

London, UK
29th April, 2014

Class 700 tackles extreme weather head on

- New Thameslink vehicles undergo climatic testing as manufacturing continues apace
- 45 body shells now complete; first 12 car train on test

The first Class 700 Desiro City vehicles, built by Siemens for the Thameslink routes, have been put through their paces in a special climate chamber to ensure the vehicles can endure extreme weather conditions.

Technical experts from Siemens, First Capital Connect (as the train operator) and Eversholt Rail Group (representing Cross London Trains, the owner of the vehicles) have recently performed and witnessed the climatic testing of three vehicles in the Rail Tec Arsenal climate chamber in Vienna, Austria.

Tests focused on the Class 700's ability to withstand the effects of extreme ambient temperatures, solar gain, ice, snow and wind. The complex series of tests examined interior components, like air conditioning and heating, and exterior mounted components, which included:

- Simulating coupling scenarios (front coupler), traction/brake functionality and exterior CCTV camera performance in extreme conditions;
- Ensuring doors can open and close in severe snow and ice;
- Testing that wind screen heaters work when the cab windscreen is iced up;
- Ensuring the correct performance of the windscreen wipers at speeds of up to 100mph.

The Rail Tec Arsenal climate chamber in Vienna is unique in the extreme climatic conditions it can simulate, including solar gain, relative humidity, snow and ice conditions and very high wind

Siemens Rail Systems

Communications and Government Affairs, Euston House,
Eversholt Street, London, NW1 1AD

speeds in the “large” Climatic Wind Tunnel (CWT).

The temperature range available allowed Siemens to incorporate extreme high ambient temperatures of up to 40 degrees Celsius, and low temperatures down to -25 degrees Celsius, into the extensive test plan for Class 700 vehicles.

The extreme weather testing programme marks an important milestone for the new Thameslink fleet. Manufacture of the 1,140 carriages is well underway and on schedule. Currently over 45 body shells have been completed and the first full 12 car train has been delivered to Siemens’ test track in Wildenrath, Germany, to begin an intensive testing programme.

Iain Smith, Programme Director, Thameslink, at Siemens Rail Systems UK, said: “Siemens’ trains are synonymous with reliability and quality and the Class 700 is no exception.

“There’s nothing worse for rail passengers than having to deal with a late or cancelled service because of faulty doors, or sitting in discomfort during hot weather, so we’ve really put the new trains through their paces in the climate chamber.”

He continued: “Extreme weather conditions are just part of an intensive test process for the Class 700. Each of the 1,140 carriages will also undergo rigorous testing and fault free mileage accumulation at Wildenrath to ensure the trains are as close to working ‘out of the box’ as possible and ready for passenger service on the important Thameslink routes.”

Jonathan Bridgewood, First Capital Connect Thameslink Programme director, said: "Train reliability during very cold winter months can be a real issue for our passengers so we're delighted to have witnessed the testing of the future Thameslink train to such extremes of temperature.

“These rigorous tests not only build our confidence in the reliability of the train but they also show that passengers will always be able to travel in comfort whether it is bitterly cold outside or a real summer scorcher.”

Andy Pitt, Executive Chairman of Cross London Trains added: “As the future, long-term owner of the trains, we really see reliability of the new vehicles as a key requirement. It’s therefore essential to us that extensive testing is carried out well in advance of the trains carrying fare-paying passengers.”

The Class 700 trains are approximately 25% lighter than previous generations, and are up to 50% more energy efficient. They have been designed to be spacious and airy with the latest passenger information systems and features for people with restricted mobility.

The Government-sponsored Thameslink Programme (rolling stock and infrastructure works) will create 8,000 jobs and transform north-south travel through London. The first Class 700 will be introduced on the Bedford to Brighton line in early 2016. By the end of 2018, the Class 700s will run with high frequency through central London every two-three minutes at the busiest times. This equates to 24 trains per hour in each direction through the central core.

ENDS

Contact for journalists:

Siemens Rail Systems	First Capital Connect	DfT
Laurie Waugh Tel: 07921 242074 Email: laurie.waugh@siemens.com	Roger Perkins Tel: 07711 149245 Email: Roger.perkins@firstgroup.com	Eleanor Dwyer Tel: 0207 944 3123 Email: Eleanor.dwyer@dft.gsi.gov.uk
Hannah Buckley Tel: 020 3128 8539 Email: Siemens@mhpc.com		

For further information and **press pictures**, please see: www.siemens.co.uk/press

Follow us on Twitter at: www.twitter.com/siemensuknews

About Siemens

Siemens was established in the United Kingdom 170 years ago and now employs 13,760 people in the UK. Last year's revenues were £3.36 billion*. As the world's largest engineering company, Siemens provides innovative solutions to help tackle the world's major challenges across the key sectors of energy, industry, infrastructure & cities and healthcare. Siemens has offices and factories throughout the UK, with its headquarters in Frimley, Surrey. The company's global headquarters is in Munich, Germany. For more information, visit www.siemens.co.uk

* Data includes intercompany revenue. Data may not be comparable with revenue reported in annual or interim reports

Siemens Rail Systems

Siemens Rail Systems Division provides expertise and technology in the full range of rail vehicles – from heavy rail to metros to trams and light-rail vehicles. In the UK, the Division employs around 750 people and maintains over 360 Siemens passenger trains for First TransPennine Express, South West Trains, Heathrow Express, Greater Anglia Franchise (Abellio), Northern Rail, London Midland and ScotRail. In addition to manufacturing the new trains for Thameslink, the company will also be supplying Eurostar with its new high speed fleet of trains.

Cross London Trains (XLT)

Cross London Trains is a consortium comprising Siemens Project Ventures GmbH, Innisfree Limited and 3i Infrastructure plc). XLT is procuring, financing the new train fleet and leasing it to the operator of the Thameslink franchise.

First Capital Connect

First Capital Connect (FCC) is part of FirstGroup. It operates trains from London to Bedford, Brighton, Wimbledon and Sutton on the Thameslink route and Peterborough, Cambridge and King's Lynn on the Great Northern route. Approximately 180,000 people travel with FCC every weekday – 95,000 on the Thameslink route and 85,000 on the Great Northern route.

Thameslink Programme overview

The £6.5bn Government-sponsored Thameslink Programme will create a new high capacity, high frequency service of longer trains across central London. It will also link together new routes, in particular the East Coast Mainline with the Thameslink route at St Pancras International. The first phase is finished, providing longer platforms on the Midland Mainline north Thameslink route (Bedford to St Pancras International) and new stations at Blackfriars and Farringdon so that 50% longer 12-carriage trains can now run between Bedford and Brighton. The final phase is to rebuild London Bridge and its surrounding rail track to unblock this bottleneck and usher in a new high frequency service of new 12 and 8 carriage trains of up to 24 trains per hour in each direction between London Blackfriars and St Pancras International. For more information visit www.thameslinkprogramme.co.uk