

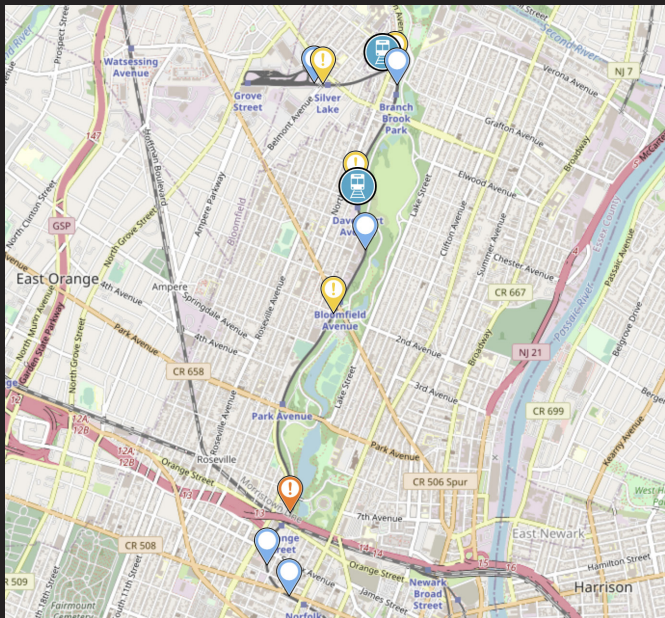
HUMATICS FOCUS™ DELIVERS REAL-TIME TRACK CONDITION MONITORING WITH NEW JERSEY TRANSIT

Overview

In **8 weeks**, Humatics installed its Focus™ onboard track condition monitoring system on two revenue service light-rail vehicles, monitored track conditions from thousands of miles of revenue service travel, and provided an initial track condition evaluation report with results verified by the customer. With this success, Humatics is excited to further prove operational impact in an upcoming expansion to more lines with New Jersey Transit.

Quick Stats:

- **5500+** miles of data collected
- **626 Revenue Service Round Trips** monitored
- **Less than 7 hours** to retrofit equipment at the carbody level of two revenue service trains
- **1.9 TB of sensor data** processed and analyzed for track condition assessment
- No maintenance, inspections or physical operation needed



Track condition reports are automatically generated with precisely geotagged alerts



HUMATICS FOCUS™ ONBOARD TRACK CONDITION MONITORING

Ensuring tracks are in a state of good repair is an essential function of public transit authorities. This process is manual and complex as it frequently involves intricate scheduling activities: first to assess the baseline conditions of the tracks, then schedule preventive and corrective maintenance

activities - all of which are disruptive to revenue service operations. One maintenance of way executive at a large US transit agency stated that about **40% of track issues** that are reported do not get fixed because the issue could not be located or a different issue gets corrected.



Humatics Focus™, a real-time track condition monitoring system installed on revenue service trains, solves these and other challenges for track maintainers. Focus™ is an easy to use and install system that relies on machine learning to detect, classify, and precisely geotag defects with minimal sensors required – augmenting track workers

and preempting critical failures. Data is presented in real-time to operators via a modern user-friendly cloud software dashboard. Humatics, with an extensive background in transit and successful project delivery, deployed Focus™ rapidly and effectively on **Newark Light Rail** in partnership with New Jersey Transit.

SUCCESSFUL NJT PILOT LEADS TO MULTI-LINE EXPANSION

Humatics progressed from a project proposal to a full deployment, pilot completion and successful results in **8 weeks**. Our standalone solution enabled quick retrofitting into 2 existing Kinkisharyo trains with minimal hardware being installed in the carbody (in the bonnet over the operator cab) with no under-train access required.

There was no required integration with **OEM train systems** or other mission-critical systems streamlining approvals and installations.

Results showed the system's capability quickly. Within days of installation, **Humatics provided an initial track condition evaluation report with results** concurred by the customer.

As more data was collected through the pilot, **Humatics detection algorithms** continuously learned the track conditions, increasing performance over time. Humatics' interactive reports with geotagged alerts enabled New Jersey Transit to rapidly assess potential track condition issues, determine where they were occur-

ing, and drill down into the technical details of what was being detected.

The **Humatics Focus™** product and the delivery of the solution on a revenue service vehicle and line was deemed a **mutual success by all involved**. This success will be followed up with an expansion to two additional lines, a Commuter Rail line and a second Light Rail line in the fall of 2023 further **growing the NJT/Humatics partnership**.

NJTRANSIT
The Way To Go.



HUMATICS FOCUS™: UNLOCKS OPERATIONAL EFFICIENCIES

- Real-time, interpreted and actionable data
- Precise fault locations
- Empower future workforce and reduce learning curves
- Fleet condition monitoring
- Key data for capital improvement planning
- Leverage data from every revenue service trip taken by each equipped train
- Regularly updated features and improvements as capabilities improve
- Integration with Enterprise Asset Management (EAM) software

Contact transit@humatics.com or visit www.humatics.com/humatics-focus/ to explore how Focus™ can convert your revenue service trains into a smart track monitoring network today!



Rapid installation and configuration is completed in 3.5 hours per train and does not require any under-train access