

Lessons from the Nabeta Railroad Crossing Accident Investigation

Japan Needs an Equivalent of the
NTSB To Prevent Similar Accidents

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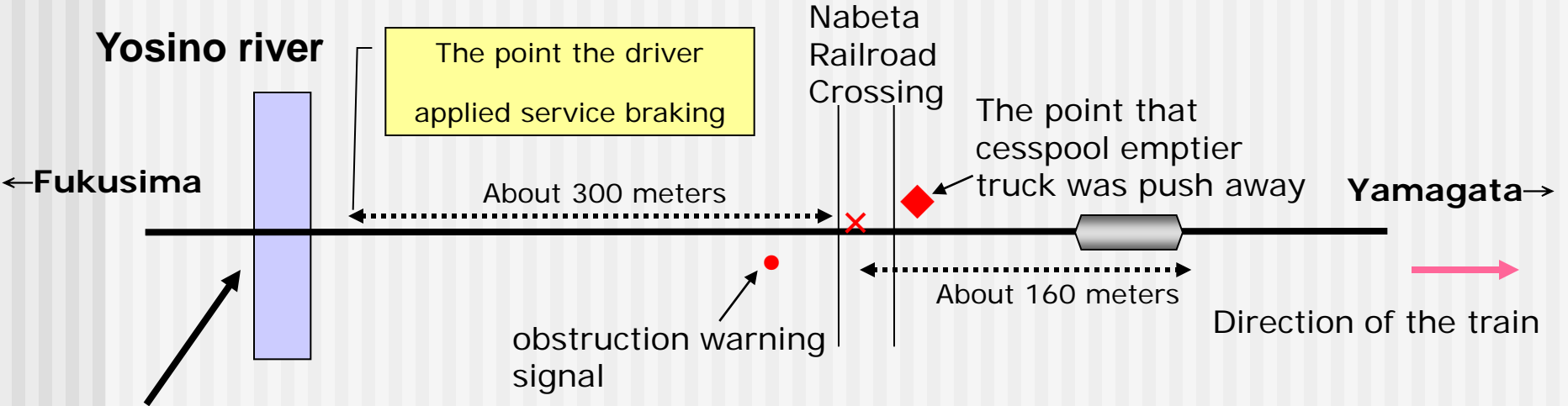
The Railroad Crossing Accident

Date and Time : April 2, 2009 09:25

Location : Nabeta Railroad Crossing between Takahata Station
and Akayu Station



The Circumstances of the Accident

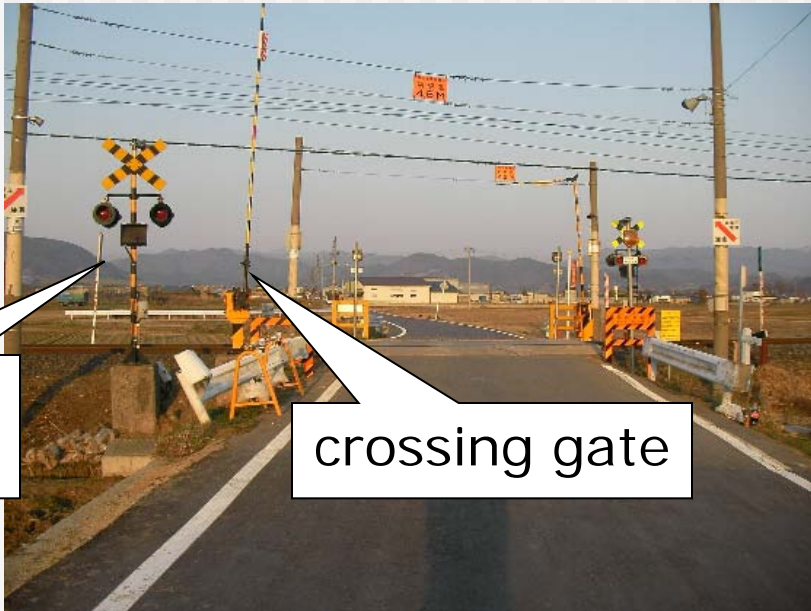


Yoshino-river Bridge



The Circumstances of the Accident

The railroad crossing in question is equipped with a warning alarm and crossing gate, and is situated on a 1-km section of straight track. There is an obstruction alarm device.



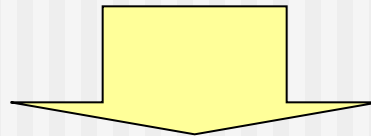
Obstruction Warning Signal



There is an obstruction alarm device in place, which can be activated by pressing a button when something abnormal appears in the crossing. There is also an obstruction detecting device which automatically senses obstructions. Both devices set off flashing obstruction warning signals to notify train drivers that there is an unusual situation on the railroad.

Inspection Train

- JR East run the Inspection Train on the same time
- All the personnel onboard the inspection train corroborated the train driver's statement
- JR East decided to impose a speed limit of 60 km/h on trains passing the Nabeta railroad crossing



JR East made no mention of the distance required to see the obstruction warning signals even there were problems with the visibility

Safety Meeting Held by JREU



Safety Meeting Held by JREU

- **Stop trains when the obstruction warning signal flashes even for a moment**
- **Slow down when visibility is poor because of thick fog or snowstorm**
- **Do not spread rumors about the accident, etc.**

Investigation of causes

■ Drivers side

- There were problems with the visibility of the obstruction warning signal

■ Maintenance side

- ✧ That signal was inspected and no problems were found
- ✧ The inspection does not include a test of whether it can be seen from 800 meters away

Drivers were furious at the prospect that a fellow worker would be accused of having caused the accident.

It was no joking matter for us.

Police investigation

- The police inspected the scene of the accident on three occasions and interrogated the driver six times
- The police carried out their questioning based on a made-up story that placed responsibility onto the driver
 - ✧ The driver stood firm
 - ✧ Occasionally he thought what the police said might be right
- ◆ Criminal papers were filed against the truck driver and train driver

JR East's Response to the Accident

- The company insisted that it would stand up for him

However,

- The police ended up interrogating the driver several times

JR East's response to the accident paints a picture of self-preservation

- Union members were dissatisfied with JR East
The difference between JREU and JR East was cleared

The Japan Transport Safety Board

- **The causes of the accident**
 1. **The truck was on the railway crossing which crossing rods came down**
 2. **The driver did not notice the stopping signal of the obstruction warning signal and could not stop before the railway crossing**

The Japan Transport Safety Board

- **The train driver may have failed to notice the signal flashing, because:**
 1. The layout of the railroad at the scene of the accident had been changed due to the rebuilding of the bridge
 2. It may have been difficult to see the signal before passing the bridge because it was hidden by a line of electric poles



To Protect Train Crew

- the Police ⇒ seek to blame who involved in an accident
- the Japan National Safety Board
⇒ has no legally binding
- JR East ⇒ watch the investigation by the Police
- ✧ We can not protect train crew who met with an accident

We desire a Japanese version of the NTSB

aim to maximize safety

- **to prevent accidents at railway crossings**
 - install a “protection radio” into obstruction detecting devices and obstruction warning devices
 - Reconsider the inspection rule of obstruction warning signal



Thank you
for your
attention