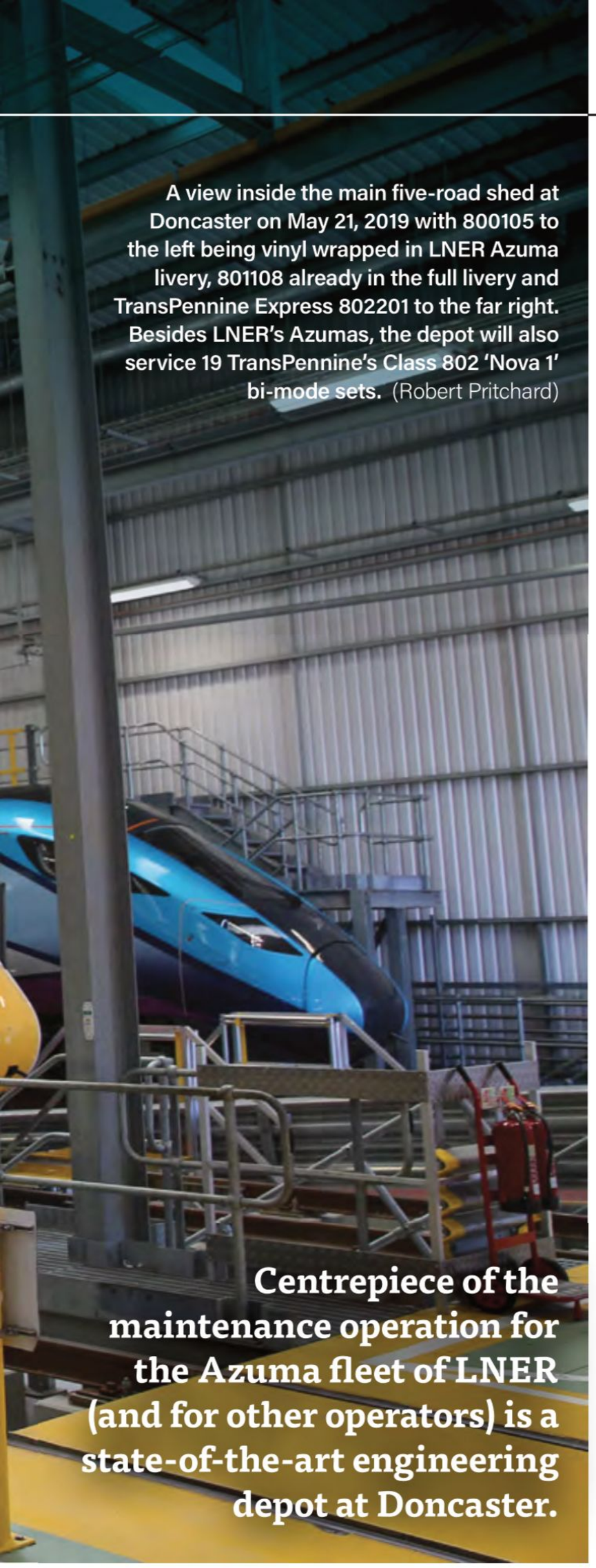
Platforms Seven

ABOVE: **October 2, 2019 and a special working, 5Q20 0738 Heaton Traction Maintenance Depot-Peterborough, has just arrived at Peterborough's platform one. It is sitting under one of Peterborough's best known landmarks, the Crescent bridge. Following its refurbishment early in this century, a plaque was unveiled by the Peterborough Civic Society which reads: The bridge was built for the Great Northern Railway at a cost of £34,000 to replace two troublesome level crossings and a subway. It was opened by the Mayoress Mrs JG Barford on 16 April 1913. The original Crescent of 1830s houses was demolished to make way for the bridge. The steelwork and main 48.7 metre bow string lattice span was built by Cleveland Bridge and Engineering Company of Darlington and the bridge was refurbished in 2001 by Jackson Rail. Perhaps it's time for Network Rail to attend to the encroaching vegetation!** (Paul Townsend)

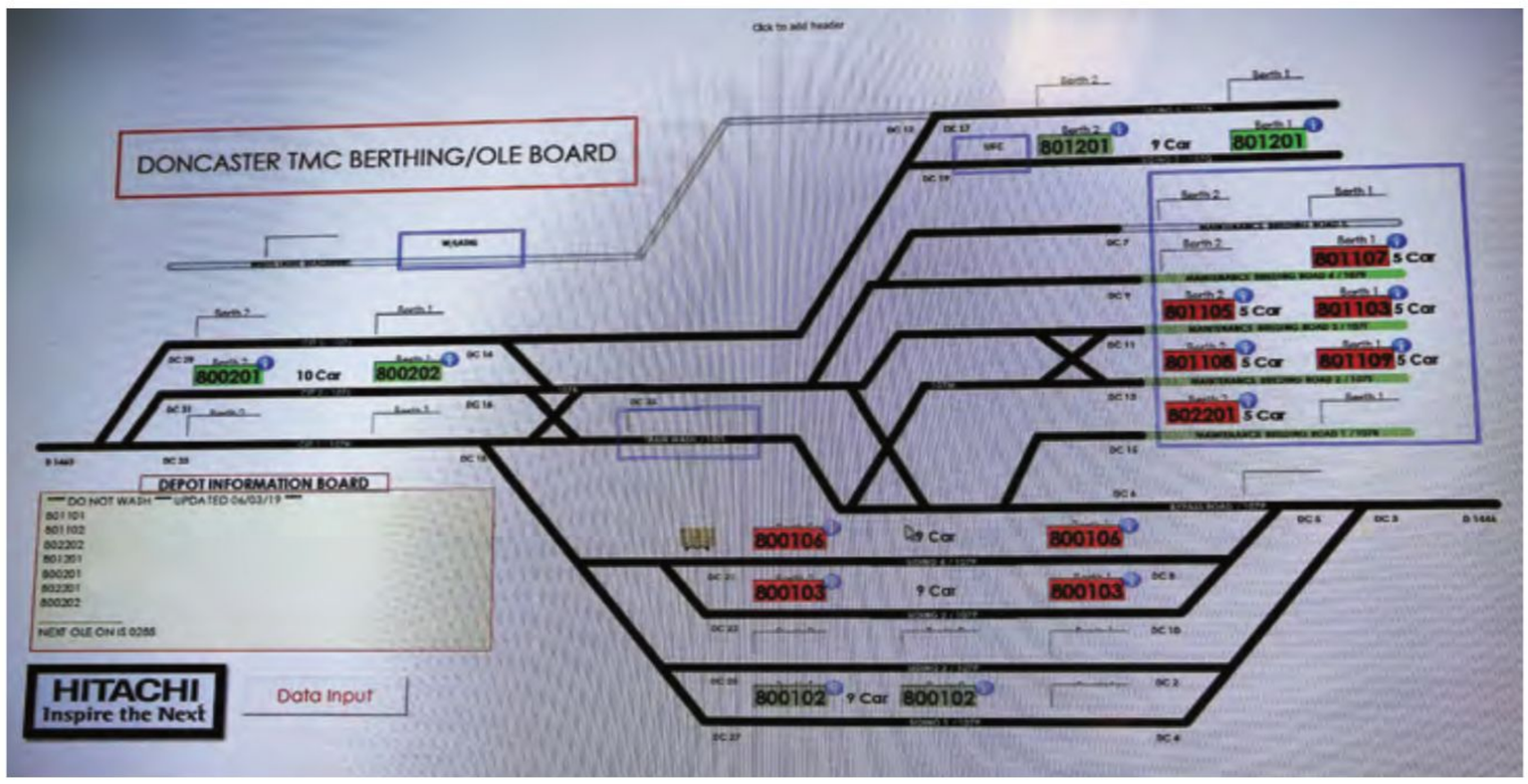


Pulling out of Peterborough at the south end of the station is the 1E13 0755 Inverness to London King's Cross on March 6, 2020. Only 76 miles to go out of the 504 it has already travelled this day. The Azuma is 800105. The furthest left platforms, six and seven, were added in 2013 using the former fly-ash siding and reversible freight line – this was put in hand to give more capacity to the station and to reduce delays to waiting services. The left hand, west side, of the station is likely to be redeveloped and, apart from housing and retail will include additional car parking – this is anticipated will reduce the quantity of cars, presently 100%, motoring to the east side of the station to gain access to the car parks, both north and south of the station. (Murray Brown)

Maintenance Matters



A view inside the main five-road shed at Doncaster on May 21, 2019 with 800105 to the left being vinyl wrapped in LNER Azuma livery, 801108 already in the full livery and TransPennine Express 802201 to the far right. Besides LNER's Azumas, the depot will also service 19 TransPennine's Class 802 'Nova 1' bi-mode sets. (Robert Pritchard)



The berthing diagram in Carr depot, showing the whereabouts of all the Azumas on hand. To show orientation, Doncaster station is to the left of this diagram. Carr depot now has its own power supply – previously, this was included as part of the East Coast Main Line energy provision. (Robert Pritchard)

Owned by Network Rail, the Doncaster Carr Maintenance Depot is leased to Agility Trains East, the specialist company that works with the Department for Transport in implementing the InterCity Express Programme which sees the wholescale introduction of AT300 trains on the Great Western and East Coast Main Lines. Hitachi operates the depot.

Doncaster Carr has been the site of a locomotive maintenance depot since 1876 when the Great Northern Railway erected a 12-road steam shed. Modernised in the 1950s, the depot passed into the ownership of English, Welsh and Scottish Railway, later to become DB Cargo. It closed in April 2014.

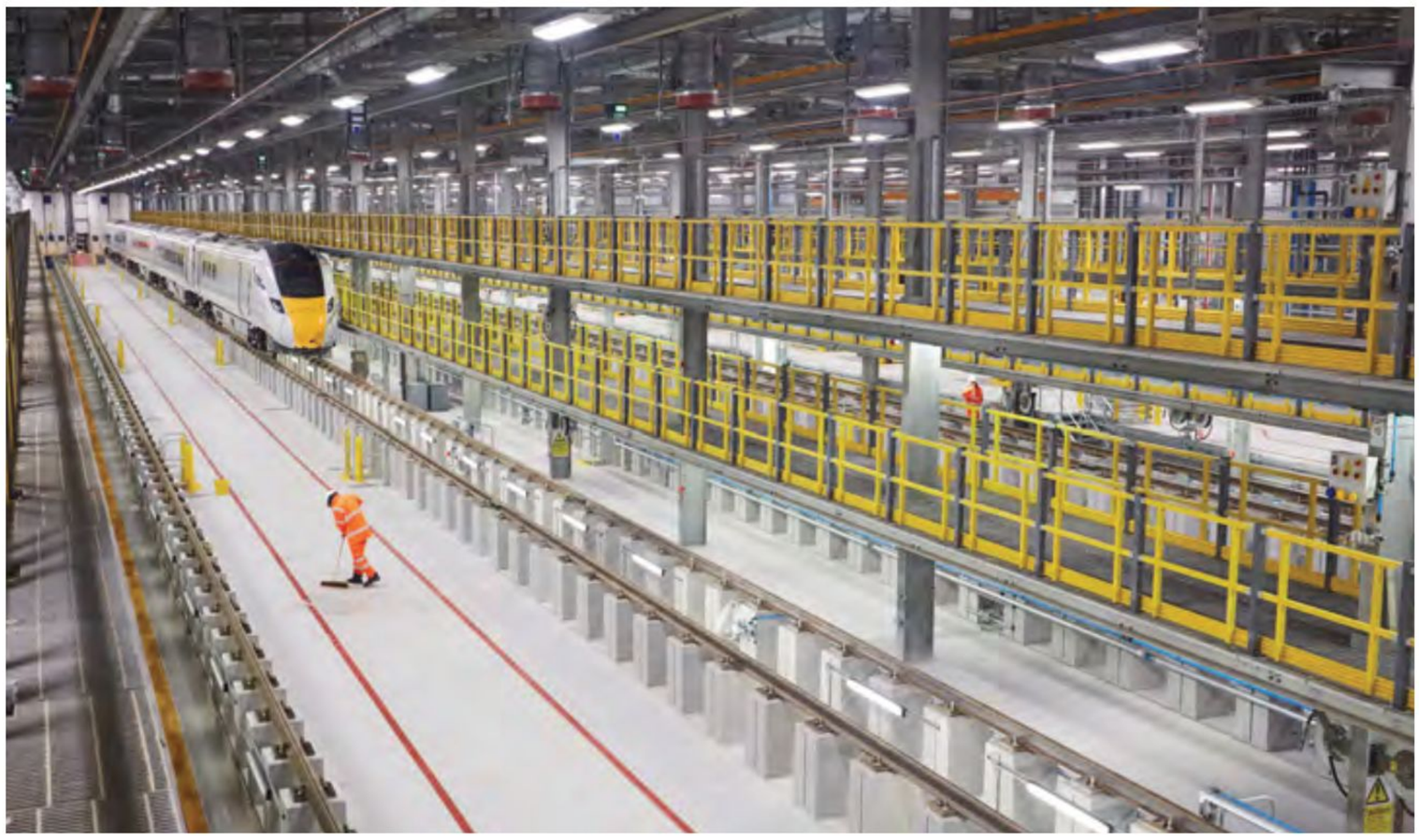
Planning for the new Azuma facility was submitted in 2010 and was for a building 262 metres long capable of accommodating 10-coach AT300 trains. Experience gained with the Ashford depot which services the Class 395 'Javelin' units for Southeastern influenced the design. Construction began in December 2014 when all earlier buildings were demolished. The first job was to remove contaminated soil which was treated on site and re-used on the scheme – excellent recycling! The 11,000 square metre shed required 2,250 piles and over 1,000 tonnes of steel were used in the three buildings constructed. The main contractor was VolkerFitzpatrick, with RPS Group being the project architects. The depot has cost £82 million. ➘

Centrepiece of the maintenance operation for the Azuma fleet of LNER (and for other operators) is a state-of-the-art engineering depot at Doncaster.

BELOW LEFT: **Nine-car bi-mode unit 800105 and unbranded pre-series five-car bi-mode unit 800202 stand in the stabling sidings outside Doncaster depot on May 21, 2019. Doncaster Carr will be responsible for maintaining all the bi-mode fleet as well looking after TransPennine's 'Nova 1' units. The five Hull Trains' AT300 units will be based at Bounds Green. (Robert Pritchard)** BELOW: **In all over white livery, pre-series nine-car electric unit 801201 stands outside the Hitachi depot at Doncaster on May 21, 2019. All 30 of the 800/2 all-electric Azumas will be based at Bounds Green depot for maintenance, although Carr depot may well assist as required. These 800/2 units, in effect, replace the fleet of Class 91/Mk.4s in the fullness of time.** (Robert Pritchard)

There are four stabling sidings to the west of the depot, each capable of taking 10-coach Azumas. Outside of the depot, there are 14 stabling positions – these are measured in half-sets, a nine-coach Azuma would count as two half sets. The equivalent of 12 1/2 trainsets will return to Carr depot on each evening for stabling or maintenance. Basking in the sunshine are, left, 800106 and, right, 800102. The East Coast Main Line is behind the forest of silver birch trees on the right hand side. (Robert Pritchard)

LEFT: **A general view of the outside of the Hitachi Doncaster depot, with the main shed to the left, the train wash in the foreground and Azuma units 800106 and 800103 stabled in the sidings to the right on May 21, 2019. Four kilometres of track for the depot were installed by Volker Rail. For this, 25,000 tonnes of ballast were laid. (Robert Pritchard)** RIGHT: **The cavernous extent of the new depot is illustrated here with this picture taken on January 17, 2017 showing a pre-series five coach AT300 destined for the Great Western Railway. With modern technology to the forefront in both new traction and the facilities to maintain them, isn't it nice to see good old-fashioned cleaning methods still in use! The fifth road, to the left out of the picture, is non-wired. Mechan lifting jacks – manufactured just down the road in Sheffield - are spread throughout its length and can raise an entire 10-coach set. This road contains individual wheel loading measurement equipment, this being used to ensure there is equal weight distribution. (Hitachi)** BELOW RIGHT: **Doncaster Carr steam shed (code 36A) closed on April 17, 1966. It continued for over four decades as a diesel maintenance dept, coded DR, particularly in later years, for the maintenance of Class 08 shunters. Its last owner was DB Cargo. Now the tradition of a traction maintenance facility will live on for at least another three decades as Hitachi's build and maintenance contract is for 27 1/2 years. With only the occasional passing by on the adjacent ECML of an A4 or Deltic to recall the by-gone memories of Carr depot as was, the new order, a five-road depot, is pictured on a wet January 17, 2017. (Hitachi)** BELOW: **Numbers 800103 (right) and 800106 (left) are seen stabled at the Hitachi Doncaster depot on May 21, 2019. In front of 800106 is the resident Zephir 10000 battery-electric Crab shunter.** (Robert Pritchard)



Wakefield Westgate

Like Newark, Wakefield boasts two stations, unmanned Kirkgate managed by Northern and this one on the ECML under the wing of LNER.

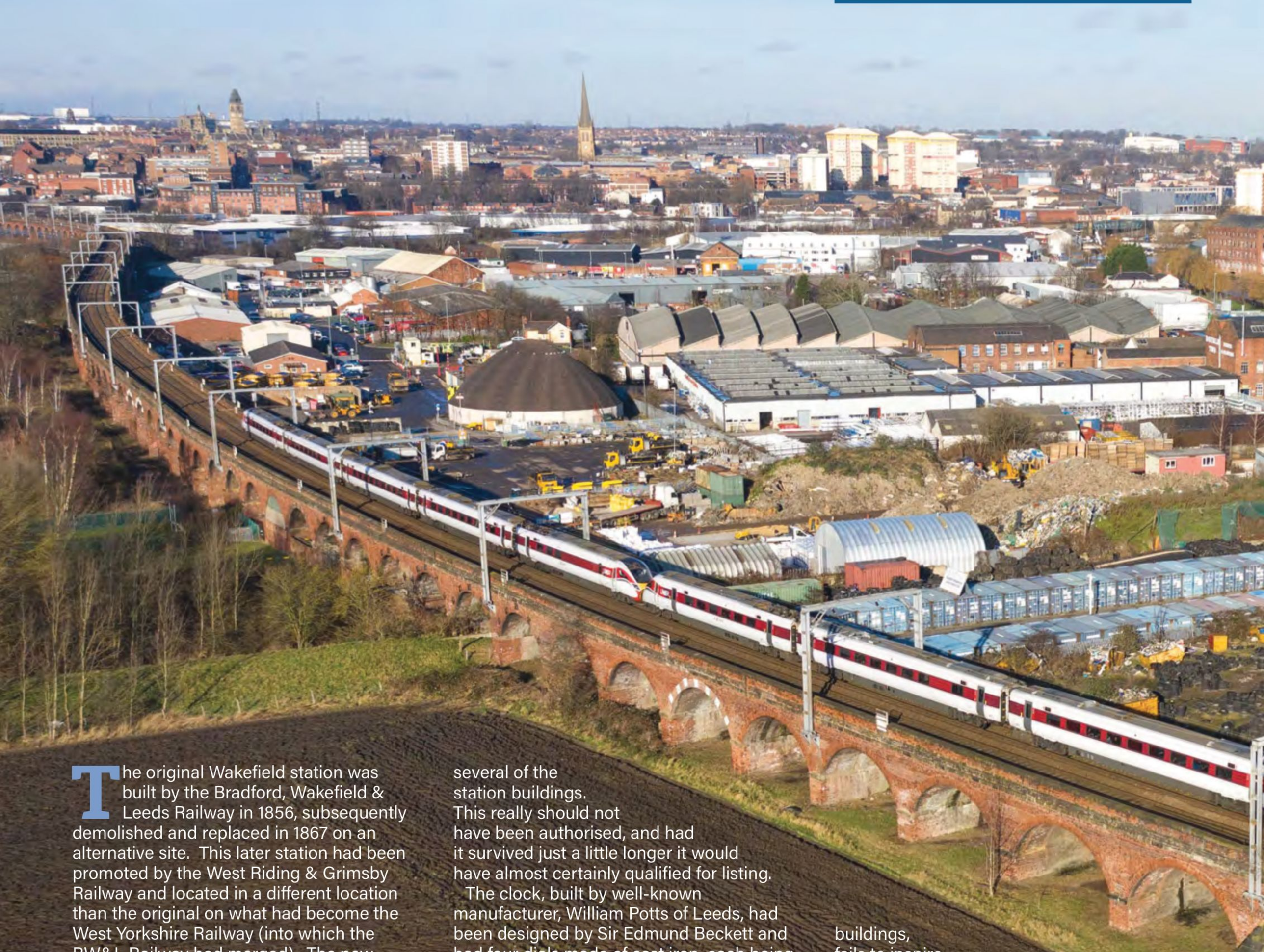
Wakefield Westgate

Serving a population of 76,886 (2011 census)

10 miles (16km) south of Leeds on the Leeds-Doncaster route

Passenger usage 2.472 million (2018/19)

Number of platforms: Two



The original Wakefield station was built by the Bradford, Wakefield & Leeds Railway in 1856, subsequently demolished and replaced in 1867 on an alternative site. This later station had been promoted by the West Riding & Grimsby Railway and located in a different location than the original on what had become the West Yorkshire Railway (into which the BW&L Railway had merged). The new station would be for the joint use of the West Yorkshire, South Yorkshire, Midland and Manchester Sheffield & Lincoln Railways.

The next station was built by the Great Northern, Midland and Northern, and Lancashire & Yorkshire Railways, being designed by JB Fraser of Leeds. The station had a turret but no clock, but following pressure from the Wakefield Tradesmen's Association, the clock was added in 1880 – and what a clock! In fact, this wonderful structure dominated Wakefield until it was scandalously demolished in 1967, along with several of the station buildings. This really should not have been authorised, and had it survived just a little longer it would have almost certainly qualified for listing.

The clock, built by well-known manufacturer, William Potts of Leeds, had been designed by Sir Edmund Beckett and had four dials made of cast iron, each being 7' 6" diameter. The hands were copper, painted black with a gilt line in the centre. It was seen as one of the most eccentric clock towers in the country; a fusion of Art Nouveau and Gothic styles and stood 97 feet high. On its top was a cast-iron lantern and a gilded weathervane. Those from the 1960s' era will fondly remember Westgate station for this architectural gem. They certainly will not remember the present station in future decades. It was rebuilt in 2013, a modern functional structure which does what it says on the tin but, like so many modern station buildings, fails to inspire. Official re-opening of the £8.8m station took place on February 3, 2014.

The station is well served by main line and local services. Two that were lost under the Beeching regime in the 1960s were those to Bradford via Morley Top (July 4, 1966) and that to Castleford which used the five-mile Methley Joint line (November 2, 1964).

Besides LNER, Westgate is also served by Northern, East Midlands Railway and CrossCountry.

Here is the first booked Azuma service train arriving at Westgate station en route from King's Cross to Leeds, the start of a new era on Leeds services. Number 800113 officiated with the 1D11 1103 from London. The date was May 15, 2019. (Steve Chadwick)

A pair of LNER Azumas head south from Wakefield Westgate across the River Calder with the 1A30 1245 Leeds to London King's Cross service on January 20, 2020. They are coming off the famed 99 arches viaduct. (Steve Arthur)

ABOVE: **On the third day of the HST farewell tour, the repainted HST set was unusually held In the middle road at Wakefield whilst a Kings Cross–Leeds train passed with another LNER veteran 91106 in charge. (Inspiring Images)** LEFT: **Deputising for a Class 91, hired in Class 90 90028 sets out propelling the 0916 Leeds-London King's Cross service from Westgate station, next stop Doncaster. The date was January 16, 2019. It had been named Sir William McAlpine at the National Railway Museum in an event with 60103 Flying Scotsman the previous week which explains why the locomotive is so clean. (Malcolm Braim)** BELOW LEFT: **Looking south from the footbridge towards Doncaster, the 0733 from King's Cross to Leeds draws in on November 15, 2018 behind Class 90 90028. This locomotive was replacing an unavailable Class 91. Although with a top speed of only 110mph, the hired in Class 90s were a useful standby for LNER and were used on the services from London to Leeds, York and Newark. The Azuma revolution brought about the cessation of Class 90 duties for LNER. (Peter Marsh)** BELOW: **Crossing Walton viaduct, Class 91 91132 slows the 1D10 1033 King's Cross to Leeds service to stop at Wakefield Westgate on January 20, 2020.** (Malcolm Braim)

Darlington Bank Top

Birthplace of the Stockton and Darlington Railway, the town continues a long association with the rail industry.

The original Bank Top station was built by the Great North of England Railway, opening on March 30, 1841. Meanwhile, the Newcastle & Darlington Junction Railway opened a through route from Darlington to Newcastle on June 19, 1844. Bank Top was rebuilt in 1860 by the newly formed North Eastern Railway's architect, Thomas Prosser, whose buildings can be enjoyed to this day, including the portico at Newcastle Central and York station itself. The rebuilding of Bank Top, Darlington, was to accommodate the growing traffic, but it soon became inadequate. On July 1, 1887 North Eastern Railway opened the magnificent edifice which is Bank Top today.

For 83 years until 1975, Locomotive No 1, the first locomotive to run on the Stockton & Darlington Railway and the first to operate on a public railway, was displayed on a plinth at the end of the south bays of Darlington station. It is now in the Head of Steam Museum at North Road, Darlington.

The present structure is Grade II* listed.

Besides LNER, services are operated by CrossCountry, TransPennine Express and Northern. ➘

Darlington

Serving a population of 105,564 (2011 census)

232 miles, 50 chains (374.37km) from London King's Cross

Passenger usage 2.394 million (2018/19)

Interchange passengers 0.405 million

Platforms: Four

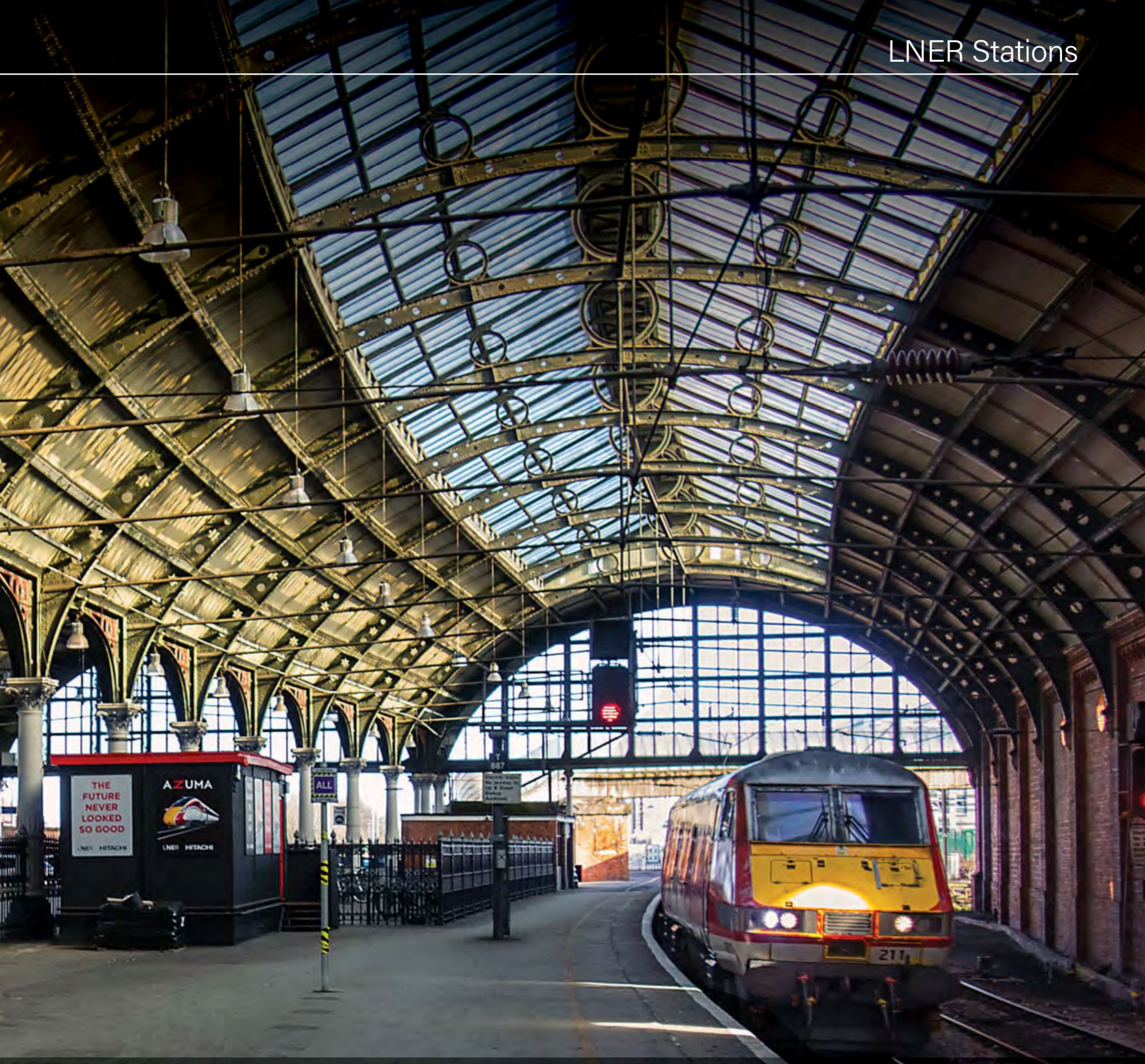
ABOVE: **'The Highland Chieftain' service, with power car 43290 leading, leaves Darlington on December 4, 2019. Within two weeks, LNER HST operation had ended. Darlington was a huge railway centre until the 1960s. North Road locomotive works saw a continuous throughput of both steam and diesel locomotives (closed April 2, 1966), whilst there was a DMU depot, the site of which is being passed by the HST. On the left side of this photograph was the site of the busy 51A steam motive power depot. This passed into history a week earlier than North Road on March 27, 1966. Nowadays, Darlington is so much cleaner, but, railway-wise, a shadow of its former self.** (Stephen Spears)

LEFT: **A Teesside University block occupies the site which was once that of the Darlington Motive Power Depot, a mass of sidings, large shed, out buildings and scores of smoking, simmering steam locomotives. Students have a fine view of the 1530 London King's Cross-Glasgow with Class 91 91126 at the helm leaving the County Durham town on April 12, 2019.** (Stephen Spears)

LEFT: **A brief history of time: This is one of two identical clocks on Darlington station, one each on the northbound and southbound platforms. They are believed to date from the third rebuilding of Bank Top station in 1887.** (Peter Marsh)

MAIN IMAGE: **The architectural splendour of Darlington Bank Top station is evident in this view as the sun illuminates the three arched design. The superbly heraldic shields can be espied above the columns, whilst, below at platform level can be seen the original ornate railings. It was fairly rare to have the public access – when built, for horses and carriages, later motor vehicles – by means of the centre arch of the station onto, in effect, an enormous centre platform. At the southern end of the station, there are bay platforms in this position. Edinburgh Waverley is another example of this entrance style when reconstructed by the North British Railway in 1892-1900. 'Waiting for a train just got exciting' says the Azuma advertisement. Entering from the north, the 0656 from Edinburgh LNER service for London arrives on March 18, 2019, with Driving Van Trailer 82211 at the sharp end.** (Stephen Spears)

ABOVE: **Platform one is under the most eastern of the three arches which make up Bank Top station. The brick wall to the left of the IC225 contains part of the original wall of the 1860 station designed by Prosser, the only surviving section of his building. Locomotive 91107 is at the rear of the 1457 departure to London on August 12, 2019. This was the 1300 from Edinburgh.** (Stephen Spears) RIGHT: **The route is set for the Main for the 1400 from Edinburgh to leave Darlington on February 6, 2020. Ahead of it is 44 miles of racing track to York where traction has been let loose over many years. Some LNER services are given 27 minutes to cover this distance. The full introduction of the Azuma fleet is likely to see further speed ups in view of the phenomenal acceleration of these trainsets.** (Peter Marsh)



Displaying their smart LNER uniforms, two of Darlington's station staff see off the departure of the 'Northern Lights' 0952 Aberdeen-London King's Cross on February 6, 2020. (Peter Marsh)

York

Home of the National Railway Museum and LNER, York remains one of the most important locations on the rail network.

York

Serving a population of 208,807 (2019 Est)

188 miles 40 chains (303.4km) from London King's Cross

Passenger usage 9.991 million (2018/19)

Interchange passengers 1.034 million

The station is Grade II listed*

Number of platforms: 11

The York & North Midland Railway was the first to reach York in 1839 with a station outside the city wall, this being replaced two years later with one inside the wall – what became known as York Old Station. Because of the inconvenient practice of having to reverse trains to proceed north, this brought about the building of the current station.

The present station was designed by the North Eastern Railway architects Thomas Prosser and William Peachey, opening on June 25, 1877. At the time, it was the largest station in the world.

Next to York station on the west side is the Regional Operating Centre, which was opened on September 16, 2014, one of 12 which will eventually cover the country. The York ROC will control from King's Cross to the Scottish Borders. It replaced the Integrated Electronic Control Centre which dated from 1988, the year when a major remodelling took place. Inside the ROC is where all LNER services are controlled from on a daily basis. LNER's headquarters office is at LNER East Coast House, 25 Skeldergate, York, YO1 6DH

With the reduction in operational platforms required and following a remodelling in association with the electrification of York station, platforms were renumbered in the late 1980s from reducing from 16 to 11.

The most recent renovation of York station was in 2009.

Besides LNER, services are operated by Northern, CrossCountry, TransPennine Express, Grand Central and East Midlands Railway. ➘

ABOVE: **Azuma 800111 arrives at York on December 18, 2019. This was a driver familiarisation run. The Azuma is entering the bay platform six – often used by LNER services starting and terminating at York.** (Robert Mann) RIGHT: **A line-up of old and new at the south end of York station on February 21, 2020. A LNER staff member is seeing off southbound 1E16 1300 from Edinburgh, led by Driving Van Trailer 82219, whilst in the bay platform six is sister DVT 82217 which will form the 1Y88 1603 to London. The new order is represented on the left with a new Azuma on test.** (Mark H Lewis)

With the backdrop of the Regional Operating Centre (ROC), 800103 on a mileage accumulation run, 5Q02 0711 Peterborough-York, enters bay platform six at York on April 4, 2019. This was a month before regular Azuma services started operating between York and London. This image illustrated how York has changed so dramatically in 50 years. The £26 million ROC was opened in September 2014, becoming operational the following January. It will be eventually be responsible for signalling the entire East Coast Main Line from King's Cross to the Scottish Border. Going back 60 years, on this site stood North Eastern Railway roundhouses which were demolished circa 1960 and of which the foundations were revealed when preparatory work started on this building. (Robert Pritchard)

ABOVE: **Spotlight on a celebrity: The noisy blower motors take a break as 91119 pauses at York with the 0900 from London To Edinburgh on April 20, 2020. The shaft of sunlight illuminates the uniquely liveried Class 91, adorned in the pleasing InterCity 'Swallow' colour scheme and recalling the pre-privatisation era of the railway system. It was painted into its as-built livery in 2018 to mark 30 years of the class, this being undertaken at Bounds Green depot. LNER is one of several Train Operating Companies to recognise the beneficial publicity of recreating the past era with bringing back former livery styles. Now what 91119 really needs is a set of Mk.4 trailers in the same colour scheme. Over to you, LNER! (Ron Cover)** LEFT: **All change: It will be for the Class 91 fleet survivors but not until December 2021 or, later. At the blocks on platform six is 91108 having arrived with the 0706 from London and which will form the 1002 back to London. This was 91108's last day in service with LNER and the first Class 91 to be withdrawn. Passing is 91115 in charge of the 0730 King's Cross-Edinburgh. The decision by LNER managers to delay the final withdrawals of the Class 91 fleet – envisaged in the InterCity Express Programme – will mean overhauls will have to restart, presumably at Wabtec, Doncaster which traditionally has undertaken heavy repairs on this loco type and trailers.** (Robert Pritchard) BELOW LEFT: **Epitomising the sheer magnificence of this beautiful station cathedral and showing why it has Grade II* listed status is this portrait. The picture is taken from the 1938 footbridge. Attention to detail is apparent everywhere in this building, ranging from the ornate painted heraldic shields to the superb North Eastern Railway slotted signal in the entrance (which came from Flaxby on the Scarborough branch). In later years, extra care was taken in the way the station area was energised with 25kV overhead lines, the non-provision of barriers (an earlier operator was refused planning permission) and even the modern Regional Operating Centre building to the west of the platforms was deliberately brick clad when its 13 sister ROCs are not. York station really does take some beating in terms of combining past and present. Through the girders can be espied 91130 leaving with the 0630 from Newcastle to the 'Cross.'** (Gordon Edgar)

Retford

At the crossing point of the East Coast Main Line and the Sheffield to Lincoln cross country route.

Retford

Serving a population of 22,013 (2011 census)

The present station was opened by the Great Northern Railway on August 1, 1852

138 miles 49 chains (223.1km) from London King's Cross

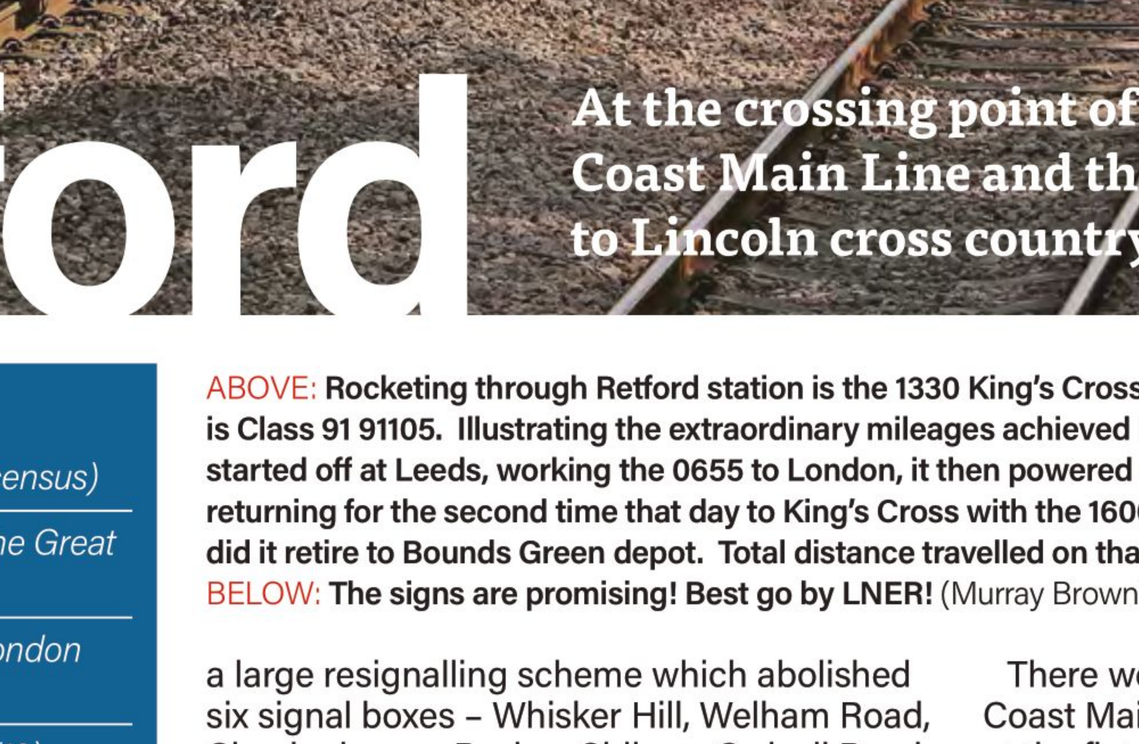
Passenger usage 0.520 million (2018/19)

Interchange passengers 0.101 million

Number of platforms four

ABOVE: **Rocketing through Retford station is the 1330 King's Cross-Edinburgh on August 25, 2018. Atop is Class 91 91105. Illustrating the extraordinary mileages achieved by the class is the fact that 91105 started off at Leeds, working the 0655 to London, it then powered the train seen here to Edinburgh before returning for the second time that day to King's Cross with the 1600 from the Scottish capital. Only then did it retire to Bounds Green depot. Total distance travelled on that day – 972 miles.** (Robert Pritchard)
BELOW: **The signs are promising! Best go by LNER!** (Murray Brown)

Retford station was renowned for its flat crossing of the Sheffield-Gainsborough line with the East Coast Main Line. This was abolished in 1965 when the former then dived under the ECML. This project also meant the north-east curve connection from the GNR main line was lost. Two new lower platforms on the Sheffield-Gainsborough line were provided, connected to the main station by a walkway, these platforms being originally numbered four and five but are now numbered three and four. Work started in 1963 and included a large resignalling scheme which abolished six signal boxes – Whisker Hill, Welham Road, Checkerhouse, Rushey Sidings, Ordsall Road and Gringley Road. Some 350,000 tonnes of soil were removed to make the cutting and underpass and 26,000 tonnes of concrete were used in its construction. Thereafter, the underpass for the GCR lines made a large contribution to punctuality on both routes.



There were two signal boxes on the East Coast Main Line, these being Retford South, at the flat crossing itself, and Retford North. The south box controlled the former GCR lines crossing the ECML ones. This ceased to control the Sheffield-Gainsborough line trains when the dive-under was opened, and this signal box lasted until May 27, 1968. Retford North box was abolished on April 26, 1976, swept away in the remodelling scheme to allow High Speed Trains a faster transit of the station area. This also involved drastic track and infrastructure alterations to the down platform, resulting in the one we see today. After April 1976, control of the Retford area was by means of a panel in the relay room, this later being superseded when control passed to the power signalling centre at Doncaster.

Besides LNER, services through Retford are operated by Northern and Hull Trains. ↘

18+

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ABOVE: **A quiet Sunday at Retford. Class 91 91121 gets underway, propelling the 1Y82 1002 York-London King's Cross on April 3, 2019. Fortunately, the up platform from which this train is leaving still retains its historical ambience.** (Chris Booth) LEFT: **Azuma 800113 passes through Retford as 5Q32 1303 York to Peterborough driver training run on February 12, 2019. Peterborough has been the destination for many of the driver training and mileage accumulation runs, particularly from Doncaster IEP depot.** (Chris Booth) BELOW: **The 1A25 0945 Leeds-King's Cross, led by Driving Van Trailer 82206, passes Retford station, seen in the distance, and crosses the former Great Central Railway Sheffield-Gainsborough lines. It's hard to believe that the GCR lines crossed the ECML on a flat crossing in the vicinity of where the second trailer car is. There was a north-east curve from the end of the station platform to join the GCR line, so allowing Sheffield-Gainsborough trains to call at Retford. All this was swept away in 1965 when the new dive-under was opened, with two new low level platforms, connected by a path to the main station.** (Chris Booth)

ABOVE: **Azuma 800113 stands in Platform two at Retford with 5Q20 0922 Doncaster Carr IEP Depot to Retford staff training run on April 3, 2019. It is unusual to witness a train arrive from the north into this platform, but on this occasion, it was heading back north on its training duties. LNER staff have one of the most eye-catching uniforms and perpetuate the basic red for which Virgin Trains was so well known on both the West Coast and East Coast services. The former GNR buildings survive on the left, occupied by Network Rail staff. The spartan, functional, down platform, devoid of any meaningful facilities, almost looks out of place compared to the up side main station platform which still retains much of its original identity.** (Chris Booth)

BELOW: **Passing the former Great Northern Railway warehouse, now a fitness studio, are two five-coach bi-mode Azumas, 800203 and 800206, taking the platform line with the 1A32 0936 Harrogate-King's Cross. The date was March 21, 2020.** (Chris Booth)

LNER Divers

Engineering work is a constant disruption to train operators, but a necessity.

On the East Coast Main Line, because of its 393-mile length to Edinburgh, notwithstanding onwards to Aberdeen and Inverness, there are well known diversionary routes, some of which are particularly lengthy and time consuming. The three main ones are featured in this portfolio – the Fenland route from Hitchin to Peterborough via Cambridge, Ely and March, the Great Northern & Great Eastern 'Joint' line from Werrington Junction, Peterborough to Black Carr Junction, Doncaster and the Tyne Valley line together with the associated West Coast Main Line (Newcastle-Carlisle-Carstairs-Edinburgh). ➘

RIGHT: **Hired-in East Midlands Trains-liveried 43061 brings up the rear of the diverted 0755 Inverness-King's Cross (led by 43277) as the train - running an hour late - passes Saxilby, between Gainsborough and Lincoln on August 26, 2019. Services were diverted via Lincoln and the 'Joint' line over the whole August Bank Holiday weekend because of engineering works on the East Coast Main Line. The station buildings date from 1849 when the Great Northern Railway constructed the line from Lincoln to Gainsborough, it later passing to the joint company, GN&GEJR.** (Robert Pritchard)

Bi-modal 800206 crosses Beggars Bridge, Turves (between March and Peterborough), on January 18, 2020 with the 1S08 0730 King's Cross to Edinburgh. Hitchin-Cambridge-Ely-March-Peterborough is an extensively used diversionary route, made operationally easier these days by the numerous bi-modal Azuma units. (John Hennis)

ions

ABOVE: **The Newcastle-Carlisle route is never far from the River Tyne and River South Tyne. Ridley Hall bridge was originally built by the Newcastle & Carlisle Railway in 1838, a wooden structure – it was rebuilt by the North Eastern Railway in 1907 by Sir William Arrol & Co. The stone piers are from the original 1838 structure. Azuma 800103 is crossing the River South Tyne on October 12, 2019 with the 1S12 1030 King's Cross-Edinburgh.** (Peter J Robinson) INSET: **Wylam's signal box name looks incongruous being in corporate lettering and not in keeping with the superb North Eastern Railway structure which dates from circa 1897. Indeed, both Wylam and Hexham boxes are listed buildings! The NER influence is completed by the distinctive footbridge. Passing both, en route to Newcastle and thence the south, is the 0742 Edinburgh-London King's Cross HST on October 12, 2019, led by power car 43295.** (Finbarr O'Neil)

A trip along the Tyne Valley was always a pleasant interlude on account of the wonderful scenery, embracing plenty of North Eastern Railway architecture, lengthy running alongside the River Tyne and crossing it three times, as well as spying the remains of Hadrian's Wall. At Haydon Bridge, the Tyne has divided into smaller rivers, this one being the River South Tyne and over which an unidentified Azuma is heading towards Newcastle at 1640 on the evening of September 29, 2019. (Dave Hewitt)

Service 1W06, the 0730 from Kings Cross to Aberdeen, is seen as it crosses the infant River Clyde on Crawford Viaduct on September 21, 2019 with 43277 leading and 43238 on the rear. This HST will have traversed the Tyne Valley line to Carlisle, then headed north on the West Coast Main Line, as depicted here, to reach Carstairs after which it would turn east to reach Edinburgh – quite a long way around. Even then, the HST would be faced with another 130 miles before attaining its final destination of Aberdeen. (Ian Lothian)

Nine-coach bi-mode 800109 cuts through the beautiful Northumberland countryside at Gilsland on September 19, 2019 with the 1S08 0824 London King's Cross-Edinburgh. When the line was built, it also cut through Hadrian's Wall. This can be seen at both extremities of this image; on the extreme left, the stone remains can be seen, whilst on the right, at the bottom of the trees, can be seen more remains, those of Poltross Burn Mile Post. (Peter J Robinson)

Lincoln's High Street level crossing was busy on November 10, 2018 when ECML traffic was sent the long way around through one of Britain's largest counties – Lincolnshire. On that day, one of the hired 'Thunderbirds' rostered for 'dragging' on the 'Joint' line was DB Cargo's Class 67 67028. Passing through Lincoln station is the 1D10 0903 King's Cross-Leeds service with Class 91 91104 dead in tow. The Class 67 had, surprisingly, been attached at King's Cross rather than at Peterborough. (John Rudd)

Farewell to the

LNER went to extraordinary lengths to mark the demise of this enduring train, so liked by the general public, after some 42 years ECML service.

It really was the end of an era – on the East Coast Main Line, that is. These trains, introduced in 1976 on the Western Region and 1978 on the Eastern played a major role in turning around BR's fortunes. They rapidly increased business and became a firm favourite with the public. They were the first trains to run at 125mph. On the Eastern, they were joined in 1988 by the IC225s (Class 91/Mk.4 stock) but the HST was always regarded as the superior ride. Although the government's order for the AT300 Hitachi trainset was to eradicate both the HST on both the Western and Eastern, there were considerations given to retaining them on ECML services, but cost implications and whether they could be converted in time to meet disability regulations eventually precluded their retention.

What LNER did to mark their cessation of ECML services was nothing short of outstanding, deserving of full credit to all those involved, and that was to put a seven-coach set into original colours for a four-day tour of old haunts: The 'Let's Go Round Again' tour embracing Inverness, Leeds and King's Cross.

Craigentinny-based set EC56 was the chosen HST. Its full nine-car formation was 41170 41118 40720 42241 42363 42242 42243 42244 44098. It's noteworthy that 41170 is an

original prototype coach, ex the prototype HST 252001.

After working the 1D26 1803 King's Cross-Harrogate on November 24, 2019 with power cars 43295 and 43319, the set ran straight to Wabtec's Doncaster workshops that evening for repainting of seven coaches. The two that weren't repainted, 42241 and 42244, were moved to Craigentinny by the same power cars on November 26th.

At Craigentinny two power cars were back into original colours (and numbers) to match the trailers, these being 43206 and 43312.

The set was released from Doncaster in blue/grey colours on December 15 and moved to Craigentinny by GB Railfreight's 66741.

The four day tour was:

December 18 – Edinburgh to Aberdeen

December 19 – Inverness to Newcastle

December 20 - Newcastle to York/Leeds

December 21 - All station stops Leeds to King's Cross

As well as the nationwide tour, the set was also used for a Craigentinny staff special around the Fife circle route on December 28.

The two coaches still in LNER livery, 42241 and 42244, were added to the set prior to the full nine-car rake with 43006 (43206) and 43112 (43312) moving to Ely on December 31.

East Coast HST

LEFT: **This was the final LNER HST in ordinary service. The set had arrived at Harrogate late and would have returned empty to Neville Hill, Leeds, but was run as a control special – with four passengers! Power car 43238 leads, with 43316 on the rear with a 1Z26 2110 Harrogate-Leeds control relief which arrived at Leeds shortly before 2300 on December 15, 2019. This HST's journey from London to Leeds, 1D26 1803 King's Cross-Harrogate, had been delayed owing to a lineside fire near Outwood, Wakefield, hence 1Z26 was delayed. The very last train would have been 1D30 1935 King's Cross-Leeds (arr. 2154) had all gone to plan. However, just like December 31, 1981 (the end of the Deltics' reign), it didn't!** (David Russell)
BELOW LEFT: **LNER commissioned Heritage Painting Limited to undertake the application of the original colours to the farewell set. This specialist company has undertaken many paintings of locomotives and stock throughout the heritage sector. This was a prestige project. Considerable effort was made to get everything right, involving referring to drawings and painting specifications – undertaken by hand, of course! Note the front of the power car stripped to bare metal, such was the standard.** (LNER)

ABOVE: **Day one of the four-day tour saw the HST set out to visit two of the destinations long served by the HST fleet - Aberdeen and Inverness. To encompass both the Granite City and the Highland capital, the HST traversed a route not normally the province of High Speed Trains, the 108-mile path through Inverurie, Huntly, Elgin and Nairn. Seen making its way north to Aberdeen on December 18 and passing Broughty Ferry, just to the north of Dundee, the repainted HST catapults all who see it back to the 1970s and 1980s.** (Finbarr O'Neil) BELOW: **A remarkable and largely unseen view of the symbol of Scotland and UNESCO World Heritage Site, the Forth Bridge. The farewell special comes off the northern end of the bridge en route to Aberdeen. The clue that this picture was not taken by means of a drone is the foliage in the foreground. The view is actually from the World War One coastal defence position of Carlingnoise Point.** (Richard Tuplin)

LNER End of an Era

Go Forth – and be remembered with affection: On Wednesday December 18, 2019 the seven-coach HST set with power cars E43112 and W43006 forms the 1Z43 0946 Edinburgh Waverley to Inverness via Aberdeen portion of the LNER HST farewell railtour through Burntisland in Fife, Scotland. (Finbarr O'Neil)

LEFT: **The generation gap: Power car W43006 leads the 1Z48 Edinburgh-Leeds leg of the HST farewell railtour into Dunbar on December 20, 2019, as Azuma 800107 departs on the 1W02 Leeds-Aberdeen LNER service. Forty years of change separates these two ECML traction types. Despite four decades of evolution, both still have a maximum speed of 125mph. Although subjective, the ride quality of the HST Mk.3 trailer is regarded as one of the finest in the country. And, equally subjective, the seating on today's trains all over the country is far 'firmer' than those of yesteryear when loco-hauled trains were the order of the day.** (Stuart Edwards) BELOW: **The last day of the memorable final tour saw the HST leave Leeds and call at all the LNER stations en route to King's Cross – Wakefield, Doncaster, Retford, Newark, Grantham and Peterborough. After enjoying hospitality at Neville Hill depot which has serviced HSTs since their inception and still does for East Midland Railway, the set waits in Leeds station as onlookers and photographers enjoy the special occasion.** (Robert Pritchard)

ABOVE: **End of the road for East Coast HSTs after a 42-year life, twice that of the legendary Deltics which the HSTs superseded. This was the scene at King's Cross on December 31, 2019 at the end of the four-day 'Let's Go Round Again' farewell tour – shades of January 2, 1982 when Deltic 55022 Royal Scots Grey arrived with the 'Deltic Scotsman Farewell'. The repainted HST then set off to make the long journey back to its home depot at Craigentinny to await an unknown future. It was later to return south, empty, to Peterborough and across the Fens to Ely to be placed in store.** (Andrew Smith) BELOW: **The trip on December 31 to store was, however, not the last appearance of the two repainted power cars. On January 21, 2020, they were sent under their own power from Ely to Gascoigne Wood to collect four trailer cars, 42158, 42226, 42323 and 42340. These were from sets which have been transferred from LNER to East Midland Railway and reduced from nine-car to eight-car formation. The colourful formation then set off to Ely Papworth once again to be placed into store pending an uncertain future. The colourful ensemble is pictured passing Whittlesey.** (John Rudd)

The LNER Coach Association

Keeping the original era alive is a thriving charitable incorporated organisation, the LNERCA, based on the North Yorkshire Moors Railway.

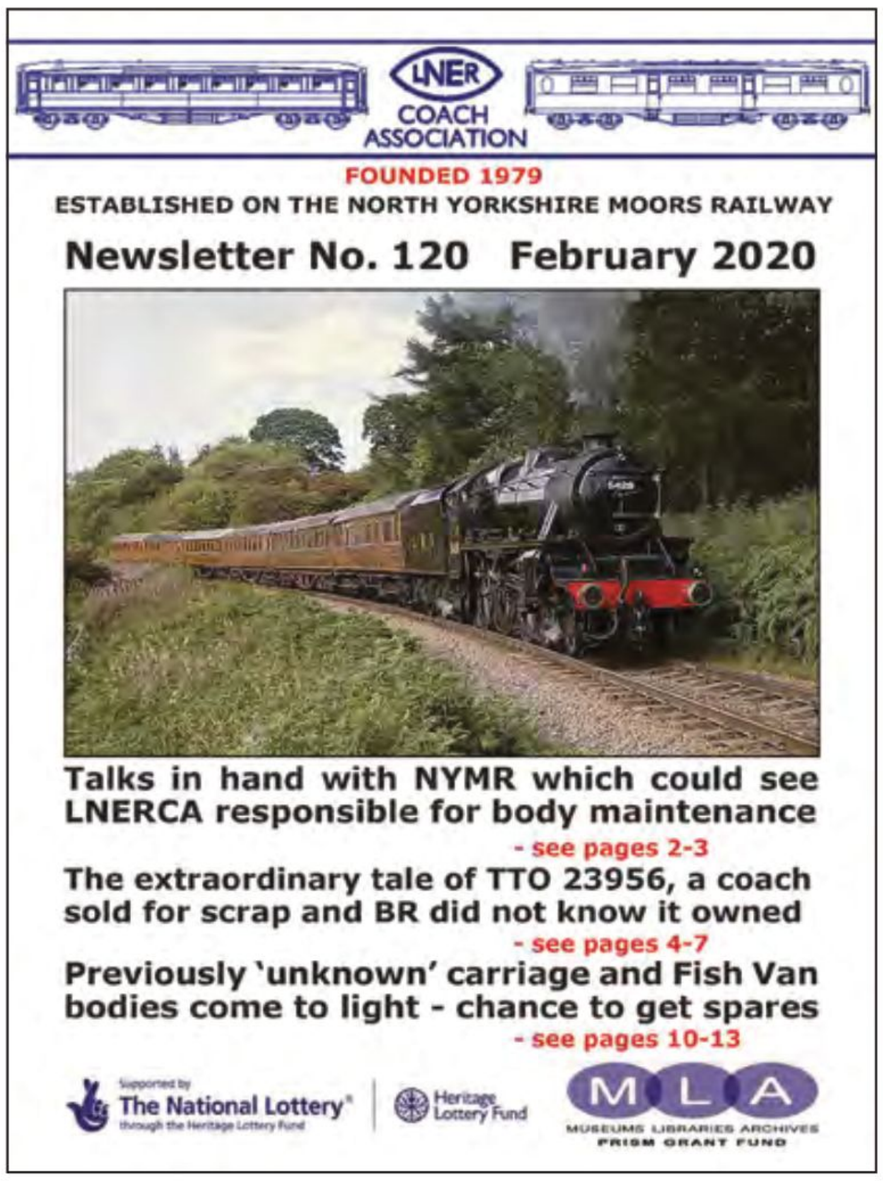
Tornado, the new-build Class A1 Pacific, takes the LNERCA's set south from Goathland on May 5, 2009. This is the classic LNER image of an Apple Green locomotive and varnished teak stock. (Gary Lyne)

Just under 30 miles from the nerve centre of LNER can be found another organisation with its raison d'etre being that of the LNER, except this time, it concerns the original.

The LNER Coach Association was formed in 1979 by two York railwaymen and is thriving on the North Yorkshire Moors Railway, Pickering.

Its aspiration was to collect, restore and operate a rake of LNER carriages. Just over four decades later, this has been achieved and the LNERCA has become renowned for the quality of its restorations.

The year of the inauguration of the LNERCA, 1979, was also the year the government decided to abandon the concept of having mobile control trainsets which could be shunted onto remote sites during times of hostilities in order to control the railways. These secret control trains had been introduced in 1961 during the Cold War era and each Region had two sets of four carriages converted for this special use. The Eastern, North Eastern and Scottish Regions all had LNER Gresley designed carriages, in total some 24 vehicles. When these were declared surplus, this was the incentive for preservation groups, such as the LNERCA to try and acquire some.


LNER COACH ASSOCIATION

FOUNDED 1979

ESTABLISHED ON THE NORTH YORKSHIRE MOORS RAILWAY

Newsletter No. 120 February 2020

Talks in hand with NYMR which could see LNERCA responsible for body maintenance - see pages 2-3

The extraordinary tale of TTO 23956, a coach sold for scrap and BR did not know it owned - see pages 4-7

Previously 'unknown' carriage and Fish Van bodies come to light - chance to get spares - see pages 10-13

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Under the Umbrella

Four decades later, the LNERCA owns 14 vehicles including a unique LNER Fish Van and a Covered Carriage Truck (CCT).

Associated carriages, owned by individuals and associated groups total 11, whilst the National Railway Museum at York has placed its Tourist Third Open number 23956 on loan to the LNERCA, which was restored by the LNERCA. It was the superb restoration of Restaurant Buffet (RB) 641 which caught the eye of the NRM authorities and encouraged it to place on loan its TTO 23956 for full restoration to as-built condition by the LNERCA.

The LNERCA's LNER set usually works the 'internal' diagram which is Pickering to Grosmont and return – two trips daily. Of interest is that the Office of Rail and Road has given permission for these carriages to work over the six miles of Network Rail line – the Esk Valley branch – to Whitby, provided the carriages are upgraded to meet modern specifications.

Carriages Completed

Several restored carriages are available for service including Gresley Brake Third Open 43567, Gresley Restaurant Buffet 641, Thompson Third Corridor 1623, Gresley Tourist Third Opens 23956 and 56856. Gresley Brake Third Corridor 3669 is available and is to be found at Kirkby Stephen, Stainmore Railway where other unrestored vehicles are stored.

The current major restoration underway is East Coast Joint Stock Restaurant Third 189. Built in 1890, when restored this will be the only ECJS carriage in which the public will be able to ride.

Meanwhile another unique carriage is receiving attention – Thompson non-corridor Composite Lavatory (CL) 88339. Once completed, this will return to the north end of the LNER set (where it can be accessed from every platform – it has no corridor ↘

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connection gangways through which passengers can gain access or egress).

There is a formidable list of carriages awaiting the attention of the LNERCA workforce. Several of these are the sole survivors of their type.

Some of the restoration work has been aided by the awarding of grants. These have come from the Heritage Lottery Fund and the Prism Fund, Museums Libraries Archive.

On the Screen

Over many years, these carriages have 'starred' in numerous television and main screen films. Most recently, they have appeared in the Channel 5 documentary 'Yorkshire's Steam Railway.' Other notable appearances have included roles in 'Poirot,' the remake of the 'Dad's Army' movie, and most recently, 'Downton Abbey.' Most frustratingly for the restorers, almost inevitably the film companies will not permit any photography during the filming which precludes vital publicity and raising awareness of these special vehicles. However, such use by film companies brings in some welcome revenue to put towards restoration.

The use of historical carriages by film companies goes back decades. Privately owned (at the time) Thompson CL 88339 was taken to York and vinyl wrapped in imitation teak to take part in 'Agatha,' the story of Agatha Christie turning up at Harrogate station in the 1920s. Because Harrogate station had been rebuilt in the 1960s, ruining its period ambience, the north bay platforms at York station were disguised to emulate Harrogate. Even LNER Apple Green Flying Scotsman was disguised as long-scrapped sister Victor Wild.

Supporters Welcome

The LNERCA is a Charitable Incorporated Organisation and warmly welcomes anyone interested in its objectives, be this by actually lending a hand, or merely by being an 'armchair supporter.' It can offer numerous activities ranging from joinery, metalwork, electrical, upholstering, machining, painting, vanishing and general preparation of components including de-rusting and protective painting. It has the use of the Atkins shed which is heated and situated adjacent to the car park at Pickering station. There is invariably someone in attendance on every day except Mondays.

Membership at £20 gives discounts on the train service and in the shops and members receive a quarterly Newsletter. Full details can be had from the LNERCA's Membership Secretary, Peter Wilson, 38 Willow Place, Knaresborough, HG5 0UG Tel 01423 862553 Email: peter@lnerca.org LNER

The elite motive power of the LNER was the A4 Pacifics, in effect the LNER's Azumas of that era. 60007 Sir Nigel Gresley, adorned in early BR Blue livery, climbs the 1 in 49 gradient from Grosmont to Goathland with the LNERCA's teak carriages on September 27, 2008. (Gary Lyne)

The LNER's carriages were noted for their bucket seats, later replaced by the so-called 'high-backed' variety. The LNERCA's Tourist Third Open 56856 has been restored as built in 1935 with original design moquette. (Murray Brown)

Eight-five years later, this is today's Azuma accommodation in Standard Class. Diffused lighting, air conditioning and automated announcements vividly illustrate the immense changes in travel environment. But which seats are the more comfortable! (Murray Brown)

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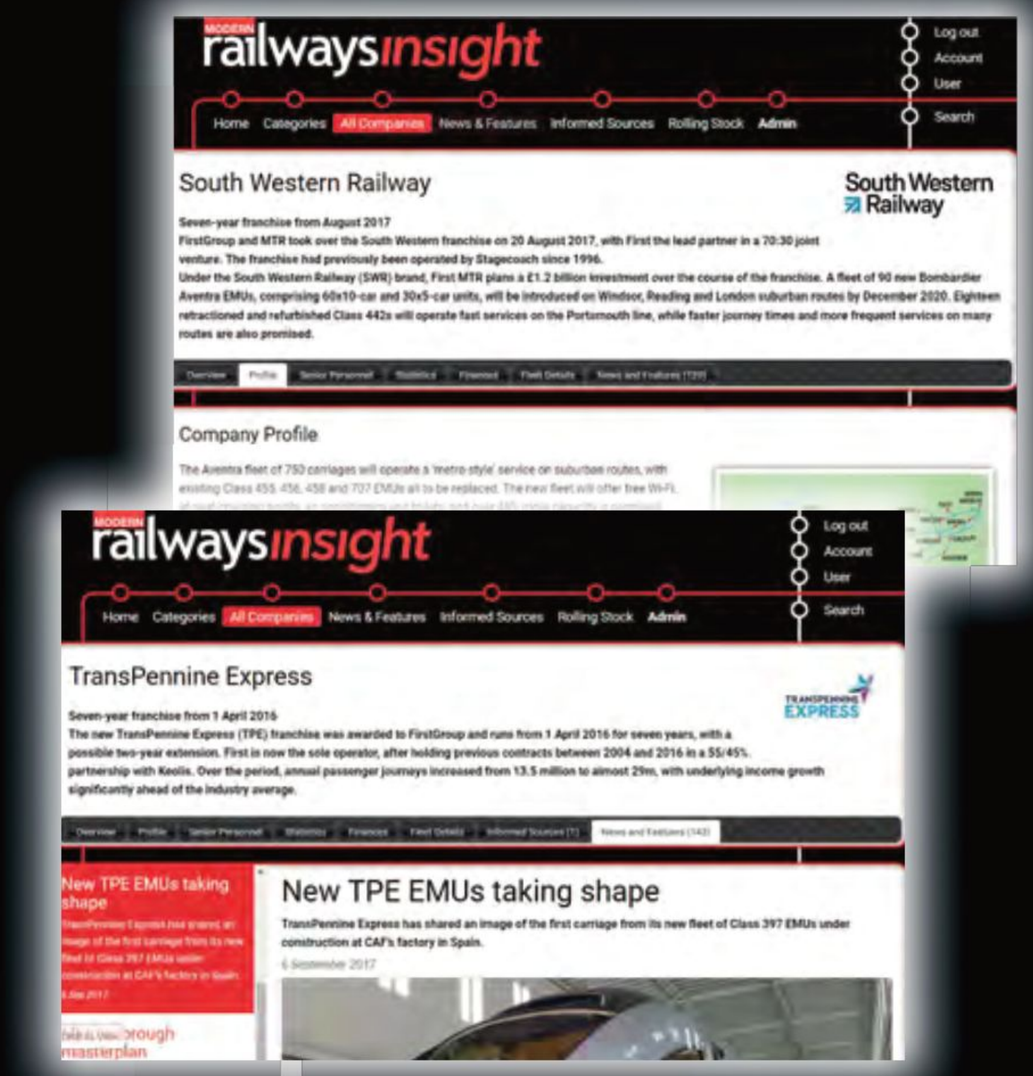

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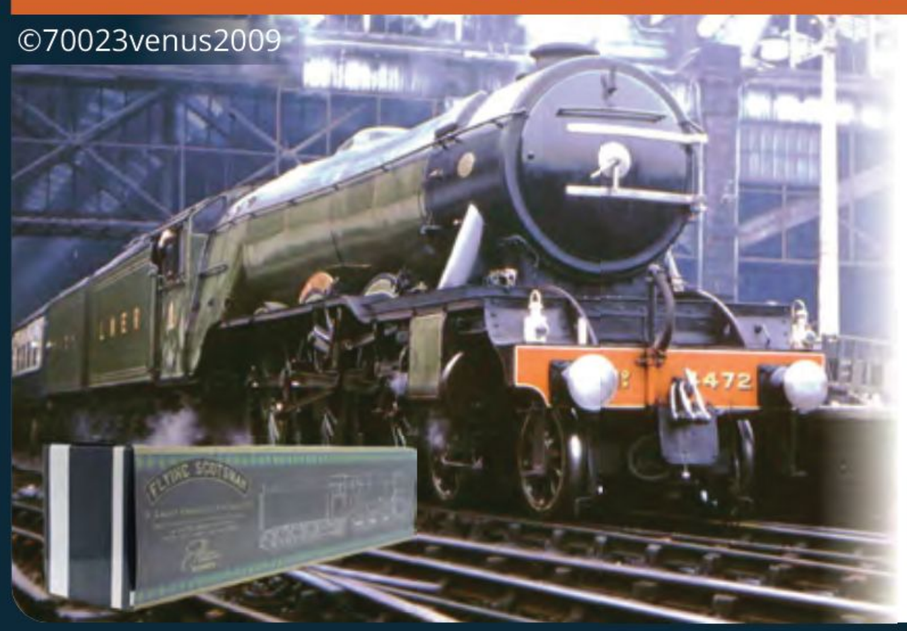

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