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Submissions & Contributions

Railtalk Magazine Xtra, a magazine written by the Enthusiast for the Enthusiast. So why not join the team. We are always looking for talented photographers and writers to join us at Railtalk. Be it though pictorial submissions or via a written article featuring an event or railtour, we greatly appreciate any contributions to the magazine however big or small.

Photographic Contributions

All Photographic contributions should to be sent to us via email, post or via the members section page on our website. Contact addresses are provided above.

All images should be provided at a resolution of at least 2400px x 1700px at 240dpi.

Welcome to Issue 181Xtra

Well it appears that some form of normality is back upon us, we can once again travel to most countries without too much additional paperwork, lets hope that it continues to head in the right direction. In the UK, we have had plenty of those dull damp days as summer disappears and autumn sets in. The heating has been turned on!

Anyway in the news this month, Spanish national operator Renfe has announced plans to launch a tender for at least 12 high-power tri-voltage Co-Co freight locomotives with last-mile capability. The contract will include maintenance for 15 years and an option for a further six units and is expected to be worth more than €178m. The locomotives will be 1435mm gauge because Renfe plans to operate them on the Spanish standard-gauge network, the cross-border Figueres – Perpignan line, as well as in France. Renfe might also operate the locomotives on 1668m-gauge lines in Spain by equipping them with gauge-changing. The locomotives will have to be suitable to operate on lines electrified at 3kV DC, 1.5kV DC and 25kV AC, be capable of operating at at least 120km/h and have the ability to haul trains of at least 1800 tonnes on 1.8% gradients at at least 50km/h. In the future, Renfe plans to operate the new fleet on Spain's Mediterranean Corridor line, including hauling 750m-long freight trains, but that will only be possible once ongoing work to install 1435mm-gauge tracks and upgrade the line is completed. The new locomotives will be equipped with ERTMS levels 0, 1 and 2, as well as the Spanish Asfa signalling system and the French RPS and KVB systems. GSM-R and analog track-to-train communication systems compatible with Spanish and French networks will be fitted too.

Also in Spain this month, TALGO has stated that it will undertake trials using a dual-powered hydrogen locomotive hauling five coaches on the outskirts of Madrid, and several lines in Extremadura, western Spain, within the next few months. The locomotive will be an existing Travca prototype that was originally used for the Renfe 130 series. It will be powered at 3kV DC by the hydrogen cell instead of its pantograph. There is little spare room in the locomotive and so hydrogen tanks and fuel cells will be fitted in the coaches. The range between refuelling is calculated at around 800km. Fuelling equipment will be rented to the hydrogen provider. The hydrogen train will weigh 142 tonnes and will operate at up to 140km/h as Talgo is aiming the trials at the suburban and regional markets. Talgo says the lines the train will operate on are quite varied but the steepest is expected to have a 3% gradient. The Spanish manufacturer's target is a dual hydrogen and electric passenger train for suburban and regional services, operating on both electrified and non-electrified sections. Talgo has spent more than €5m in the trial which includes funding from the Spanish Centre for the Development of Industrial Technology (CDTI). In late-July Talgo signed an agreement with Repsol to promote a hydrogen-powered train in the Iberian Peninsula. Repsol is one of Spain's leading producers of hydrogen and operates the largest hydrogen plant in Europe. The Vittal One, a hydrogen train developed by Talgo, is also due to begin testing in 2023.

Meanwhile in Europe generally the results are in from the September 2021 update of the 'CER COVID-19 Impact Tracker', carried out by the Community of European Railway and Infrastructure Companies (CER). Although there are some signs of improvement in rail passenger services, the survey registers none for rail freight services and in fact a worsening of the financial situation of infrastructure managers. In August 2021, reported monthly revenue losses were around: -30 per cent for passenger services (compared to 2019 pre-COVID-19 crisis times), i.e. 20 per cent better than the beginning of the year (-50 per cent); -10 per cent for freight services (compared to 2019 pre-COVID-19 crisis times), unchanged; -10 per cent for infra services (compared to 2019 pre-COVID-19 crisis times), practically unchanged. Lets hope that things continue to steadily get better.

Until next month

David

This Page

HTM streetcar No. 265 is seen on Monuments Day, September 12th, at Statenlaan, Den Haag. The tram was built in 1920 and became the first museum tram in Den Haag in 1965. *Gerard van Vliet*

Front Cover

On August 15th, 2TE10UT No. 0064A+B detach from a train at Kherson in the short lived Ukrainian Railways blue livery. *Mark Torkington*

LTE Class 186.941-1 'ATTRACKTIVE FORCES' passes Holten on its way from Rzepin (Poland) to Tilburg Industrie with a Chengdu shuttle from China on August 24th. *Erik de Zeeuw*

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Once again many thanks to the many people who have contributed, it really makes our task of putting this magazine together a joy when we see so many great photos.

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CBH Groups No. CBH012 and two classmates pass through Herne Hill in the wine growing region of the Swan Valley, to the east of Perth, with a loaded grain train for Kwinana on a beautiful September spring day. *Colin Gildersleve*

Aurizon's No. Q4014 passes the Midland Hospital on September 7th with Sulphur containers from the Mineral Resources mine site north of Kalgoorlie heading to Kwinana Yard. *Colin Gildersleve*

Australia

Alstom to provide smarter and more efficient X'trapolis trains for Melbourne

Following the budget announcement by the Victoria State government on May 18th, Alstom has now signed a €300m contract with Victoria's Department of Transport (DoT) to locally supply 25 six-car X'trapolis trains for Melbourne's suburban rail network.

The contract follows an extensive two-year interactive design process with the DoT to design and engineer a rolling stock solution specifically compatible with Melbourne's unique existing rail infrastructure. This new generation X'trapolis will deliver a much-needed network capacity increase without the need for major, costly infrastructure and power supply upgrades. The new trains, in line with Alstom's strategy to deliver greener and more sustainable mobility, will be more accessible, reliable and energy efficient.

Built in Victoria, the commitment to deliver the trains with at least 60% local content will provide a vital boost to the state's advanced rolling stock manufacturing industry, securing the future of Alstom's Ballarat manufacturing facility, and pave the way for new, long-term employment opportunities in the rail industry, including multiple trainee and apprenticeship positions.

Alstom's Managing Director, Australia and New Zealand, Mark Coxon said: "Alstom is delighted to continue its long-term partnership with the Victorian Government and the local supply chain that will ensure we continue to build trains for Victoria, in Victoria. Following the successful delivery of Melbourne's most reliable trains from our facility in Ballarat over the past 20 years, we look forward to working with the State and all of our local partners to deliver the next generation of X'trapolis trains, creating a new icon for railway passengers across Melbourne and the State of Victoria."

Alstom's Managing Director, Australia and New Zealand The new generation of X'trapolis trains capitalises on key elements of the existing X'trapolis trains, which enabled it to become the most reliable fleet on the Melbourne network. The proposed new design enhances the existing elements with the latest service-proven technologies. The new train's capacity will exceed 1,240 passengers and will be built to the latest International and Australian Standards, with an increased focus on accessibility and efficiency.

Delivery of the new trains will support the gradual retirement of the Comeng fleet – the longest-running trains on the network – with the new trains set to run through some of Melbourne's fastest-growing suburbs along the Craigieburn, Upfield and Frankston lines. The trains will add to Alstom's already significant rolling stock fleets in Victoria which includes 141 Flexity and Citadis trams or light rail vehicles, 106 X'trapolis suburban trains and 88 Vlocity regional trains.

An interior mock-up for stakeholder consultation is planned for next year, with manufacturing due to commence by the end of 2022.

Alstom has been providing sustainable infrastructure solutions in Australia for more than 100 years and is Australia's only end-to-end manufacturer of trains and trams. Currently, Alstom employs approximately 1,650 people across more than 20 sites, this includes engineering centres, manufacturing facilities, project delivery offices and maintenance depots & workshops. Alstom is committed to supporting the Australian and New Zealand railway markets through the application of the latest innovative and proven technologies, that are designed to provide an optimal life cycle cost for our customers while delivering a seamless and superior passenger experience.

Alstom to deliver a digital future for Sydney Trains

Alstom has been awarded two contracts by Transport for New South Wales (TfNSW) & Sydney Trains to design, deliver and provide long-term service support for European Train Control System Level 2 (ETCS) trackside signalling technology as part of the State's More Trains, More Services - Digital Systems Program

With more than 18,000 km's of trackside technologies installed globally, Alstom's AtlasTM and SmartlockTM trackside signalling technologies will be delivered between Bondi Junction and Erskineville on the Sydney Trains network under a 20-year framework agreement starting in 2021, enabling the seamless future implementation of the technology throughout the broader network.

The Digital Systems Program will replace the existing signalling and train control technology on the Sydney Trains network with state-of-the-art, internationally proven, intelligent rail systems. Initially created to enable standardised cross-border rail traffic, the use of ETCS Level 2 is set to safely increase speed, reliability, and capacity.

The new digital technology will provide a complete system for optimal efficiency and safety while delivering several benefits. For example, the technology will enable Sydney Trains to meet future capacity demand and improve the passenger experience by delivering more reliable services, reduced journey times and enhanced real-time information.

"Alstom is delighted to continue to support TfNSW to deliver their vision of transforming the Sydney rail network. The Digital Systems Program will provide a step-change in operations for Sydney Trains and NSW Trains, and Alstom is committed to partnering with TfNSW to deliver a sustainable, innovative and value for money solution for the State," said Mark Coxon, Managing Director for Alstom in Australia and New Zealand.

The award of these contracts confirms Alstom's leading positioning in the rail signalling market in Australia. Alstom is the only supplier to have delivered passenger CBTC (Communication Based Train Control) signalling technologies for metros in both Sydney and Melbourne, our ETCS level 1 technology currently operate on the NSW and QLD suburban rail networks, Freight & Mining signalling technologies have been deployed for FMG and BHP in Western Australia and our interlocking technologies have been successfully delivered in most Australian states.

It is expected that the project will be fully operational in 2024.

Seen at Wattleup just south of Perth is Aurizon's narrow gauge No. S3311 as it takes a short rake of tank wagons from the Cockburn Cement works to Kwinana Yard. *Colin Gildersleve*

Austria

New night train: Nightjet Vienna - Munich - Paris starts on December 13th

Tickets can be booked from September 28th
Climate-friendly and safe overnight to Paris
Cooperation between ÖBB, SNCF and DB

From December 13th, the Nightjet will travel from Vienna to Paris three times a week. The new night train connection is offered by the Austrian Federal Railways (ÖBB), the French SNCF and the Deutsche Bahn in cooperation. Every Monday, Thursday and Saturday there is a direct route from Vienna Central Station via St. Pölten, Linz, Salzburg and Munich to Paris Gare de l'Est. Departure from Vienna is at 7:40 p.m., arrival in Paris the next day at 9:42 a.m. The connection from Paris to Vienna is offered every Tuesday, Friday and Sunday. The direct train to Paris revives the history of the Orient Express, which was on this connection until 2007. Tickets can now be booked on nightjet.com and on oui.sncf as well as on bahn.de from the German booking start on October 13th.

"With the Nightjet from Vienna to Paris, we are setting another milestone for a European night train network. Only with additional direct connections can we get even more people to switch to the train. A trip with the Nightjet not only protects the environment, but also offers a special travel experience. Because nothing is as relaxing as arriving at your desired destination in the center of the city in the morning, and now also in Paris from December ", says ÖBB CEO Andreas Matthä.

For Alain Krakovitch, General Director of Voyages SNCF, the start of this new night train connection is a big step forward: "I am delighted about the cooperation with ÖBB and DB, which enables us to connect Vienna and Paris even more closely. This new night train connection is a real ecological commitment to more rail traffic and Europe. Traveling by train means choosing a mode of transport that emits 50 times less CO2 than driving a car and 80 times less than traveling by plane."

DB Board Member Passenger Transport Berthold Huber: "Europe should grow closer together, also on the railways. This is what the new night train from ÖBB, SNCF and DB between Vienna and Paris stands for. Together with our European partner railways, we will significantly expand the night train network. In the coming years we want to connect 13 European metropolises with one another over night."

In addition to the new connection Vienna - Munich - Paris, a new Nightjet will also start from Zurich via Basel and Cologne to Amsterdam when the timetable changes. This connection, which also offers inexpensive seats in intercity carriages, is particularly interesting for day tourists from North Rhine-Westphalia. With the early departure in Cologne, city holidaymakers can reach Amsterdam at 9:14 a.m. The late return trip at 8:45 p.m. enables a stay in Amsterdam of eleven and a half hours - two and a half hours longer than before. The two new Nightjet lines connect a total of 15 German cities with the European night train network.

Your own compartment for more privacy
In the Nightjets, single seats in the seating car, couchette carriages with four-person compartments or in sleeping cars can be booked until further notice. For the greatest possible privacy, the compartments in the three comfort categories can also be booked as a separate (private) compartment. This allows travellers with their family or friends to travel alone in a compartment without having to share it with other passengers. In addition, the Nightjets are thoroughly cleaned before and after each trip. The range of on-board sales has been expanded to include disinfectant sprays and mouth-nose protection. Nothing stands in the way of a safe and pleasant journey.

Night travel comfort with the Nightjet
Travelling with the Nightjet is not only environmentally friendly, it is also convenient and inexpensive, as it saves valuable time and high hotel costs. Passengers in sleeping and couchette cars also receive a welcome drink and breakfast before arriving at their destination. Tickets for Nightjet connections are available in the seated car from 29.90 euros per person and direction, in the couchette car from 59.90 euros and in the sleeping car from 89.90 euros. From the start of booking on October 13th, the Nightjet tickets will be available in all DB travel centers and agencies as well as via bahn.de and the DB Navigator app. Alternatively, tickets can also be booked in the ÖBB travel centers, online in the ÖBB ticket shop, in the ÖBB app and from customer service on +43 5 17 17. Further information on the ÖBB Nightjet is available at nightjet.com.

Connecting Europe Express: RCG is on board!

As part of the "Connecting Europe Express" initiative, ÖBB Rail Cargo Group (RCG) was at the Brenner Pass stop. Alongside ÖBB CEO Andreas Matthä, well-known politicians were also present. The aim: to put rail in the spotlight. 2021 is the European Year of Rail. In order to reach net-zero emissions by 2050 with the help of the European Green Deal, environmentally friendly modes of transport will be promoted. As a result, the Connecting Europe Express Train, an initiative launched by the EU Commission, is travelling across Europe and stopping at numerous European destinations. The aim is to raise awareness of the advantages of rail - including rail freight transport.

Connecting Europe Express Train
The journey started on September 2nd in Lisbon and will pass through a total of 26 countries. On September 9th, the train arrived from Bolzano and stopped at the Brenner Pass, before travelling on to Vienna with various stops along the way. ÖBB Rail Cargo Group were pleased to be part of this important initiative for the future alongside several renowned politicians. In addition to Ingrid Felipe, Deputy Governor of Tyrol Italy's Vice Minister of Transport Teresa Bellanova and ÖBB CEO Andreas Matthä were present at the Brenner Pass.

Transit relief at the Brenner Pass with ROLA
The Brenner Pass is a very important connection for rail freight transport. Because of its transit traffic problems, the Alpine crossing has been a constant source of political debate. RCG is proud to have provided transit relief at the Brenner Pass for many years in cooperation with the Austrian Federal Ministry of Climate Action, Environment, Energy, Mobility, Innovation and Technology and the region of Tyrol.

ROLA: Trucks transported by rail
With the Rolling Road (ROLA), freight trucks can cover parts of their journey by rail, while truck drivers can sit back and enjoy a coffee in the comfort of the accompanying passenger carriage. As a result, RCG was able to transport 147,340 lorries by rail in 2020 alone and road traffic was reduced for the local population. Each Wörgl-Brenner ROLA journey is approximately 22 times more environmentally friendly than travelling by road. A green future is a future powered by rail.

Czech Republic

On August 31st, METRANS Class 186.379-3 passes Těchlovice with a deep sea container train from Hamburg Waltershof Dradenau (D) to Česká Třebová (CZ). *Erik de Zeeuw*

Czech Republic

ÖBB Class 1293.188-9 and České dráhy Class 371.005-0 'Pepin' are seen at Decin on September 3rd. *Erik de Zeeuw*

Czech Republic

ČD Cargo Class 130.030-0 is seen ready for departure to Teplice with a light engine movement on August 31st. *Erik de Zeeuw*

Czech Republic

On September 3rd, ČD Class 731.031-1 is ready to depart with a log train from Děčín Loubská to Děčín yard from where the train will continue to Mayr-Meinhof Wood in Paskov. *Erik de Zeeuw*

Czech Republic

ČD Cargo Class 123.029-1 drives past the Masarykovo lock complex on the River Elbe with train No. 48373 from Hamburg Unterelbe Seehafen (D) via Pirna Gbf (D) to Slapanov-Cepro.
Erik de Zeeuw

Czech Republic

On August 31st, ČD Class 371.005-0 ‘Pepin’ (built by Škoda) is seen working fast train No. R610, a Praha to Cheb service.
Erik de Zeeuw

Czech Republic

ČD Cargo has made up last year's loss and continues to expand abroad

In the first half of 2021, ČD Cargo, as, the largest domestic rail freight carrier and the most important subsidiary of České dráhy, as, realized earnings before tax (EBT) according to International Financial Reporting Standards (IFRS) in the amount of CZK 253 million. The company achieved to eliminate the loss incurred in 2020 as a result of the COVID-19 pandemic already in the first half of the year, thus improving its profit by almost CZK 300 million. The freight transport segment, consisting of the results of ČD Cargo and its subsidiaries, contributed to the consolidated result of the ČD Group with net earnings after tax (EAT) of CZK 247 million.

In the first half of this year, the ČD Cargo Group transported on its own licenses a total of 31.1 million tonnes of goods, ie by 2.1 million tonnes more year-on-year.

"In the first half of this year, we recovered from our transport performances of 2020, which is also reflected in the significant growth in our revenues. In addition to growing performances in the Czech Republic, the ČD Cargo brand was successful also in Austria, Germany, Poland, Slovakia and Hungary. Successful foreign expansion remains a key pillar of our strategy and our next goal is to fully use the potential of transports to the Balkans. Cost rationalization played an important role in helping us to increase work efficiency and productivity, too. The combination of higher transport performances and optimization enabled us to continue investments in modernization of the wagon and locomotive fleets, which we would not be able to succeed in the liberalized European market without," states Tomáš Tóth, Chairman of the Board of ČD Cargo, as

We respond to the outages in China and changes in the European energy industry

As a consequence of the overall situation in the world, performances in some commodities will return to pre-pandemic amounts only slowly. For example, combined transport was significantly affected by the lack of transport capacity (containers) for the transports of goods from and to China in the first half of this year, by the global shortage of some components in the automotive industry, or lower demand for brown coal. The latter also reflects developments in the European energy industry and active efforts to promote renewable sources of energy. "With its results, ČD Cargo clearly proves that we can respond to the changing structure of transported commodities, and in the medium term, we can replace declining volumes of energy coal transports with alternative commodities," continues Tomáš Tóth.

We are facing engineering works and natural elements

Extensive engineering works in our country and abroad represent for railway carriers operational complications that extend transit through border crossing stations to Germany and Poland. Natural elements are also causing problems, such as the recent floods in the Děčín region which paralyzed international transport to and from Germany for several days. The tornado in southern Moravia significantly restricted transports in the summer while snow-covered Polish coal pits and frozen switches in Germany affected the traffic in the winter. "Despite these complications, we managed the first half of the year successfully and we firmly believe to maintain this trend throughout the year," adds Tomáš Tóth, Chairman of the Board of Directors of ČD Cargo, as

Photo: ©CD Cargo/Jakub Dvorak

Czech Republic

ŠKODA TRANSPORTATION GROUP SUCCEEDED IN A CONTRACT WORTH ONE BILLION CROWNS FOR THE SERVICE OF ELECTRICAL UNITS FOR CZECH RAILWAYS

Škoda Transportation Group will provide periodic renovations of electrical units for Czech Railways at its plant in Šumperk. These units are RegioPanter and InterPanter. The duration of the contract is five years and amount is almost one billion crowns. Škoda Transportation Group is a leading European manufacturer of public transport vehicles and provides service, repairs and modernization not only of vehicles from its own production for a long time period.

“We have been working for almost 75 years to ensure that all our customers’ trains run reliably in the best condition. We are very happy that Czech Railways has chosen us as a partner for the maintenance of Panthers for the next 5 years. We see this as a great commitment and at the same time as good news of long-term perspective and stability for our skilled employees and business partners. We highly value the trust of Czech Railways and look forward to further successful cooperation,” says Aleš Měrka, CEO of Škoda Pars, which is based in Šumperk.

“RegioPanter units delivered in 2012 have already travelled around 1.5 million kilometres. In order to meet the conditions of the ECM (European Maintenance Code) in the years to come, as with the Panthers so far, we have competed for suppliers to perform periodic renewals in the following period. Each set thus has a comprehensive service and higher levels of repairs, which are carried out after every 900,000 kilometres, “explains Ivan Bednárik, Chairman of the Board of Directors and CEO of Czech Railways.

“The framework contract concerns the regular renewal of the RegioPanter 440, 640, 650 and InterPanter 660 and 661 series electrical units for the next 60 months. A total of 41 units are being regularly maintained,” adds Michal Kraus, a member of the Board of Directors and ČD’s Deputy General Manager for Service.

“Service is an integral part of our offer. We provide these services not only for our products, but we also have extensive experience with products from other manufacturers. We are currently providing full-service metro in Prague, trams in Tampere and we are preparing for full-service electrical units for the South Moravian Region,” Petr Brzezina, President of the Škoda Transportation Group

Škoda Group – modernization, repairs and full service of rail vehicles

Škoda Transportation Group has been providing rolling stock service to customers throughout Europe for a long time. Specifically, the plant in Šumperk focuses mainly on periodic repairs, heavy maintenance and modernization of railway rolling stock for customers in the Czech Republic, but also abroad. For regular service, tram or metro repairs, the group has facilities in Prague, Ostrava and Finland. Here it provides, for example, a full service of the Prague metro, trams for Pilsen and the Finnish Tampere. In the near future, the Škoda Transportation Group will also be in charge of long-term full service of electrical units, which are now manufactured for the South Moravian Region.

EKOVA ELECTRIC IN OSTRAVA HAS CHANGED OWNER AND IS CHANGING ITS NAME

Ekova Electric has become a member of the Škoda Transportation Group and is changing its name to Škoda Ekova. It has thus become a member of the group, which is a leading European manufacturer of public transport vehicles. The transfer of 100% of the company’s shares held by Dopravní podnik Ostrava took place on August 2nd. It will bear the new name from August 10th. Within the group, Škoda Ekova will focus on servicing, modernizing and repairing public transport vehicles, and trams for Ostrava will also be produced here.

“Marriage, so I would like to mark another joint chapter, which the DPO will now write together with Škoda Ekova. We are convinced that a common future awaits us, in which Škoda Ekova will be a strong and reliable partner, for example, for the service and maintenance of our cars. Cooperation will take place in a standard transparent manner in the form of public procurement, as before. We believe that Škoda Ek has a stable future that will bring it not only market sustainability, but also the opportunity to develop further, order occupancy for the next years and the related maintenance of employment and the introduction of multi-shift operations,” says DPO CEO and Chairman of the Board Daniel Morys.

Škoda Ekova is becoming another important part of the development of the entire Škoda Transportation Group, which will see significant growth in production in the coming years. Currently, the group has a four-year labour supply worth 80 billion crowns. “In the development of Škoda Ekova, we will make maximum use of the experience and knowledge of current employees. We plan not only to expand the production itself, but we will create new skilled jobs with high added value. Together, our Ostrava base is becoming an even more important employer and will make a significant contribution to the development of the entire region,” says Martin Bednarz, Deputy Chairman of the Board of Directors of Škoda Ekova.

The Škoda Transportation Group, a member of the PPF Group, has been operating in the Moravian-Silesian Region for a long time. For example, technological know-how in the field of control, multimedia and diagnostic systems within the Škoda Digital subsidiary is concentrated in Ostrava. A major subsidiary, Škoda Vagonka, operates directly in Ostrava, focusing on the development and production of rail vehicles. It went through a significant stage of growth, when it invested one billion crowns in the expansion and modernization of its facilities, for example, it built the largest machining center in Europe, a new paint shop and created hundreds of new jobs.
The Ostrava part of the group is becoming a center for comprehensive solutions for modern transport systems. Not only the vehicles themselves are created here, but also the technological centers of the future. “In the field of transport, we are one of the leaders in transformation and we bring sophisticated production supported by our own research and development,” adds Petr Brzezina.

Škoda Ekova

Founded in January 2011 under the name Ekova Electric as a subsidiary of Dopravní podnik Ostrava.
In July 2020, the Škoda Transportation Group signed an agreement to purchase 100% of Ekova Electric’s shares.

On August 2nd, 100% of the shares were transferred to Škoda Transportation. From August 10th, the company will bear the new name Škoda Ekova. Currently, Škoda Ekova has almost 200 employees

Throughout its history, the Ostrava company has focused mainly on the production, modernization or reconstruction of trams, trolleybuses and electric buses. And not only for Czech customers, but also for foreign transport companies.

Czech Republic

Waste transport to northern Bohemia

On September 7th, the first transport of waste from South Moravian municipalities affected by a devastating tornado was completed with the unloading of a 24-wagon set on the siding of the Technical Museum in Litvínov.

The loading of waste took place on September 6th on the siding of the former Mír Mine in Mikulčice, from where the set was transported to Most overnight and in the morning to the already mentioned siding.

Rail transport was chosen as the most advantageous and also the most ecological. At least 35,000 tons of waste should be transported by ČD Cargo trains for further sorting and processing in northern Bohemia.

As in the past, Innofreight technology was used for this waste transport.

Photo: © CD Cargo

CD Cargo Vectron No. 383.001 has a new design

As of September 17th, the Vectron 383.001 of the carrier ČD Cargo has had a new elegant coat of paint, which it received on the occasion of the planned journey of the special Connecting Europe Express train through the Czech Republic.

The locomotive was deployed on the European train on September 25th on the Brno - Prague section.

ČD Cargo uses locomotives of the Class 383 series primarily for foreign services. “The Czech Republic is a country in the heart of Europe and ČD Cargo is a respected European carrier,” said Tomáš Tóth, Chairman of the Board of Directors of ČD Cargo.

Photo: © CD Cargo

France

Alstom to supply 35 additional Citadis tramways to Lyon's Public Transport Authority

SYTRAL new Citadis trams, whose front end has been redesigned for better visibility and greater driving comfort

Alstom will supply SYTRAL (Lyon's Public Transport Authority) with 35 additional Citadis tramways as part of the "Destinations 2026" plan, which includes the introduction and extension of new tram lines. This order, worth € 115 million[1], constitutes an option exercise under the framework agreement signed in 2018.

"This order is a fine mark of confidence from one of our long-standing customers. We have been working with SYTRAL for 40 years now to offer green, reliable, and comfortable mobility solutions that meet the expectations of Lyon's passengers. SYTRAL is assured of having a proven, high quality equipment, as it benefits from the feedback from the nearly 3,000 Citadis trams sold to 60 cities around the world. With more than 140 Citadis trams planned to be in service, Lyon's network is a real showcase for French and Alstom know-how", declared Jean-Baptiste Eyméoud, President, Alstom France.

SYTRAL's fleet currently consists of 34 Citadis trams of 43 metres long and 73 trams of 32 metres long, operating on 6 lines. With this latest option, SYTRAL's fleet will eventually reach 142 tramways, making it one of the largest fleets in France.

It has been ordered in several instalments since 1998, with a first commissioning in 2000. These new Citadis trams will be identical to the 15 43-metre trains delivered in 2020 and 2021, running on the T3 and T4 lines, whose special feature is a redesigned nose for better visibility and greater driving comfort. They can accommodate up to 287 passengers, the equivalent of 4 buses.

Alstom's Citadis trams offer optimum on-board travel quality with an integral low floor, air conditioning, a video surveillance system, as well as audio and visual information. Up to 98% recyclable, Citadis helps to preserve the environment.

The Lyon tramway embodies the expertise of the French railway industry, as the Citadis range was developed in France, at the Alstom site of La Rochelle. These new trams will be manufactured at 7 Alstom sites in France: La Rochelle for the design, assembly, testing and validation of the trainsets, Le Creusot for the bogies, Tarbes for some of the traction chain equipment, Aix-en-Provence for the tachometer, Valenciennes for the maintenance tools and supplies, and, in the Lyon metropolitan area, Villeurbanne for the on-board computer system and passenger information.

[1] this amount has been recorded in the last quarter of Alstom's 2020/2021 financial year

Alstom and Plastic Omnium partner to design onboard hydrogen storage solutions for railway

Alstom, the global leader in sustainable railway transportation and Plastic Omnium, a major player in hydrogen mobility, have signed a Memorandum of Understanding (MoU) to collaborate on the development of high-end hydrogen storage systems for the railway sector. Alstom and Plastic Omnium will cooperate and combine their complementary know-how and capabilities in their respective domains. A dedicated team has been set up to manage the technical and commercial development of innovative and competitive hydrogen onboard storage solutions for the railway market.

This will enable the two partners, following development projects which have already started, to launch hydrogen storage solutions on the market for regional trains in France and Italy, starting in 2022, allowing direct journeys on non-electrified lines without using fossil fuels, while meeting the challenges of sustainable development.

Rail, alongside trucks, bus and commercial fleet sectors, is one of the first industries to develop zero-emission hydrogen mobility, opening up new growth prospects in a promising market.

Christian Kopp CEO of Plastic Omnium Clean Energy Systems division said: "Our partnership with Alstom aims to develop high-performance hydrogen solutions capable of tackling the sustainability challenges facing railway transportation. It is another step on the path toward carbon-free mobility and further confirmation of our Group's expertise in hydrogen solutions and its potential for growth as it reaches out to a new customer base."

"The emergence of a strong hydrogen ecosystem is of critical importance for driving the development of hydrogen rail as a zero emissions alternative for regional rail. The planned combination of Plastic Omnium's expertise in hydrogen storage solutions and our expertise in hydrogen trains is in this regard an important milestone to build an innovative and strong hydro rail value chain," said Thierry Best, Chief Commercial Officer at Alstom.

France

Alstom's Coradia iLint hydrogen train runs for the first time in France

Alstom's Coradia iLint train, the first in the world to be powered by hydrogen, has taken its first turns in France on the tracks of the Centre d'Essais Ferroviaires[1] in Valenciennes (in the north of France) in the presence of Jean-Baptiste Djebarri, French Minister Delegate to the Minister of Ecological Transition, responsible for Transport, and Jean-Baptiste Eyméoud, President of Alstom France.

Alstom teams are running and presenting the Coradia iLint to various local stakeholders including government decision-makers, transport organising authorities, engineering companies and operators to highlight the potential of this train in the range of sustainable transport solutions offered in France.

This presentation is part of the national energy transition ambition, which aims to reduce greenhouse gas emissions and noise in transport, a challenge supported by the French government through its Hydrogen Plan, initiated in 2018. This presentation is also part of the French Recovery Plan and of the Important Projects of Common European Interest (IPCEI) launched by the European Union in 2020.

Alstom, a world leader in green and smart mobility, has been developing a portfolio of zero-emission mobility solutions for several years and has launched an ambitious battery and hydrogen innovation program. Alstom has been working since 2013 on the launch of a regional train equipped with hydrogen fuel cells. The first two 100% H2 iLint trains entered commercial service in 2018 in Germany and, to date, 41 trainsets have been ordered by two German states and successful trials have taken place in Austria, in the Netherlands, in Sweden and now in France. In Italy, the operator FNM confirmed an order for 14 hydrogen-powered trains at the end of 2020. This year, France also joined the circle of "founding countries" with an order from SNCF for 12 Coradia Polyvalent dual-mode trains (electric/catenary and hydrogen/fuel cell traction) for four French regions (Auvergne-Rhône-Alpes, Bourgogne-Franche Comté, Grand Est and Occitanie).

Alstom's Coradia iLint in Valenciennes, France

"Today, Alstom's ambition is to accelerate its hydrogen strategy and to continue to propose and develop innovative greening solutions. We want to provide public authorities and operators with relevant technical and economic solutions in the context of the phase-out of diesel. In this way, we want to contribute to French and European industrial leadership in this technology of the future," said Jean-Baptiste Eyméoud, President of Alstom France.

The Coradia iLint is the world's first passenger train with electric traction powered by a hydrogen fuel cell. This "zero emission" light train is as silent as an electric train and emits only water vapour.

Suitable for use on non-electrified lines, it is an ideal solution for small local lines[2], a strategic mobility issue for the French State and the French Regions. The train was presented in a German configuration; adaptations will be necessary to approve the Coradia iLint according to French standards. The approval process has been initiated and will be finalised in line with the needs of the Organising Authorities.

France plays a key role in the development of hydrogen mobility solutions. The traction units are designed and manufactured in Alstom's global green traction centre of excellence, based in Tarbes (in the South-West of France). The recent acquisition of Helion Hydrogen Power, based in Aix-en-Provence (in the South of France), which covers the entire high-power fuel cell value chain, demonstrates Alstom's commitment to building a hydrogen centre of excellence in France. This new entity will participate in the development of very high-performance hydrogen solutions for heavy mobility, particularly railway.

A trial of the Coradia iLint train on the French rail network will be held in 2022 on the Tours-Loches line, a small local line in the Centre-Val de Loire region.

[1] Railway Testing Centre
[2] also known in French as "Ligne de desserte fine du territoire"

Photo: © Le Coradia iLint d'Alstom, Valenciennes. Samuel Dhote

On September 1st, METRANS Class 383.408-2 passes Bad Schandau East with a deep sea container train from Česká Třebová (CZ) to Bremerhaven.
Erik de Zeeuw

Germany

On July 28th, Heavy Haul HHPI's Euro Dual No. 159.203 heads an empty stone train towards the east through Hannover Linden. *Anton Kendall*

Germany

Flixtrain Class 193.862-0 matches the green foliage as it heads a diverted working from Berlin past Hannover Waldheim on July 30th.
Anton Kendall

Germany

Regensburg/Danube Valley rail network orders new Mireo trains from Siemens Mobility

Siemens Mobility has received an order to build 23 4-car Mireo trainsets for rail operator agilis Eisenbahngesellschaft mbH & Co. KG, a subsidiary of BeNEX GmbH. The trainsets will be delivered for the Regensburg/Danube Valley rail network in 2024 and are scheduled to enter passenger service in December that year. The Bavarian Railways Company (Bayerische Eisenbahngesellschaft or BEG), which plans, finances and controls regional and commuter rail operations on behalf of the state of Bavaria, had called for bids for new trains for parts of its network. The Mireo trains will serve on the new RE Line 50 (Nuremberg – Regensburg – Plattling) and the RB Line 51 (Neumarkt – Regensburg – Plattling).

“By choosing the Mireo trains from Siemens, agilis clearly led the competition in the quality evaluation of bids submitted for the Regensburg/Danube Valley network tender. It really isn’t possible to focus more specifically on meeting regional mobility requirements. A fantastic success story that will ensure a great future for agilis, the quality leader in Bavaria,” said Dr. Michael Vulpius, CEO of parent company BeNEX.

“When we ordered the new trains, our focus was on ensuring a high level of passenger comfort provided by generously designed interiors. At agilis, we feel it’s especially important to make sure our passengers are thoroughly comfortable,” said Dr. Axel Hennighausen, CEO of agilis.

“The commissioning of the new trainsets for the Regensburg/Danube Valley network, with its service to Nuremberg and the mainline connections there, will offer significant added value for our passengers – a milestone in the history of agilis,” added Gerhard Knöbel, Commercial and Mobilization Project Director.

Albrecht Neumann, CEO Rolling Stock, Siemens Mobility: “We at Siemens Mobility are delighted that we’ve been commissioned to deliver the new trainsets for the Regensburg/Danube Valley network. We’ve already sold over 240 trainsets from our successful Mireo series. The train impresses operators and passengers alike with their improved passenger comfort, reliability, and energy efficiency. We have developed a new, particularly powerful variant of the Mireo especially for the Regensburg/Danube Valley network. The train is equipped with two additional drive axles that enables faster acceleration.” The new Mireo trainsets have 216 seats and provide improved passenger comfort thanks to their spacious design. Each entrance has a multipurpose area that is not restricted by folding seats, which increases passenger convenience. All trains are barrier-free for passengers with limited mobility. In addition, a lift is available for wheelchair users to ease entries and exits at stations with lower platforms. A large number of luggage racks makes it easier for passengers to stow their luggage.

A real-time passenger information system displays updated arrival and departure times as well as connection options for the respective stations. The trains will also have special high-frequency window panes developed by Siemens Mobility that significantly improve cellphone reception on board. Free WLAN service will also be available throughout the train.

The Mireo from Siemens Mobility is a scalable articulated trainset whose weight has been substantially reduced by various design measures, such as bogies with inside bearings. Significantly improved aerodynamics compared to previous models considerably reduce the train’s energy consumption. The new Mireo variant is particularly powerful, enabling it to accelerate faster. The train has a top speed of 160 km/h. The Mireo trainsets will be built at the Siemens Mobility plant in Krefeld.

Alstom to provide an additional 64 commuter trains to Hamburg

Alstom and S-Bahn Hamburg GmbH have signed a contract for the delivery of an additional 64 Class 490 S-Bahn trains. The order is an option from a framework contract signed in 2013 and is valued at around 500 million euro. As with the previous trains, passengers will enjoy the proven amenities of these three-car electric multiple units, but with the addition of some new improvements to better meet the needs of Hamburg’s passengers. For example, the new S-Bahn train’s middle cars will feature a multipurpose area with room for bicycles, luggage, and dedicated spaces to accommodate passengers with limited mobility.

However, the train’s most significant innovation will be invisible to passengers. For the first time in Germany, S-Bahn trains will be equipped with the European Train Control System (ETCS) Baseline 3 Release 2 and automated train operation (ATO) technology. Together, these technologies will ensure denser and more frequent service and enable Hamburg to provide more fluid transport while increasing the overall number of train journeys. In addition, the flexibility of Hamburg’s new S-Bahn trains means that they will couple with the 82 Class 490 S-Bahn trains already in service.

“We are delighted that S-Bahn Hamburg continues to rely on the 490 series trains. The comfortable vehicles are perfectly adapted to the requirements of the Hamburg S-Bahn network and will convince with an even more flexible space arrangement. Equipping the trains with the latest ETCS and ATO technology is a milestone on the path to the digitalisation of Hamburg’s rail traffic and we are proud to make a decisive contribution to this,” says Müslüm Yakisan, President of Alstom in Germany, Austria and Switzerland.

This order marks Germany’s first implementation of ATO in automation level 2 (GoA 2) for new S-Bahn vehicles. In addition, S-Bahn Hamburg GmbH will receive vehicles that already comply with the latest state-of-the-art signalling technology. The trains will be delivered with Alstom’s intelligent onboard technology for ETCS, with integrated ATO software that meets the high demands of future digital rail operations in terms of performance, availability, and automation.

“By equipping Hamburg’s new commuter trains with ETCS and ATO, Alstom is once again pioneering the field of rail digitalisation. Implementing this modern technology for series operation in such a large city represents an important step for the digitalisation and capacity increase of local transport systems in German conurbations,” says Michael Konias, Head of Digital & Integrated Systems at Alstom for Germany, Austria and Switzerland.

Initially, Alstom will manufacture three vehicles that will undergo extensive testing and inspection, in particular for approval of their ETCS and ATO functionalities.

Vehicle deliveries to Hamburg are scheduled for 2025 and 2026. Among others, Alstom’s sites in Hennigsdorf, Bautzen (production), Berlin (signalling), Braunschweig, Siegen and Mannheim, Germany, will be involved in the production of the new S-Bahn trains. This is in addition to sites in Charleroi, Belgium (ETCS), Wroclaw, Poland, Västeras, Sweden and Vadodara, India, which will also participate in production. In Germany, Alstom offers innovative solutions for sustainable mobility and is one of the leading suppliers of railway technology with metros, suburban trains, trams, regional trains, locomotives and signalling solutions. Our trains travel from Schleswig-Holstein to Bavaria. More than 70% of high-speed trains running in Germany are equipped with Alstom’s ETCS signalling solutions.

Photo ©: Deutsche Bahn AG/Volker Emersleben

METRANS Class 386.035-0 with a Hamburg to Prague (CZ) container train passes Rathen on September 1st. *Erik de Zeeuw*

LTE Class 193.262-3 is seen near Rathen with a rake of hoppers from Zeitz heading to Lovosice (CZ) on September 3rd.
Erik de Zeeuw

Trans Europe Class 193.755-6 (Grampet Group Romania) runs through Königstein working a Hungary bound rake of empties on August 29th. *Erik de Zeeuw*

On August 29th, ČD Cargo Class 193.587-3 heads a Skoda car train from Mladá Boleslav (CZ) to Aachen West. *Erik de Zeeuw*

Germany

Alstom presents its battery-powered multiple unit train in Saxony

On September 7th, Alstom's battery-powered train conducted a technical demonstration journey starting in Chemnitz, Germany. Developed as a prototype at Alstom's Hennigsdorf, site in Germany, the battery-powered electric multiple unit train travelled to Flöha and Zschopau and then back to Chemnitz. During the journey, the train's drive was switched from catenary operation to battery power, underlining Alstom's technological leadership in ecofriendly alternative drive systems for the rail industry.

The innovative project began in 2016 as a research partnership with the Technical University of Berlin and covers the development, approval and operation of the battery-powered passenger trains, as well as proving the overall economic viability of battery operation for mainline railways. It also includes the preparation of recommendations for politicians, operators and public authorities for the use of battery-powered trains on non-electrified or partially-electrified lines. The key aspect of the propulsion technology is a drive system that includes an innovative traction battery which was developed and tested in Mannheim – home of Alstom's specialist battery and high-voltage laboratory.

"Alstom has the clear goal of becoming the international leader in alternative drive technologies for rail travel. Alongside our hydrogen train, this state-of-the-art battery-powered drive concept represents another milestone for the market launch of emission-free regional trains in Germany and worldwide." Müslüm Yakisan President of Alstom in Germany, Austria and Switzerland

The battery-powered train was developed in cooperation with various project partners. These include DB Regio, the regional transport network for Baden-Württemberg, the German National Innovation Programme for Hydrogen and Fuel Cell Technology and the Technical University of Berlin. The German Federal Ministry of Transport and Digital Infrastructure (BMVI) is funding the project with a contribution of around four million euro.

Since the start of the project, the accompanying scientific research at the Technical University of Berlin has been carried out by the Department of Railway Operations and Infrastructure together with the Department of Product Development Methods and Mechatronics.

The studies have revealed, for example, that a large proportion of the lines currently operated with diesel vehicles include non-electrified sections of well under 60 miles. The use of the existing catenary infrastructure allows battery-powered electric vehicles to be operated on these lines without major upgrades to the existing infrastructure. Extensive travel dynamics and energy simulations were also carried out as part of the project.

Professor Birgit Milius, Doctor of Engineering from the Department of Railway Operations and Infrastructure, explained, "Our studies have clearly shown that in local rail passenger transport, battery-powered electric vehicles have the potential to successfully replace diesel vehicles. Our considerations have always taken the overall system into account. Aspects covering the vehicle, operation and infrastructure were analysed under various operating conditions in order to obtain reliable results."

Dr. Harald Neuhaus, Managing Director of Verkehrsverbund Mittelsachsen GmbH pointed out that, "During the second half of 2019, Verkehrsverbund Mittelsachsen GmbH, the transport association for central Saxony (VMS GmbH) was appointed by the association of authorities Zweckverband Verkehrsverbund Mittelsachsen (VMS GmbH) to deliver a vehicle concept for the RE6 on the Chemnitz - Leipzig line. Alstom had already proved itself following the purchase of 29 Coradia Continental electric trains for the electric network in Central Saxony. The successful delivery and maintenance of these trains resulted in a new order at the beginning of 2020 for vehicles featuring the latest battery-powered drive concept, thanks to an addendum to the existing delivery contract. The order will be delivered in 2023. Our passengers will be transported comfortably and with zero emissions on a previously non-electrified line until electrification is completed. We are proud to be able to contribute to the implementation of innovative drive concepts in Saxony together with all our partners."

"This alternative drive technology can make a significant contribution to operating branch lines without catenaries in a climate-friendly way and is a particularly good solution for the reactivation of lines. We are pleased to announce that this vehicle will be presented to experts and the general public at the Digital Rail Convention in Annaberg-Buchholz on September 9th and 10th," said Sören Claus, Managing Director of SRCC GmbH.

The train will go into service in Baden-Württemberg and Bavaria when the new timetable comes into effect in December 2021. It will be the first battery-powered train to be approved for regular passenger service in Germany since the 1960s.

It was briefly in operation on September 9th as part of the Digital Rail Convention in Annaberg-Buchholz. Guests on that occasion included Federal Transport Minister Andreas Scheuer and Michael Kretschmer, Prime Minister of the Free State of Saxony.

Germany

Brohltal Eisenbahn's Class 218.396-0 heads an aluminium train to Koblenz past Duisburg Lotharstrasse on August 2nd. *Anton Kendall*

Germany

In H F Wiebe livery, Vossloh Class 264.011-8 heads an empty stone train back towards the east through Hannover Linden on July 28th. *Anton Kendall*

Germany

DB Class 189.060-7 passes Rathen with an empty Žiar nad Hronom (SK) to Rotterdam Botlek (NL) aluminium oxide train. *Erik de Zeeuw*

A view over Königstein whilst Captrain Class 193.786-1 passes with a rake of Zans tankers towards Děčín (CZ) on September 2nd. *Erik de Zeeuw*

CD Cargo's Vectron Class 383.009-8 passes Hamburg Harburg on July 27th. *Anton Kendall*

ČD Cargo Class 372.006-7 nicknamed ‘Dumpling Press’ speeds west at Königstein working a unit cargo from Ústí nad Labem (CZ) to Halle on August 29th. *Erik de Zeeuw*

Germany

PKP CARGO International Class 753.730-0 and 753.739-2 have just delivered an Innofreight wood chips container train to Krippen on August 31st and are heading through Bad Schandau with empties. *Erik de Zeeuw*

A very popular place on the main line between Budapest - Hegyeshalom are the rocks of Szár. Here Class 470.505 is seen with Intercity train No. 947 'Soproni Közgáz' on August 20th. The advertising livery commemorates the referendum held 100 years ago which resulted in Sopron falling to Hungary. *Thomas Niederl*

On August 20th, Class 470.006 advertising the 250th anniversary of the Semmelweiss University with train No. IC936 'Kékfrankos' to Sopron is seen in Komárom. In the background you can see the river Danube which is the border with Slovakia. *Thomas Niederl*

Class 470.503, which is dedicated to the 200th birthday of the composer Richard Wagner, heads away from Komárom with train No. IC946 'Soproni Közgáz' to Sopron on August 20th. *Thomas Niederl*

On August 21st, GySEV No. 431.327 with train No. IC907 'Bakony' from Szombathely to Budapest Deli is seen passing the village of Öskü. *Thomas Niederl*

On August 21st, Class 431.195 with train No. IC954 ‘Göcsej’ passes the round church of Öskü. The church was built at the beginning of the 11th century. *Thomas Niederl*

On August 21st, Class 431.371 working train No. IC955 ‘Göcsej’ is seen near Öskü. *Thomas Niederl*

A shortage of Class 418 diesel locomotives means that some trains on the Györ - Veszprem route have to be hauled by Class 478 shunting locomotives. Here Class 478.327 with train No. Sz39512 departs from Zirc on August 22nd. *Thomas Niederl*

On August 22nd, Class 478.203 with train No. Sz39524 is seen at Veszprémvarsány. Today, this is a very quiet station but until 2009 there was the branchline from Pápa to Tatabanya via Kisber crossing here.
Thomas Niederl

Netherlands

On August 25th, Strukton No. 1740 crosses the river IJssel with an engineers train heading to the work site layout in Zutphen. *Erik de Zeeuw*

Train Charters No. TCS 010003 and IRP No. 2102 pass Putten on hire to work the 'Dolomite' train heading to Sittard. *Andre Pronk*

Netherlands

On August 27th NSM No. 273 is seen near Hilversum making a farewell ride for a train driver from Utrecht, retiring after 43 years employment with NS.
Erik de Zeeuw

Netherlands

At the height of Zaltbommel on September 7th, DB Class 189.822-0 heads the Nanjing shuttle, a relative new connection from Nanjing in China via Małaszewicze in Poland to Tilburg Industrial Estate.
Erik de Zeeuw

On August 25th, HSL Class 186.148-3 leads the lightly loaded Westermann-shuttle over the 'IJssel Bridge' coming from the Mertz Transport Kombiterminal Malmö in Sweden and on the way to the new GreenPort-terminal in Venlo. *Erik de Zeeuw*

Netherlands

The Connecting Europe Express train is to demonstrate – in real time – the power of rail to connect people and businesses, and the importance of EU infrastructure policy in making this possible. The route beginning on September 2nd in Lisbon, stopped in more than 70 cities in 26 countries, the train will link the Portuguese, Slovenian and French Presidencies of the Council of the EU, arriving in Paris on October 7th. While a symbol for connectivity, this train also serves as a reminder that we still have a long way to go and much work to do before rail becomes the transport option of choice for Europeans. The project is a unique endeavour, involving the European Commission and the Community of European Railway and Infrastructure Companies (CER), European rail operators, infrastructure managers and numerous other partners at EU and local level.
CER Chair and CEO of Austrian Federal Railways Andreas Matthä emphasised: “Travelling through 26 European countries, the Connecting Europe Express is proof of the importance of the European Year of Rail. I thank all CER members for their involvement in this key project with the European Commission. In order to achieve our climate targets, we need to further strengthen the vitality of rail with more international long-distance passenger rail services and we must also consistently shift freight transport to rail.” Here NS Class 1700 No. 1752 is seen with the Connecting Europe Express passing Soest Weideweg. *Andre Pronk*

DB Netherlands No. 2006.416 is seen with the Kettinghor train, which is used during rail construction, passing Putten coming from Leeuwarden where track had been replaced. *Andre Pronk*

Netherlands

In the 1950s, former NS director Den Hollander took the initiative for an international network of fast and luxury trains to connect seventy major European cities. The Dutch and Swiss railways decided to work together for the connection between Amsterdam and Zurich. Werkspoor asked the Dutch designer Elsebeth van Blerkom to give the train “a tough face” that radiated speed, luxury and reliability. Werkspoor then built the railcars and the Swiss SIG passenger coaches. In 1957 the Trans Europe Express came into service and ran until 1974 as a TEE train, taking the journey through the Netherlands, Belgium, France, Germany and Switzerland.

In 1977, the remaining TEE trains were sold to Canada. Twenty years later, a Swiss foundation bought the remaining carriages to go on nostalgic rides with them. In 2006 the TEE Netherlands Foundation took over the train and brought it back to the Netherlands. In 2021 the TEE was transported from Amsterdam to the Zaanstraat where the train was lifted and transported to the National Transport Museum in Nieuw-Vennep.

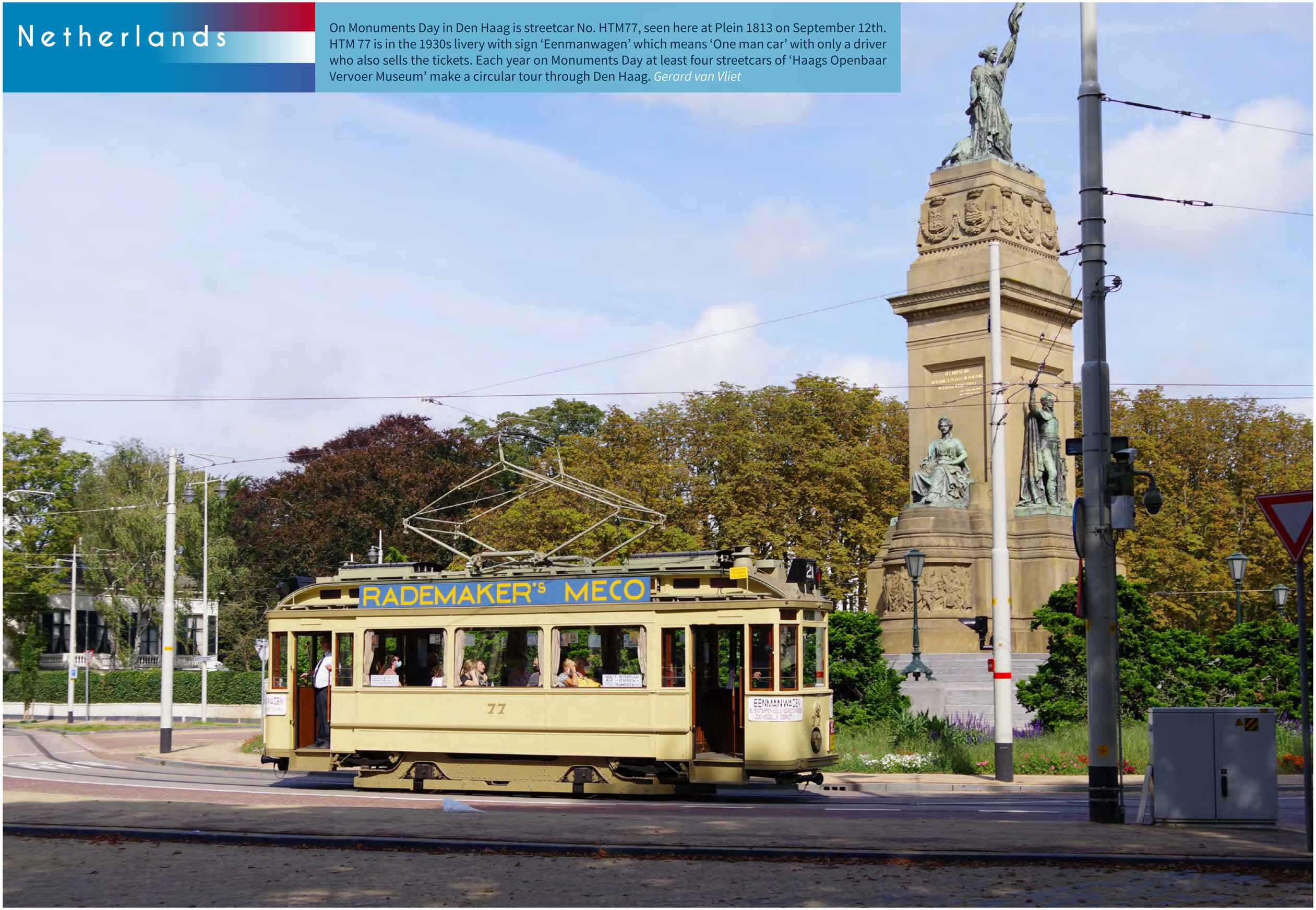
The museum is taking this very large project step-by-step: First to save the train and transport it, next, the museum wants to stop the further deterioration and try to conserve the train. Further plans will be announced when the museum has a good idea of the (costs of) the restoration. *Andre Pronk*

NS SGM Nos 2962 and 2975 passes the former Cooperative Dairy 'De Soester' in Soest working a sprinter service from Baarn to Utrecht Central station on September 8th. *Erik de Zeeuw*

On September 8th, ELL Class 193.734-1 on hire to Rail Force One, is seen near Soest with the Schavemaker shuttle from CTT Moerdijk to Kąty Wrocławskie Rail Terminal in Poland. *Erik de Zeeuw*

Netherlands

On Monuments Day in Den Haag is streetcar No. HTM77, seen here at Plein 1813 on September 12th. HTM 77 is in the 1930s livery with sign ‘Eenmanwagen’ which means ‘One man car’ with only a driver who also sells the tickets. Each year on Monuments Day at least four streetcars of ‘Haags Openbaar Vervoer Museum’ make a circular tour through Den Haag. *Gerard van Vliet*



Netherlands

NZH streetcar No. A327 is seen at Plein 1813, Den Haag, on September 12th. This streetcar was built in 1913 for the Haarlem tram network of Noord-Zuid Hollandse Tramweg Maatschappij (NZH) and ended its duty at the NZH tram network at Leiden. *Gerard van Vliet*

RFO No. 1837 approaches Deventer whilst working a rake of Zacns tankers from Bad Bentheim in Germany to Rotterdam on September 9th. *Erik de Zeeuw*

Netherlands

On August 13th, NS SNG CAF Civity No. 2328 is seen near Holten working a sprinter service from Apeldoorn to Almelo. For a better visibility of this type of train, yellow has been applied to the front. *Erik de Zeeuw*

NEWAG Dragon No. E6ACTa-008 operated by JAXAN, waits for a path at Wysoka Kamienska on July 24th.
Anton Kendall

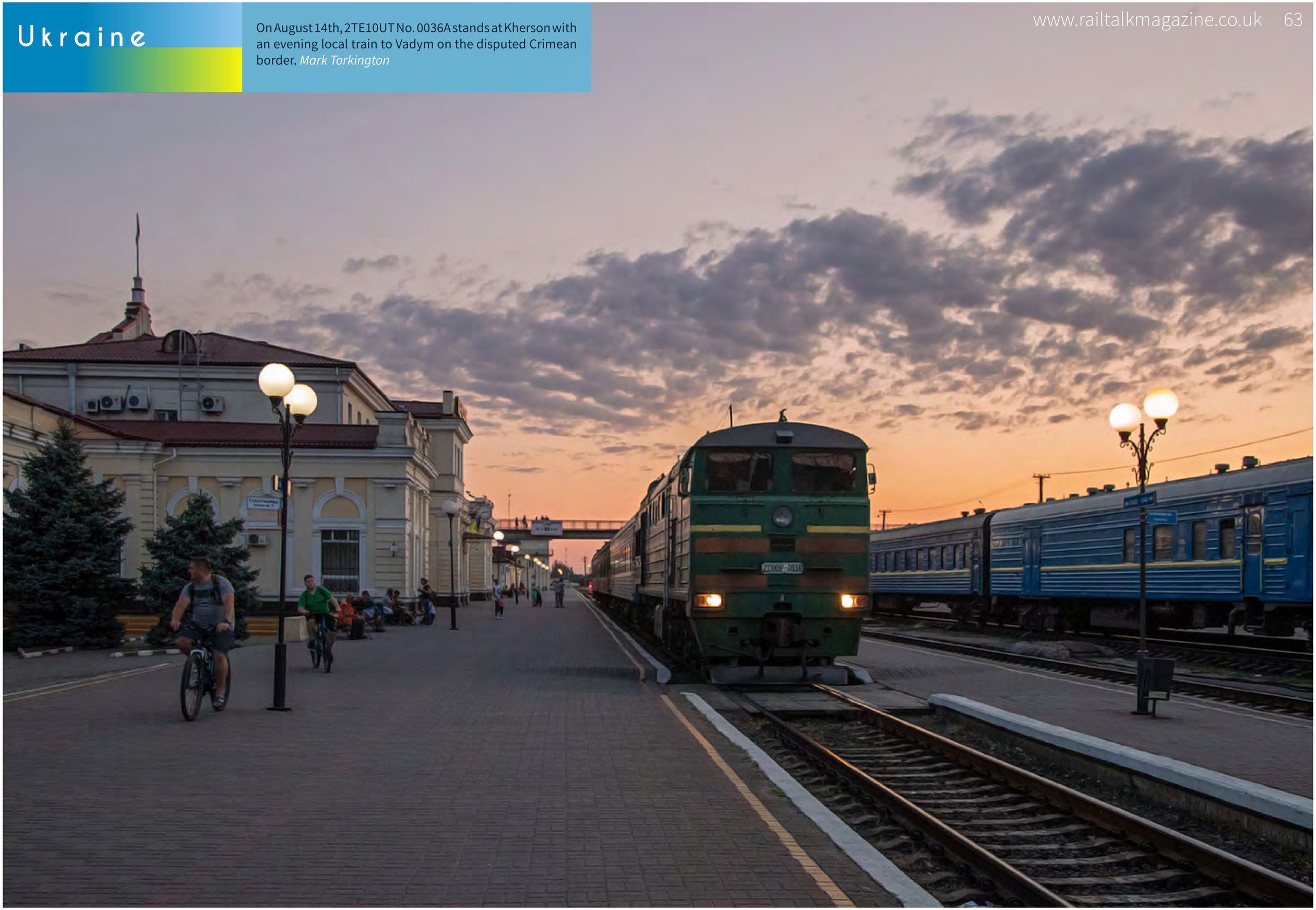
Operated by ORLEN KolTrans, Railpool's Class 186.145-9 passes Rozyny heading south from the Gdynia area on July 21st. *Anton Kendall*

On August 22nd, Croatian Class 1142.005 is “fly shunted” by 642.186 back towards 25kv AC overheads at the voltage change station of Dobova which also doubles as the international border. *Mark Torkington*

One of the highly stylised EP2 “Elektrichka” EMUs departs Kharkiv Pas station on August 11th. *Mark Torkington*

On August 12th, 2TE116 Nos. 1172A and 1173A await departure from Berdyansk with train No. 228 to Kyiv. *Mark Torkington*

On August 14th, 2TE10UT No. 0036A stands at Kherson with an evening local train to Vadym on the disputed Crimean border. *Mark Torkington*



Egypt

Siemens Mobility Signs Historic Contract for Turnkey Rail System in Egypt worth USD 3 bn

Siemens Mobility is honoured to announce that it has signed a contract with the National Authority for Tunnels (NAT), in witness of the Egyptian Prime Minister and Minister of Transport, as well as the German Ambassador in Egypt to deliver a comprehensive rail system that will feature the first ever high-speed, electrified main and freight rail line that will transform transportation in the Arab Republic of Egypt. Together with partners Orascom Construction S.A.E. and The Arab Contractors, Siemens Mobility will provide its comprehensive turnkey services to design, install, commission, and maintain the systems for 15 years. The total contract value is approximately USD 4.5 billion, of which Siemens Mobility's share is around USD 3 billion. The vast majority of the order intake is expected to be booked in 2022 after financial closing. It is the first contract to be signed from the MoU agreed upon between NAT and Siemens Mobility, Orascom Construction and The Arab Contractors in January 2021. The contract signed covers the initial 660 km out of the 1800 km rail network planned. Additionally, it was agreed to discuss and finalize the agreements on the two other high-speed railway lines including rail infrastructure and trains, and maintenance in the coming months.

"This high-speed train will strengthen the infrastructure of the areas it passes through and help achieve urban sprawl, in addition to linking the New Administrative Capital and new cities to the railway network for transporting passengers and goods," said H.E Lieutenant General Kamel El-Wazir, Egyptian Minister of Transport. "The project will also help promote tourism through a fast, modern, and safe means of transportation characterized by the highest levels of efficiency and safety to meet the needs and expectations of all Egyptians across the country which is considered a major leap in the field of rail transport. For its part, Siemens will provide its latest smart technology solutions, along with its continuous support to local skills development."

"We are proud to support the Egyptian government's ambition to transform its transport sector by building its first high-speed electrical rail network. This landmark project will create jobs, boost economic growth, and improve quality of life for millions of people, by creating a more efficient, safe and sustainable transport system," said Roland Busch, President and Chief Executive Officer of Siemens AG. "As a long-standing partner to Egypt, we are committed to providing the most advanced technology and to supporting local skills development." "We are honoured and proud to become Egypt's partner in constructing a state-of-the art rail system that will transform the everyday travel for millions of Egyptian people. Our world class trains will provide an enhanced passenger experience, and combined with our digital leadership in rail infrastructure, we will deliver a safe, reliable and efficient transportation system," said Michael Peter, CEO of Siemens Mobility. In addition to benefiting passenger travel, the first fully electric mainline rail network in Egypt will create thousands of local jobs and open up huge possibilities for freight transport."

For this project, Siemens Mobility will deliver its Velaro high-speed trains, Desiro high-capacity regional train sets, and Vectron freight locomotives. A safe and reliable signalling system based on the latest computer-based interlocking technology and European Train Control System (ETCS) Level 2 will be installed, as well as the power supply system that delivers efficient and continuous energy. Furthermore, Siemens will provide and integrate the latest communications, safety and security systems that will create a pleasant passenger experience. The trains as well as all subsystems are based on the most modern and proven products and platforms. Siemens Mobility's consortium partners will install the tracks, while the customer will build the bridges and facilitate the sub construction.

A Suez Canal on tracks

The 660 km line will connect the port cities of Ain Sokhna on the Red Sea to Marsa Matrouh and Alexandria on the Mediterranean, creating a Suez Canal type of link on the tracks. The Egyptian government has an ambitious plan to invest heavily in a reliable and sustainable 1800 km state-of-the-art high-speed rail network, that will provide efficient, safe, and affordable transportation for all Egyptians, as well as goods across the country. The two additional lines will connect the Greater Cairo region from 6th October City along the Nile River with Aswan, and Luxor via Hurghada to Safaga. The entire network will re-establish Egypt as a regional leader for transportation. It will impact different economic sectors, empowering both smaller and midsized businesses, and will provide an overall boost to the economy.

High impact on society, environment and economy

Already the first line will be very beneficial for Egypt's society and environment. The consortium will directly create more than 15,000 jobs in Egypt, with an additional 3,800 at Egyptian suppliers and indirectly through the wider Egyptian economy. It is anticipated that many more jobs will be created as soon as the other lines are ready for implementation. In addition to jobs, the project will also contribute to a significant local, technical training and qualification program that Siemens Mobility intends to support, which will provide the needed skill development to complement the project.

The fully electrified system will reduce primary energy usage and overall air pollution by cutting carbon emissions by 70%, in comparison to the current emissions from car and bus transportation, thereby increasing the quality of life and protecting the environment for Egyptians. The rail system will be based on state-of-the-art technology, proven products, and European standards. The signalling system to be supplied complies with highest safety requirements. Additionally, extensive testing and commissioning and local training will ensure the safety of passengers and staff.

More than 30 million passengers per year

The connection will transport more than 30 million people per year and save up to 50 percent travel time, which will strongly increase the productivity of workforce. It will link Cairo to the new urban communities being developed. Cairo's population has doubled in size since 1980 and today approximately 20 million people call Cairo home. Therefore, to ease the congestion, new cities are currently being developed around the Cairo metropolis. The additional benefit of a comfortable and affordable commuter system around Cairo will reduce travel time from east to west. Furthermore, the line will connect both sea and dry ports which will improve the overall efficiency of moving freight. Specifically, the total inland freight transported on rails will be increased by 15%.

Hungary

Ceremonial start of construction for new Metrans hub terminal in Hungary

The HHLA intermodal subsidiary Metrans is expanding its network. The first foundations were laid for a new Metrans hub terminal on September 9th in the Hungarian town of Zalaegerszeg. This will be a hub for transport services along the Adriatic Corridor and towards Southern and South-Eastern Europe. Metrans invests around € 40 million in the project, supported by funding from the Hungarian government. 120 new jobs will be created. The first trains are to be handled at the facility in 2023.

Angela Titzrath, Chairwoman of HHLA's Executive Board: "We see strategic potential in the Zalaegerszeg location for the expansion of transport services to the Adriatic and to Southern and South-Eastern Europe. The new hub terminal will ensure that Hungary can strengthen its position as a logistics hub in the heart of Europe. The outstanding collaboration with various Hungarian authorities was an example of successful pan-European collaboration."

Peter Kiss, Chairman of the Executive Board of the Metrans Group: "There won't just be a Metrans hub terminal in Zalaegerszeg – it will also be a central point for the entire European rail freight transport. Our investment shows how important Hungary is for the further development of the Metrans intermodal network."

The first construction phase of the plant will be operational as early as 2023. The total investment of over € 40 million includes a grant from Hungarian institutions amounting to approximately € 11 million. Around 120 new jobs will be created in Zalaegerszeg. The volume of containers transported by rail in Hungary has grown continuously in recent years. Metrans has benefited from this, especially through the hub terminal in Budapest, which started operation in 2017. In the first year, around 250,000 standard containers (TEU) were handled at the facility, this increased to more than 425,000 TEU in 2020.

Regular block trains operated by Metrans connect Hungary, via Budapest and the Slovakian city of Dunajska Streda, to the North Sea ports of Hamburg, Bremerhaven and Rotterdam as well as to Duisburg, and the Adriatic ports of Trieste and Koper.
The entire European intermodal network of Metrans now comprises 17 of its own and other associated terminals. This network, and specifically the Budapest terminal, is a key component in the Silk Road. Metrans handled 913 trains in 2020 (2019: 426 trains) that originated in or destined for China. This is an increase of 114 percent, with a corresponding transport volume of approximately 30,000 TEU.

Poland

Lower Silesian Railways are buying another 8 trains from PESA Bydgoszcz.

Lower Silesian Railways have decided to use their law of option and have ordered another 8 units of Elf2 trains. Thanks to this decision the cumulative number of thirteen 5-unit trains produced in PESA Bydgoszcz will arrive on tracks of Lower Silesia. First of them will hit the road as soon as in the year 2022. The agreement signed on September 29th that was made between the carrier and the producer have included 5 ELF2 trains with the law of option that allow to order 20 more trains for delivery in the future. The announced increase in this order by 8 trains is going to raise the value of this contract by 232 million zlotys.

"We're taking over another railway lines in this region and that's why we decided to increase the initial number of trains by some new ones. We need to prepare with Lower Silesian Railways for the further development of railway lines in the upcoming future," says Cezary Przybylski, marshal of the Lower Silesian voivodeship, "We want to improve the metropolitan railway in Wrocław and Elf2 trains thanks to the ability to board over 550 passengers fully suit our needs."

The value of the whole order for Lower Silesian Railways is going to reach 377 million zlotys, and one train is going to cost 29 million zlotys. New rolling stock is going to allow the carrier and the local government to continue the further development of web of railway connections in the upcoming years. The final units are going to be delivered to the carrier in the first half of 2023. What our board doesn't rule out is that the carrier might widen the order even more as the law of option enables them to order another 12 trains until the end of September 2021.

"From the very beginning our aim was to buy the highest possible number of new trains as part of this rolling stock project. Last year we ordered 11 trains, including 6 hybrids from Newagu, now we show a gesture of will to increase this order by 8 new modern trains. It's already the biggest rolling stock project in the history of Lower Silesian Railways. I am ensuring though, we haven't said the last word just yet. We are constantly working on making the best use out our buy options. We have still got some time for that," CEO of Lower Silesian Railways, Damian Stawikowski.

"Thanks to making use of this option Lower Silesian Railways are going to have a fleet of 13 of modern 5-unit Elf2s at their disposal. They are low-emission, comfortable and safe vehicles ideally suit the needs of metropolitan and regional railway transport. I am convinced that those trains are going to be appreciated by both passengers and the crew, which will eventually transfer to further order as a part of an option," said Krzysztof Zdziarski, the CEO of PESA Bydgoszcz.

The model that was selected by Lower Silesian Railways, ELF2 belongs to the newest generation of EMUs designed by PESA Bydgoszcz. The maximum speed of these trains is 160 km/h. Up until this point PESA has already delivered 47 of such trains to both national and international carriers. New trains have a seating space for 250 people, however they can safely board over 550 passengers. In order to increase the comfort of the travel as well as safety ELF2 is equipped with on-board WiFi, a storage space for bikes, two spaces for wheelchairs, bigger luggage storage, and surveillance. Additionally the producer is obliged to service these trains up to the level of P3.2.

Switzerland

SBB Half-year results 2021: Covid continues to have an impact.

Demand slowly recovering, financial situation strained, customers more satisfied.

Impact of Covid-19 pandemic remains significant. In the first half of 2021, 763,000 passengers travelled each day, 41% less than in 2019. Demand is increasing again, but only slowly; the current occupancy rate is 25% below that of 2019. It will take some time before passenger numbers fully recover. Long-term, however, growth in rail will regain its momentum.

Many commuters continued to work from home in the first half of 2021. Leisure travel was also significantly down compared to pre-pandemic levels. The number of GA Travelcards went down: 395,000 GA Travelcards were in circulation, compared to 459,000 in June 2020 and 493,000 in June 2019. 2.7 million Half Fare Travelcards are in circulation, a slight decrease compared to June 2020 (–0.9%), but 1.9% more than in 2019. It is encouraging that sales of both travelcards are currently increasing slightly again.

Passenger train punctuality was 92.7%, despite heavy snowfall in January and severe weather in June. Lower passenger numbers relieved the rail system, resulting in greater punctuality. As normality returns and with more passengers present, the trend in punctuality is downward. Improved planning of construction and maintenance work also had a positive impact. Consignment punctuality at SBB Cargo Switzerland was 91.3%.

The generally stable operating situation and the large amount of space available on the trains contributed to a positive travel experience. Customer satisfaction rose by 4.2 points compared to June 2020 to 77.5. This trend is also confirmed with the current increase in the occupancy rate. Customers were particularly positive about their sense of safety, about the information provided, and about using SBB Mobile. Employees working on trains, at stations, in the track area, in industrial workshops, at SBB locations, and from home all made a major contribution to customer satisfaction.

Even following the relaxation of measures in June, the protection and cleaning plan for public transport remains in place. Since the beginning of the pandemic, SBB staff have been cleaning trains and stations more frequently and more intensively. The requirement to wear masks on trains continues to be well observed, for which customers deserve our sincere thanks. Observing the protection measures means people travel safely and protect themselves, their fellow passengers, and our staff.

Increasing numbers of customers are using the digital channels on sbb.ch and SBB Mobile to buy tickets. 68.4% of tickets were sold digitally. The trend of previous years continues. The self-service rate, including ticket machines, rose to 95.0%. In SBB Travel Centres, on the other hand, customer advise is becoming increasingly important.

Sharp rise in debt, introduction of cost-cutting measures.
Despite the coronavirus crisis and in consultation with SBB's owner, the Confederation, SBB has fulfilled its basic mandate and is pressing ahead with expansion measures and service developments in accordance with its mandate.

The half-year loss amounts to CHF –389 million. In 2020, it was –479 million. Nevertheless, the 2021 adjusted loss is CHF 30 million higher. The reason is that 120 million in federal support have already been factored in, whereas in 2020 this was not the case until the end of the year. In its own commercial areas of Long-Distance Services, International Passenger Services and Real Estate, SBB must bear revenue losses itself. 2019 mid-year results were well in the black at CHF 279 million.

Pandemic-related losses mean that SBB's debt has risen sharply. The debt service coverage ratio – net interest-bearing debt in relation to EBITDA – is 17.7, well beyond the maximum limit of 6.5 demanded by the federal government.

The federal government is supporting those areas eligible for grants, namely regional services, infrastructure network and freight services for Switzerland, with additional funds in accordance with the federal act on support for public transport during the Covid-19 crisis. Since the beginning of the pandemic, earnings have thus been supported with a total of around CHF 400 million. For this, SBB would like to thank the Confederation and the whole of Switzerland.

The Federal Council is also submitting a dispatch to parliament regarding Covid funding for 2021. SBB welcomes this, as the crisis continues to affect SBB and public transport in Switzerland in 2021 and will do so beyond this year. SBB's financial situation will remain very strained in the coming years. To ensure short-term liquidity, the federal government has increased the limit for short-term loans from CHF 750 million to CHF 950 million until the end of 2021. A federal government-SBB working group is currently drawing up basic principles for ensuring sustainable, robust financing of the company with a planning horizon of 2030. SBB itself is doing everything it can to ensure a sound financial situation by implementing cost-saving measures and increasing efficiency.

Mobility is changing, SBB seeks to win back customers.
Forms of mobility and mobility habits are changing because of the pandemic. SBB is convinced that the need for climate-friendly mobility will cause demand to rise again. SBB is recruiting additional staff, primarily locomotive crews, passenger attendants and skilled workers for its workshops.

SBB is doing a lot to win back customers. In close cooperation with the public transport sector, SBB is testing new, more flexible forms of travelcard and launching campaigns. Leisure travel was particularly hard hit at the start of the Covid-19 crisis. It has now recovered slightly more than commuter travel has. Both leisure and commuter travel are below 2019 levels of demand. SBB estimates that it will still take some time for passenger numbers to fully recover. Long term, however, growth in rail will regain momentum; the increasing need for climate-friendly, comfortable travel will also contribute to this.

Situation for locomotive personnel normalises at the end of the year.
Across Switzerland, 200 train drivers will complete their training within the next six months. This suggests that the situation for locomotive personnel will return to normal by the end of 2021, as previously announced. However, the situation will remain tense until the end of October in some regions, such as the Zurich area and especially in the French-speaking regions of Switzerland. Unfortunately, last-minute train cancellations in the French-speaking regions cannot be ruled out at the present. In these cases, customers will be notified as quickly as possible via the usual channels. As announced, locomotive drivers will be trained for more routes and vehicle types in the future, which will allow for more flexibility in their assignments. SBB would like to thank its customers for their understanding and its staff for their great commitment.

Coronavirus burdens all SBB Divisions.
SBB Passenger posts a loss of CHF –389 million in the first half of 2021; this result includes CHF 75 million in additional public sector funding. In Long-Distance Services, SBB is bearing the loss of CHF –372 million itself. Demand remains well below pre-pandemic levels, with long-distance traffic down 50.3% and regional traffic down 36.6%.

The half-year results for Real Estate total CHF 127 million before compensation payments to Infrastructure and the pension fund. This is 21 million higher than in the previous year, thanks to the completion of Real Estate projects. There were fewer customers at railway stations (–6.6% in comparison with 2020, –38.8% in comparison with 2019). SBB has accommodated business tenants by granting rent concessions totalling around CHF 70 million during the pandemic.

SBB Cargo Switzerland registered a loss of CHF –8 million in the first half of the year. Earnings were supported by CHF 15 million of additional federal funding (of which CHF 12 million were an addition for the previous year). The loss is smaller than that of 2020 (CHF –27.7 million). In 2019, earnings were just about in the black at CHF 0.3 million. Results at SBB Cargo International were encouraging: the company registered a loss of CHF 0.2 million, 4.0 million better than in 2020.

SBB Infrastructure registered a half-year loss of CHF –52.0 million, an improvement of CHF 63 million on the previous year. An additional CHF 30 million in public funds in the previous year, which were not considered until the end of the year, brought this number up. In the Energy unit, earnings were CHF 17.5 million, an increase of CHF 5.1 million above those of 2020.

Slovakia

SLOVAK NATIONAL CARRIER ZSSK WILL HAVE UP TO 20 NEW REGIOPANTER TRAINS

The Slovak Railway Company (ZSSK) signed a contract with a consortium of Škoda Transportation and ŽOS Trnava for the purchase of new electrical units. The subject of the contract is the delivery of 9 pieces of electrical units with a possible option for another 11 pieces. The first 9 new four-car RegioPanters will run in the Košice and Prešov regions. The fleet of these units will thus grow to 34 in Slovakia and up to 45 if the option is exercised. The first nine units will be delivered by the end of 2023 and others according to the order. The value of the contract, including the option, is almost 170 million euros, ie approximately 4.3 billion crowns.

“Slovakia has long been a key business partner for us. Passengers already know our units well, of which several types ride here. I am so glad that with each new unit we can show how the level of comfort, safety and sustainability of new trains is shifting,” Petr Brzezina, Chairman of the Board of Directors and President of the Škoda Transportation Group

“Eastern Slovakia needs new trains and good experience from cooperation with Škoda in Žilina and its surroundings, where similar cars have reliably travelled 1.15 million train kilometres, gives us hope that even East Slovaks will not be disappointed,” says Roman Koreň, Chairman of the Board ZSSK. “Our consortium has already shown the high quality of production and technical solutions in the last order. I am pleased that we will be able to repeat this success and that other Slovak regions will receive our modern units,” added Petr Brzezina.

“Another order for these new electric units confirms that we produce modern and high-quality trains and that passengers are satisfied with them. We are very pleased to extend the cooperation with a strong partner, such as the Škoda Transportation Group,” says Miloš Kyselica, Deputy Chairman of the Board of Directors and CEO of ŽOS Trnava.

The new RegioPanter electrical units, which follow on from the currently supplied and successfully operated units, will be supplied for regional operation of electrified lines in the Košice and Prešov regions for speeds of 160 km/h and voltages of 3 kV and 25 kV. All new four-car units will have a length of 106 m and a capacity of 343 seats. Each car in the set will have a classic arrangement of two bogies and each electric unit will always have three powered vehicles. Thanks to this, the sets will have excellent driving characteristics on all electrified lines in Slovakia and will enable reliable adherence to the timetable in demanding winter conditions, with changes being incorporated based on customer requirements and operational experience that will further increase passenger comfort. This includes, for example, preparation for the installation of a vending machine, a ticket vending machine, or interior modifications so that the unit has more space for bicycles, skis and other sports equipment. The wide boarding door together with the fully continuous modern interior without interior doors will enable fast and smooth movement of passengers. Boarding the vehicle will be possible on most standard platforms with a height of 550 mm directly without the need for stairs. For other platforms, boarding will be secured with the help of sliding stairs.

“Passengers will especially appreciate the comfortable seating, electrical sockets, air conditioning, stylish LED interior lighting and vehicle equipment with a spacious modern toilet accessible to the disabled. The electric units will also offer an improved camera system, a modern information system with monitors and also high-performance Wi-Fi. The units will also have enough space to transport disabled people, prams, bicycles, skis, snowboards and will also offer easy and barrier-free boarding for all passengers,” adds Tomáš Ignačák, Deputy Chairman of the Board of Directors of the Škoda Transportation Group.

As in the previous order, for a total of 25 electrical units, part of the production will take place in ŽOS Trnava, which participates in the production of inserted cars and with the participation of experts from Škoda Transportation in the final connection of cars, revitalization of entire units, tests and preparation for handover to the customer. Currently, 20 low-floor RegioPanter units are already operating in Slovakia and another 5 will be put into operation by the end of this year. With the new order, ZSSK will have up to 45 units of this type available. These are one of the most successful products of the Škoda Transportation Group. Customers have already signed orders for a total of 250 of these units, of which more than half are in the Czech Republic. However, low-floor electric units from Škoda run not only in the Czech Republic and Slovakia, but also in Lithuania and Ukraine, and passenger cars from the Škoda Transtech subsidiary carry passengers in Finland. New units for Latvia are currently being produced and a six-piece order has been signed for Estonia.

France

Airbus and Alstom sign cybersecurity cooperation agreement

Airbus CyberSecurity and Alstom, global leader in sustainable mobility, have signed a worldwide cooperation agreement focussing on rail transport cybersecurity. The partnership will allow the partners to provide rail operators with solutions and services combining Alstom’s solutions and expertise in rail transport with Airbus CyberSecurity’s services and expertise in ensuring the security of industrial information systems.

“In the context of increasing worldwide cyber threats across all sectors, Alstom aims to protect its assets and those of its customers as effectively and as early as possible. The collaboration between Alstom and proven specialist Airbus CyberSecurity will ensure the future usage and success of green mobility worldwide,” says Eddy Thesee, Vice President Cybersecurity at Alstom.

“As specialist in the cybersecurity of industrial systems, particularly in the transport sector, we are keen to contribute to securing the information systems of the rail sector along with Alstom,” says Nicolas Razy, Director of Airbus CyberSecurity France.

Airbus CyberSecurity will contribute to joint offers with services and solutions in security monitoring of railway systems through its various Security Operations Centres (SOCs) and in responding to incidents. It will also contribute to security auditing services and penetration and intrusion testing, notably through its simulation and testing platform for industrial systems, CyberRange.

Alstom is bringing its knowledge of railway systems design, manufacture, operations and maintenance into the partnership. The global leader in digital rail will also leverage its unique railway cybersecurity expertise developed in recent years. Worldwide, Alstom counts over 13,000 employees working on digitalisation in the rail sector, particularly in the areas of signalling technology, smart mobility and cybersecurity.

In recent years, railway companies have developed ambitious digital strategies, particularly to cope with the growing number of passengers. They have deployed and interconnected information systems combining IT, operational technology (OT) and the Internet of Things (IoT) in the management and control systems of trains, metros and trams, track signalling systems and rail operations control centres. To protect their asset and ensure safe and secure mobility to their customers, railway companies will be able to rely on solutions tailored by Alstom and Airbus CyberSecurity for their industry.

Poland

Cargounit orders up to 30 locomotives from Siemens Mobility

Cargounit, the largest independent locomotive leasing company in Poland, has ordered up to 30 Vectron MS locomotives from Siemens Mobility. The framework agreement includes the delivery of ten units by the end of 2023 and an option for 20 additional locomotives by 2024 as well as the maintenance of the vehicles. The first two locomotives will be delivered this year. The locomotives are planned for service in Poland, Germany, Austria, the Czech Republic, Slovakia, Hungary, Slovenia, Croatia, and Serbia, the Netherlands and optionally Romania and Bulgaria. The leasing company previously ordered six locomotives from Siemens Mobility in 2018 and 2019. Cargounit's Vectron fleet could grow to 36 locomotives by 2024.

"We are especially pleased to have received our largest Vectron MS order from Poland to date. With this order, Cargounit is investing in one of the most modern and at the same time most environmentally friendly universal locomotive available on the European market today," said Albrecht Neumann, CEO Rolling Stock at Siemens Mobility. "Thanks to their modular design, the locomotives offer operators maximum flexibility for sustainable, cross-border transport."

"The Cargounit strategy is based on dynamic development through investments in modern electric locomotives. The purchase of Vectron MS locomotives, which are the core of multisystem locomotive fleets operated by leading national and private carriers, fits perfectly into our company's development plans. International transport, especially in the intermodal segment, is the fastest growing segment of the market.
The Vectron MS locomotives are a proven and valued platform for multisystem locomotives and are approved by many European countries. One important aspect when choosing a supplier of multisystem locomotives was the ability to quickly deliver fully homologated locomotives to meet the current needs of our customers," said Łukasz Boroń, President of the Management Board of Cargounit.

The ordered multisystem locomotives have a maximum output of 6.4 megawatts and a top speed of 200 km/h. They are equipped with the required national train control system as well as the European Train Control System (ETCS).

To date, Siemens Mobility has sold more than 1,114 Vectron locomotives, including 736 Vectron MS units, to 56 customers in 16 countries. The Vectron fleet has so far accumulated more than 490 million kilometres in service. The locomotives based on the Vectron platform are approved for operation in 20 European countries.

Egypt

Alstom successfully delivers the first two Innovia 300 monorail trains for Cairo Monorail on time

First two of 70 trains completed and delivered by Alstom's Derby, UK factory
Major milestone in the €2.7 bn Cairo Monorail project

Alstom's first two Innovia 300 monorail trains for the Cairo Monorail project have arrived in Cairo after being completed at Alstom's Derby UK factory, with propulsion systems application led by Alstom's site in Trapaga, Spain. The dispatch of the first 8 fully automated, driverless cars out of 70 trains (a total of 280 cars) is a major milestone in the Cairo Monorail project, Egypt's first two monorail lines, linking the New Capital City and 6th October City to Greater Cairo.

In August 2019, an Alstom-led consortium composed of Orascom Construction and Arab Contractors signed a €2.7bn contract to design, implement, operate, and maintain the two lines. The project includes a 54 km line connecting the New Administrative City with East Cairo and a second 42 km line connecting 6th of October City with Giza.

Both lines are expected to open in 2023. After the construction phase is completed, the Alstom-led consortium will provide 30 years of operation and maintenance (O&M) services for both lines.

"I am proud of the project team for the successful delivery of the first two trains to the National Authority of Tunnels. The monorail will be a game changer for residents, decreasing commute times, congestion, pollution, and carbon emissions. It is an important part of the government's ongoing efforts to redefine Egypt's urban future. A future, we are committed to help actualize through safe, smart and green solutions," said Andrew DeLeone, President Alstom Africa, Middle East & Central Asia.

Egypt is committed to developing and improving mobility services for its citizens, while reducing traffic congestion and environmental impact. The Innovia 300 monorail system allows fast construction of high-capacity lines at lower costs. Once maximum capacity is achieved, each of the two Cairo lines will be able to transport 45,000 passengers per hour in each direction. The Innovia 300 monorail system is equipped with Alstom's proven Cityflo 650 communications-based train control solution. Benefits of this flagship technology include high reliability, flexible operation, shorter headways between trains, improved safety and reduced maintenance costs.

The Alstom Mitrac propulsion system provides strong reliability and maintainability, and thanks to its permanent magnet motor, better energy consumption figures.

Alstom has been a partner to Egypt's railways since 1971, continuously supporting the railway infrastructure development in the country. Over these years, Alstom Egypt has established a local talent pool and Center of Excellence (COE) related to signalling systems, power supply and maintenance workshops to support projects across its Africa-Middle East-Central Asia (AMECA) region. It is this rich heritage that has enabled Alstom to make a significant contribution to Egypt's rail industry development. Today, Alstom employs approximately 500 people in Egypt with ongoing projects which includes the modernization of signalling system on the Beni Sueif – Assyut line.

Roy Hill Sets New Course with Purchase of FLXdrive Battery Locomotive

FLXdrive is the world's first 100% battery-powered, heavy-haul freight locomotive

Roy Hill has announced the purchase of Wabtec's FLXdrive battery-electric locomotive, the world's first 100-percent battery, heavy-haul locomotive for the region and the mining industry.

"We are committed to transforming the next generation of transportation by adopting advanced technologies that improve energy efficiency, lower operating costs and improve our rail and mining network," said Gerhard Veldsman, CEO of Roy Hill. "The FLXdrive locomotive will be the first for the region and the first for the mining industry and will improve our rail operations from the mine to Port Hedland."

Roy Hill will receive the newest version of the FLXdrive battery-electric locomotive in 2023 with an energy capacity of 7 megawatt hours (MWh). It is an upgrade from the 2.4-MWh prototype that was successfully tested in revenue service with a Class 1 railroad in the United States earlier this year. Based on the route and Roy Hill's rail operations, the FLXdrive is anticipated to reduce the company's fuel costs and emissions in percentage by double digits per train. The ongoing use of the FLXdrive will also reduce ongoing operational costs through maintenance spend.

"Our analysis with Wabtec confirms the FLXdrive locomotive is ideally suited for our rail network," said Simon Pascoe, General Manager of Engineering for Roy Hill. "It has the horsepower to operate in a heavy haul train consist pulling loaded wagons with 35,000 tonnes of iron ore, while at the same time reducing the entire train's fuel consumption. The FLXdrive also is designed to function in the extreme heat of the Pilbara region."

Today, Roy Hill uses four Wabtec ES44ACi "Evolution Series" diesel-electric locomotives in a consist to pull trains that are typically 2,700 meters (1.6 miles) in length. The FLXdrive will replace one of the diesel locomotives to form a hybrid consist, and recharge during the trip through regenerative braking. The FLXdrive manages the overall train energy flow and distribution through its Trip Optimizer system, an intelligent cruise control system programmed through artificial intelligence to respond to every curve and grade of the track in the most energy-efficient way possible.

It is also designed with a special liquid cooling system to withstand the Pilbara heat, where temperatures can reach 55°C (130°F).

"This order demonstrates Roy Hill's progressive and forward-thinking approach to the mining industry," said Wendy McMillan, Regional Senior Vice President Australia and New Zealand for Wabtec. "By adopting this revolutionary technology in region, Roy Hill is pioneering new approaches to its operations that will benefit the company's bottom line. The FLXdrive is a continuation of our growing partnership and shared vision to bring more efficient solutions to mining and rail industries."

Wabtec's goal is to develop the next generation of zero-emission locomotives. The company has a clear path to power new locomotives – and repower existing locomotives – with batteries, hydrogen internal combustion engines, and hydrogen fuel cells. It is part of Wabtec's vision for the rail industry to play a key role in building a clean energy economy and will enable the reduction of up to 300 million tons of global carbon emissions.

"Controlling emissions is critical in the fight against climate change," said Rogerio Mendonca, President of Freight Equipment for Wabtec. "The FLXdrive battery-electric locomotive is a bold step toward a low-to-zero-emission locomotive future. We continue working on solutions that cut the overall carbon footprint of the industries we serve through the development of low-emitting locomotives like the FLXdrive, and the use of alternative fuels such as bio-diesel, renewable diesel and hydrogen."

Alstom hands over Turkey's first locomotive equipped with ETCS level 1 & 2 for the Eskişehir-Kütahya-Alayunt-Balıkesir railway line

Alstom has handed over the first locomotive, out of 26, equipped with the European Train Control System (ETCS) level 1 & 2 as part of the company's contract with Türkiye Cumhuriyeti Devlet Demiryolları (TCDD) to supply signalling and telecommunications systems on the line connecting Eskişehir, about 260 km East of Ankara, to Balıkesir near the Aegean coast. This 328-km long rail link also serves the city of Kütahya.

The new signalling system will enable TCDD to manage its rail services on the Eskişehir-Balıkesir corridor efficiently and seamlessly. Additionally, it will make it possible to increase the line's capacity.

The Eskişehir-Kütahya-Alayunt-Balıkesir (EKB) project includes a trackside and on-board modernization project for the EKB line covering the design, manufacturing and supply of the complete trackside via Atlas – Alstom's signalling system based on level 1 & 2 of the state-of-the-art ERTMS/ETCS, Smartlock interlocking solution and Iconis, an integrated control centre.

Furthermore, Alstom is supplying level crossing systems, technical equipment buildings as well as power distribution and uninterrupted power supply systems. A GSM-R system is also provided for the project on the Alayunt-Afyon line section.

"As a long-term partner, we are dedicated to continue supporting TCDD in their mission to enhance their railway technology and improve the line's safety and capacity. With the new ETCS on-board, the locomotives will provide an advanced level of security beyond the capabilities of the legacy Automatic Train Protection systems (ATP). It will also reduce the total operating cost of EKB line, and it will standardize the line-length and on-board equipment while providing common communication between countries. Indeed, we are very proud of what we have achieved together with TCDD," said Mama Sougoufara, Alstom MENAT and Turkey Managing Director.

Alstom has been present in Turkey for more than 60 years, delivering rail vehicles, turnkey transit systems for metros and trams, and established as a leading provider of signalling and train control technology. The Istanbul office hosts the regional center for Alstom's Digital & Integrated Systems expertise, as well as the Systems & Infrastructure project teams, providing project management, engineering, training and maintenance services.

Taiwan

Alstom-led consortium to deliver innovative integrated system for Taipei's fully automated metro line

The Alstom-led consortium with Taiwanese engineering and contracting services company CTCI has been awarded a contract by the Systemwide E&M Project Office Department of Rapid Transit Systems of Taipei City Government (SEMPO) to provide its state-of-the-art integrated metro system for Taipei Circular Line Phase Two. Valued close to €720 million, this order for the city's fully automated (Grade of Automation 4) metro line marks the recent consortium's second turnkey metro project in Taiwan after the Wanda-Zhonghe-Shulin Line. Under the contract with its share at over €430 million[1], Alstom will also renew the signalling system for Phase One of the Circular Line[2]. The framework contract includes an order option to supply the line's Phase Three system.

Phase Two of the Circular Line comprises a north and a south section, which spans 14.93 km with 12 underground stations and one depot, and 5.73 km with six underground stations, respectively.

Alstom will be responsible for 29 fully-automated four-car Metropolis trains, Urbalis 400 Communications-Based Train Control (CBTC) signalling system, Supervisory Control and Data Acquisition (SCADA) system, and Platform Screen Doors (PSD). CTCI will lead for the track work, power supply, depot equipment, telecommunication and ticketing systems. The project involves overhauling the existing CBTC signalling system during the limited engineering hours, to minimise the impact on passenger service.

"This contract with SEMPO is a vote of confidence in our internationally proven and quality mobility offering, and a testament to our team's hard work over the last four decades towards making rail transport even more sustainable for the capital city of Taiwan. It also cements our position as the sole signalling supplier for the entire Metro Taipei network. Overall, this is an example of how the Asia-Pacific market remains dynamic and we aim to maintain our market leadership across most segments," said Ling Fang, President of Alstom in Asia Pacific.

Alstom's industrial units in Taubaté, Brazil (rolling stock), Le Creusot, France (bogies) and Bologna, Italy (signalling) will participate in the Circular Line project, supported by sites in Bangalore, India, Saint-Ouen (design), France and Taipei, Taiwan. The project management and system integration will be managed locally with the support of Alstom's Turnkey engineering centre.

Alstom is a trusted partner to deliver integrated Turnkey rail systems for every mobility need. Alstom has earned a global leadership position, amassing extensive experience in the successful design, construction, commissioning and delivery of over 80 turnkey systems in commercial service worldwide. Singapore's Circle Line and Panama Line 1 and 2 count among Alstom's successes in integrated metro projects delivery, with the latest addition being the Dubai Metro Route 2020, inaugurated in July 2020.

Alstom also boasts at least 20 years of innovating driverless metros (GoA4) worldwide, with more than 600 such metros ordered. Its Asia Pacific region presently hosts 13 GoA4 metro systems in service, including, Delhi's Grey Line, Hong Kong's South Island Line (East), Kuala Lumpur's Sungai Buloh-Kajang Line, Singapore's Thomson-East Coast Line, Sydney's North West Metro and Taichung's Green Line.

[1] This amount has been recorded in the second quarter of Alstom's 2021/2022 financial year.
[2] Phase One or the central section of the line, covering 14 stations and one depot over 15.4 km, has been in operation since January 2020.

India

Alstom delivers the first trainset for Kanpur Metro

Alstom has completed handover of the first trainset for the Kanpur metro, to Uttar Pradesh Metro Rail Corporation (UPMRC). The unveiling was done at Alstom's rolling stock manufacturing facility in Savli, Gujarat by the Chief Minister of Uttar Pradesh, Shri Yogi Adityanath in the presence of Shri Kumar Keshav – MD, UPMRC, and Alain Spohr – Managing Director, Alstom India. These metro trains are 100% indigenously manufactured at the facility in Savli, Gujarat.

Alstom completed the acquisition of Bombardier Transportation (BT) on January 29th and going forward, Alstom will be responsible for the delivery of Kanpur & Agra metro rolling stocks and signalling, including scope of all BT technologies.

Valued at approximately INR 2051 crore (245 Mn EUR), Alstom's scope on the Agra-Kanpur metro project includes – design, build and delivery of 201 metro cars (67 units of MOVIA metro three-car trainsets) and advanced signalling solution (CITYFLO 650). The customer also has a provision to exercise an option for an additional 51 metro cars.

The new metro trains will benefit around 5 million citizens in Kanpur. Additionally, the overall project will significantly contribute towards the socio-economic development of the region.

"We are proud to deliver the first metro trains, for Kanpur Metro in record time. After successfully delivering Rolling Stock & Signalling solution for the state's capital Lucknow, we are happy to strengthen this partnership with UPMRC and redefine the mobility needs of Kanpur & Agra" said Alain Spohr, Managing Director, Alstom India. "Our MOVIA metros are world renowned for their operational reliability, appealing design and enhanced safety features – everything that makes metro an attractive mode of transport," he added. Inspiration from Uttar Pradesh's rich cultural heritage combined with best-in-class design has resulted in an attractive look for India's latest metro fleet.

Aerodynamic modular design of the new MOVIA metros will offer a host of safety, security and environmental benefits along with great passenger experience. Built with light but strong stainless-steel car bodies, the air-conditioned cars will have automated sliding doors, comfortable seating & standing spaces, dedicated areas for entry of specially abled, who use wheelchairs and modern passenger information systems, combining to provide an accessible and welcoming environment for passengers.

The trains will be equipped with FLEXX metro bogies and the MITRAC propulsion system to increase energy efficiency, reduce operating costs, and ensure the new trains meet the highest environmental standards. Each train will accommodate approximately 960 passengers in the three-car configuration.

Mexico

Alstom celebrates one year of successful operation on L3 of the Guadalajara Metro

Alstom is celebrating the first year of uninterrupted operation on Line 3 (L3) of the Guadalajara Metro, in the capital of the state of Jalisco.

The first two metro lines in Guadalajara were built more than 30 years ago. Line 3, which has 18 Metropolis trains, benefits from the latest technologies and automated systems – air conditioning, video surveillance, passenger information systems – in addition to providing dedicated accessible areas for people with reduced mobility and permanent supervision by a state-of-the-art Communications Based Train Control (CBTC) system that allows the highest levels of security, availability and performance for operations.

“During this first year of operation, since September 12th 2020, when the line was inaugurated, the line has been in operation seven days a week at the times provided by the metro’s transport system. The configuration of the trains on this line is three fully equipped cars, which have served more than 37 million people within Guadalajara, despite having been a period in which it is estimated that social mobility fell by up to 50%,” said Maite Ramos, General Manager of Alstom México.

In addition to the 18 Metropolis trains, Alstom contributed all the detailed engineering, manufacturing, installation, testing, commissioning of the electromechanical systems, energisation of the system, the signalling solution based on Alstom’s CBTC Urbalis 400 solution, as well as telecommunications, SCADA and control centre to Guadalajara L3. Additionally, preventive maintenance was carried out by Alstom during the first year of operation, with a 24/7 dedicated team with the ability to intervene without impacting the normal operation of L3, always offering the highest levels of reliability and availability of the trains.

Alstom’s Metropolis range is a safe and reliable transport solution, currently used in metropolitan transport systems on five continents in cities such as Singapore, Sao Paulo (Brazil), Shanghai (China), Panama, Amsterdam (Netherlands) and Barcelona (Spain), among others. Metropolis has been in commercial service for more than 10 years and more than 5,000 cars of this range have been sold worldwide.

Currently, L3 of the Guadalajara Metro is configured to operate with 16 trains with two spares, however, it is designed to operate up to 32 trains in response to the growth in demand in the coming years.

Algeria

Constantine tramway extension ready for residents travelling between the old and new city

Alstom, in consortium with Cosider put into commercial service the extension of the Constantine tram line for Entreprise Métro d’Alger. The event took place in the presence of Prime Minister and Finance Minister Aimene Benabderrahmane, Minister of Transport Aissa Bekkai, Mr. Ali Arezki, General Manager of the Entreprise du Métro d’Alger and Mr. Amar Chouaki, Managing Director of Alstom Algeria.

In July 2015, the Entreprise du Métro d’Alger awarded the project to a consortium made up of Alstom as managing contractor and its partner, Cosider Travaux Publics, for the turnkey construction of the extension of the Constantine tram line. The line is 10.3 kilometres long, connecting the station of Zouaghi to the University Constantine 2 Abdelhamid Mehri, located in the new city of Ali Mendjeli, in 26 minutes. The extension strengthens the urban transport network by allowing access, for residents, from the old to the new city.

“As a result of the excellent teamwork and dedication of all members, we have successfully launched the extended Constantine tramway. We are committed to growing our long-term partnership with the Entreprise Metro d’Alger and addressing their mobility needs. Alstom is focused on providing customers and passengers with the most sustainable and innovative solutions that exist today” said Amar Chouaki, Managing Director of Alstom Algeria.

Alstom has supported the development of the infrastructure and the local railway industry in Algeria for over 30 years and has 250 employees based in country. Alstom was part of several tramways already in service in Algiers such as Oran, Constantine, Ouargla, Sétif and Sidi Belabes. In addition, Alstom has established strong industrial and engineering capabilities in the country through technology transfer and workforce training and development. Through a joint venture called Cital, Alstom is meeting the growing mobility needs and tram systems in the country.

From the Archives

China

DFH 1 single ended Chinese 1964 built diesels Nos. 4249 and 4273 head a Shenyang to Beijing express past Tangshan North on March 17th 1987.
John Sloane

From the Archives

China

DFH 5 No. 0317 is seen on a local trip freight near Tianjin on March 16th 1987. *John Sloane*

From the Archives

Cuba

Russian built No. 71060 is seen on pilot duty at Havana Central station on March 6th 1988. *John Sloane*

From the Archives

Egypt

Henschel Class AA12 Bo-Bo of 1961 No. 3660 stands out of use at Tanta shed on April 15th 1982. *John Sloane*

From the Archives

Estonia

EMUs No. 2107 and 2203 stand at Balti Jaam station in Tallinn on July 14th 2005. *Mark Enderby*

From the Archives

Estonia

Eesti Raudtee TEP70-0236 with a train to Moscow is seen at Tallinn on July 14th 2005.
Mark Enderby

From the Archives

France

SNCF No. 72091 arrives at Grenoble on February 9th 1998.
Mark Enderby

From the Archives

France

SNCF BB No. 4762 is seen engaged in shunting at Limoges on April 12th 1979. *John Sloane*

From the Archives

Germany

A DB Class 143 is seen passing Berliner Dom on November 2nd 2004. *Mark Enderby*

From the Archives

Germany

DB No. 335.034 working as a pilot loco is seen at Landshut on July 26th 1989.
Mark Enderby

From the Archives

Germany

DB Class 103.143 with the Dortmund to Budapest 'Franz Liszt' passes Sunching on July 24th 1989.
Mark Enderby

From the Archives

Germany

DB Class 151.139 passes Plattling on August 4th 1989. *Mark Enderby*

From the Archives

Germany

In East Germany before re-unification, DR No. 119.191 stands at Halberstadt prior to working a train to Halle and Leipzig on February 25th 1986.
John Sloane

From the Archives

Germany

DB Class 143.255 and 216.411 cross the Mosel at Bullay on May 7th 2005.
Mark Enderby

From the Archives

Hong Kong

Inside Hung Hom shed on April 2nd 1987 are Kowloon Canton Railway No. 54, an EMD G12 type built by Clyde Engineering (Australia) in 1956, and No. 56, an EMD G16 built in America in 1961. On withdrawal from service No. 54 was sold to Australia for refurbishment and further service. *John Sloane*

From the Archives

India

Indian Railways ZDM3 No. 187 is seen at Kandh on the Kalka-Shimla line on November 22nd 2005. *Mark Enderby*

From the Archives

Italy

FS Class D445.1125 stands at Padua on October 18th 2011.
Mark Enderby

From the Archives

Italy

FS Class E656.519 departs Bordighera with a Cerbere to Rome train on August 28th 1987.
John Sloane

From the Archives

Kenya

Henschel built B-B diesel hydraulic No. 6211 works an oil train at Makadara on July 24th 1978. *John Sloane*

From the Archives

Kenya

1960 English Electric 1-Co-Co-1 No. 8742 waits to depart Nairobi with a service to Nakuru on July 24th 1978. *John Sloane*

From the Archives

Malasya

No. 22119 ‘Mata Ayer’ rides the turntable at Prai shed, Butterworth on April 11th 1985.
John Sloane

From the Archives

Pakistan

British built (AEI/EE) electric of 1966 No. 7028 stands outside the electric loco depot at Lahore on February 17th 1980. *John Sloane*

From the Archives

Spain

RENFE Class 252.074 stands at Barcelona Estacio de Franca station awaiting its next duty on February 28th 2010. *John Sloane*