

NYC train derailment airs queries about technology

3 December 2013, by Frank Eltman



Cranes salvage the last car from from a train derailment in the Bronx section of New York, Monday, Dec. 2, 2013. Federal authorities began righting the cars Monday morning as they started an exhaustive investigation into what caused a Metro-North commuter train rounding a riverside curve to derail, killing four people and injuring more than 60 others. A second "event recorder" retrieved from the train may provide information on the speed of the train, how the brakes were applied, and the throttle setting, a member of the National Transportation Safety Board said Monday. (AP Photo/Mark Lennihan)

The revelation that a New York City commuter train derailed while barreling into a sharp curve at nearly three times the speed limit is fueling questions about whether automated crash-avoidance technology could have prevented the carnage.

Safety officials have championed what's known as positive train control technology for decades, but the railroad industry has sought to postpone having to install it because of the high cost and technological issues.

Investigators haven't yet determined whether the weekend wreck, which killed four people and injured more than 60 others, was the result of human error or mechanical trouble. But some

safety experts said the tragedy might not have happened if Metro-North Railroad had the technology, and a senator said the derailment underscored the need for it.

"This incident, if anything, heightens the importance of additional safety measures, like that one," said U.S. Sen. Richard Blumenthal, a Democrat from Connecticut, which also is served by Metro-North. "I'd be very loath to be more flexible or grant more time."

The train was going 82 mph (132 kph) as it entered a 30 mph (48 kph) turn Sunday morning and ran off the track, National Transportation Safety Board member Earl Weener said Monday. He cited information extracted from the train's two data recorders; investigators also began interviewing the train's crew.

New York Gov. Andrew Cuomo said the NTSB findings make it clear "extreme speed was a central cause" of the derailment and vowed to "make sure any responsible parties are held accountable" after investigators determine why the train was going so fast.



In this Dec 1, 2013 photo provided by the National Transportation Safety Board, NTSB investigator George



Haralampopoulous hands a data recorder down to Mike Hiller from the derailed Metro-North train in the Bronx borough of New York. Two data recorders from the commuter train that derailed while rounding a riverside curve, killing four people, may provide information on the speed of the train, how the brakes were applied and the throttle setting, a member of the NTSB said Monday. The NTSB was downloading data from a recorder previously found in the rear locomotive in the train that derailed Sunday in New York. A second recorder was found in the front car of the train and has been sent to Washington for analysis, NTSB board member Earl Weener said. (AP Photo/NTSB)

Investigators began talking to the train's engineer, William Rockefeller, on Monday but postponed completing the interview, likely until Wednesday, National Transportation Safety Board spokesman Keith Holloway said Tuesday. Holloway wouldn't say why; union leader Anthony Bottalico said it was because Rockefeller hadn't slept in almost 24 hours and was "very distraught."

Bottalico said the engineer planned to have a lawyer accompany him to the interview. The attorney didn't immediately return a call Tuesday.

Weener sketched a scenario suggesting that the throttle was let up and the brakes were fully applied way too late to stave off the crash. He said the throttle went to idle six seconds before the derailed train came to a complete stop—"very late in the game" for a train going that fast—and the brakes were fully engaged five seconds before the train stopped.

Investigators are not aware of any problems with the brakes during the nine stops the train made before the derailment, Weener said.

Weener would not disclose what investigators know about the engineer's version of events, and he said the results of drug and alcohol tests were not yet available. Investigators are also examining the Rockefeller's cellphone; engineers are allowed to carry cellphones but prohibited from using them during a train's run.



Cranes salvage the last car from from a train derailment in the Bronx section of New York, Monday, Dec. 2, 2013. Federal authorities began righting the cars Monday morning as they started an exhaustive investigation into what caused a Metro-North commuter train rounding a riverside curve to derail, killing four people and injuring more than 60 others. A second "event recorder" retrieved from the train may provide information on the speed of the train, how the brakes were applied, and the throttle setting, a member of the National Transportation Safety Board said Monday. (AP Photo/Mark Lennihan)

Positive train control, or PTC, is designed to forestall the human errors that cause about 40 percent of train accidents, and uses GPS, wireless radio and computers to monitor trains and stop them from colliding, derailing or going the wrong way. The transportation safety board has urged railroads to install PTC in some form since 1970, and after a 2005 head-on collision killed 25 people near Los Angeles, Congress in 2008 ordered rail lines to adopt the technology by December 2015.



Metro-North has taken steps toward acquiring it but, like many rail lines, has advocated for a few more years to implement a costly system that railroads say presents technological and other hurdles.

The Metropolitan Transportation Authority, which runs Metro-North, began planning for a PTC system as soon as the law was put into effect, spokeswoman Marjorie Anders said.

But the MTA has advocated for an extension to 2018, saying it's difficult to install such a system across more than 1,000 rail cars and 1,200 miles of track.

© 2013 The Associated Press. All rights reserved.

APA citation: NYC train derailment airs queries about technology (2013, December 3) retrieved 8

December 2021 from https://phys.org/news/2013-12-nyc-derailment-airs-queries-technology.html

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.