rightTrack

Issue 12 **July 2015**

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Right Track survey

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Regular global news

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Welcome to issue 12 of Right Track

Right Track is your magazine. If you drive or dispatch trains, or ensure they run safely on the track, we're here for you. If you keep trains clean and in working order, if you look after passengers or level crossings, we're here for you too.

Right Track shines a light on aspects of different roles, so you can have an idea of what a signaller does if you're a driver, or of what a driver does if you're a track worker.

In this fact-packed issue, Claire Volding discovers how drivers are taught about keeping safe on contaminated rails; and we look at the importance of staying safe on the road. Our RAIB report brief considers the Liverpool Street derailment last year; while our regular features are also covered, including SPADtalk and Newswire.

Right Track can be downloaded from Opsweb www.opsweb.co.uk

Right Track is produced by RSSB through cross-industry cooperation. It is designed for the people on the operational front-line on the national mainline railway, yards depots and sidings and London Underground. Their companies are represented on various cross-industry groups, including the System Safety Risk Group, managed through RSSB, and Right Track is overseen by a cross industry editorial group.

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Right Track is designed to share news and views from individual companies in a positive way. However, the views expressed in Right Track are those of the contributing authors; they do not necessarily reflect those of the companies to which they are affiliated or employed, the editors of this magazine, the magazine's sponsors - or the magazine's producers, RSSB (Rail Safety and Standards Board).

Our survey said…

Last year we ran a readers' survey to find out how you feel about this magazine. Here are some headlines:

- Over 80% try to read most of each issue
- Over 75% read the paper copy, with just under a quarter reading the web version, the remainder pick it up on their own company intranet

The overwhelming majority find the stories easy to understand, relevant, making people think about safety differently:

- Over 80% feel the magazine does not talk down to them and many remarked that this was one of its most attractive features
- A similar percentage (over 85%) said they had taken away safety learning from Right Track and applied it to what they do

With such a glowing report from you we're keen not to become complacent. So we're committed to continually improving Right Track to make sure the format doesn't go stale. As you can see we've given the mag a bit of a makeover to help the stories stand out and make it even more useful to everyone playing their part on the operational railway.

A big thank you to all of you who took the time to complete the survey. You can of course give us feedback or comments at any time by emailing righttrack@rssb.co.uk.

…to us about your concern if you are not being heard.

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Becoming a skid- pan fan

Okehampton is on the former Southern Railway route from Exeter to Plymouth. It's now a heritage railway, running only as far as the former quarry at Meldon.

During the summer, First Great Western runs a Sunday service from Exeter. The station remains in the glorious style of the old Southern Railway and takes the traveller back in time to the days of brass buttons, green flags and brief encounters. It was here that we sat under the platform's hanging baskets, looking at the Class 150 which had been supplied to facilitate our skid-pan training.

> There are, however, a couple of downsides to skid-pan training: that each driver will feel the right conditions cannot be guaranteed by this method, and the ones who get an earlier slot in the day will probably get a better experience than the later ones.

Skid-pan training, if you're not familiar with the idea, is one of the ways some operators prepare their drivers for the poor adhesion conditions that they may encounter in the autumn. While many companies choose to train their drivers using only simulators, First Great Western is among those that like to offer a real hands-on experience too. By smothering the railhead with various slippery materials, the drivers get the opportunity to feel the wheels lock under them and to know what it's really like to not be in total control of their train.

'Oh we have used all sorts of different things over the years,' chuckles one of the Driver Managers. 'Fairy liquid, water, oil... we've now found the perfect combination.' He pauses; I must admit I find myself drawn in to wanting to know what this ideal slippery material is. 'Chip fat,' he grins. 'Then a fine mist of water over the top.'

I suppose it makes sense: the chip fat is mimicking that Teflon effect that occurs when leaves mulch onto the rail and dry, causing contamination. The fine spray of water is recreating that wet rail effect, when beads of water sit on top of the railhead.

One by one, each driver takes a turn to drive the train down the specially prepared track. Each is given two attempts. For the first, they are asked to use normal braking techniques, whilst for the second they are instructed to put the brake controller immediately into the emergency position and leave it there. When there is a need to bring the train to a stand as rapidly as possible, and the railhead conditions are poor, the advice is to use the second technique. This demonstrates first-hand that this is the better option.

As I sat chatting with the drivers, it transpired that some have been driving longer than others, yet almost all will soon be experiencing their first autumn. They explain how this opportunity is great preparation and great for lifting their confidence about the season ahead.

There are, however, a couple of downsides to skid-pan training: that each driver will feel the right conditions cannot be guaranteed by this method, and the ones who get an earlier slot in the day will probably get a better experience than the later ones. Also, the fleet team will no doubt be sad to see the amount of flats incurred by the locking-up of the wheels as the train slips.

'You're up!' a driver manager calls at me. I am feeling fairly sick with nerves by this stage, even though I know an experienced person will be supervising me throughout. We go to the start line and I begin to drive the train. We pick up speed and I a put the brake in Step 1. I look at the speedometer and it's gone to zero, even though we're whizzing along.

'That's how you know you're slipping,' the driver manager tells me. 'Ease that brake in gently, take it off, and then ease it in again.' I do as I am told and the train eventually slows, although I am half-way in the platform and I braked ages ago.

'Now we'll try it in emergency,' he smiles.

We switch ends and sand is laid in front of the unit, so it can be returned to the starting line. I am ready, and in my head I say: 'On your marks, get set, go!' We pick up speed and then we start to slip again. This time. I throw it into 'emergency'. I feel helpless. There's nothing I can do now except wait and discover the fate of the train. My panic is building. What if I don't stop? But then we start to slow more quickly, and before I know it we've come to a stand. This time we have stopped much sooner than we did before. I leap off the train grinning. The drivers I was chatting to before smile. 'So when you signing up?' they call at me.

The fact it was run so well by the driver managers at Exeter meant it was a great day out and beneficial to all... except perhaps to the train wheels, which went 'clunkety-clunk' under our feet as we drove back to Exeter. ■

Newswire

US: One killed and 86 injured in Washington Metro train smoke incident

At around 15:15 (local time) on 12 January 2015, a Washington Metropolitan Area Transit Authority Metro train stopped after encountering heavy smoke in the tunnel near L'Enfant Plaza station.

A second train stopped behind the first around ten minutes later. The passengers on both - and the station platforms - were exposed to smoke, the inhalation of which led to the death of one passenger; 86 further passengers were taken to local hospitals for treatment.

US: Level crossing collision near Odessa kills ten

On 14 January 2015, a bus carrying 15 people struck a train near Odessa, Texas, having fallen from an elevated roadway to the track below. At least 10 people were killed and five were injured (four critically).

There were no reported injuries to the train crew. The bus had been traveling from Middleton Prison in Abilene to El Paso. Twelve inmates and three officers were aboard.

US: Level crossing fatality in Ohio - lorry struck by two trains

At 14:30 (local time) on 14 January 2015, a train struck a lorry that had been driven round the gates at a level crossing in Holgate, Ohio. As the vehicle was being pushed by the train, it was struck again by a train travelling in the opposite direction. The lorry driver was killed instantaneously.

South Africa: One dead in level crossing collision at Stellenbosch

Early on 17 January 2015, a man was killed when his car was struck by a train at Bergkelder level crossing in Stellenbosch. There were no reported on-board injuries, although the train driver was relieved of duty after suffering shock/trauma.

US: Freight derails in Martin, dangerous goods spilled, two reported injuries

At around 02:40 (local time) on 27 January 2015, a freight train derailed in Martin, South Carolina, spilling a hazardous liquid. Two members of the train crew were reported injured. Staff at a nearby factory were also evacuated before the leak was contained. The cause of the derailment has yet to be determined.

US: Five rail passengers and car driver killed in NY crossing collision

At around 18:30 (local time) on 3 February 2015, an eight-car Metro-North service struck an SUV at a level crossing in Valhalla, just north of New York City. The car was pushed 120 metres by the impact. It and the leading carriage caught fire; both were gutted by the flames.

The SUV driver and five rail passengers were killed; fifteen more were injured. A longer consideration of this incident may be found on Opsweb.

US: Freight derails in Iowa, ethanol enters Mississippi River

On the morning of on 4 February 2015, a freight derailed near Dubuque, Iowa. There were no reported injuries, but at least 14 of the 15 wagons involved were carrying ethanol, some of which slid down the bank into the adjacent Mississippi. It is not known how much ethanol leaked into the river, but later reports suggest most of it dissolved.

Two locomotives also derailed and three of the wagons caught fire. One report suggests that they are of *cont...*

People affected by road driving risk:

- Staff travelling between sites
- MOMs
- Maintenance teams
- Contractors and sub-contractors
- Rail-replacement bus drivers and passengers

- 50% of rail infrastructure workforce fatalities were road-related (2009-14)
- At least 75,000 vehicles linked to the rail industry
- Up to 40% of all road journeys are work-related
- Road traffic collisions cost the economy up to £35billion a year

Spreading the word

In March, key experts in rail safety from across the industry gathered at Network Rail's training centre in Westwood for a major conference - not to talk about SPADs or the PTI, but about road driving risk.

Organised by the Institution of Occupational Safety and Health (IOSH) and RSSB, the conference saw first-hand the obstacles to collecting and sharing the right data; and, importantly, how the issues affect specific sectors.

Safety indicators

Road driving risk has traditionally avoided the safety agenda of rail companies. All that is now changing…

It may seem strange, but we look after the trains, track, structures and stations across 20,000 miles of railway, and yet we need over 75,000 road vehicles to keep the network running.

Whether it's getting train drivers into position for an early start, MOMs out to an incident in the middle of nowhere, or maintenance teams travelling between sites, collectively, we rely on the roads.

When you add up the number of journeys made in employees' own vehicles, company fleets, hired cars, vehicles used by suppliers, taxis and replacement buses for passengers, it's clear that railway people are out on the road a lot more than we all thought.

Even more surprising is the amount of risk we are exposed to as a result.

In the five years between 2009 and 2014, half of all rail infrastructure workforce fatalities were road-related. More generally, five people die on Britain's roads every day, and RoSPA (the Royal Society for the Prevention of Accidents) calculates that driving 25,000 miles a year on business is almost the most life-threatening activity we can undertake, being only less risky than deep sea fishing and coal mining.

Driving is also wrapped up with our culture. It's something many of us do outside work, and a lot of us are sensitive to criticism of it (though all-too-happy to point out the flaws in others).

Adding to the problem is the fact that the risk has not always been apparent to the railways, a huge challenge being the under-reporting of road traffic collisions. Whether or not you have the processes and culture in place to report incidents is likely to depend on what type of company you work for and the type of journey involved.

The map on page 9 shows how work-related journeys are covered by health and safety legislation, but different types of companies will have different traditions and processes for reporting incidents to RSSB's Safety Management Information System (SMIS). The upshot is that the

There's always one…

According to statistics from Hampshire and Thames Valley Police, out of 100 people driving:

- 4 will be on mobile phones
- 2 won't be wearing seatbelts
- Up to 7 will be under the influence of alcohol
- Up to 9.5 will be speeding

Newswire

the DOT-111 type which featured in the Quebec accident of July 2013, and which are currently being phased out or upgraded.

China: Level crossing collision leads to derailment in Hebei Province

In the early hours of 9 February 2015, a freight train struck a lorry at a level crossing in Hebei Province. The locomotive and 11 wagons were derailed by the impact. There were no reported injuries. Police say the lorry passed a red traffic signal and crashed through the barrier before driving on to the interface.

Australia: Track worker killed by train in Guildford, WA

At 10:35 (local time) on 10 February 2015, an infrastructure worker was struck and killed by a Perth-bound service in Guildford, Western Australia. The deceased was part of a team carrying out maintenance on a nearby footpath crossing.

Canada: Oil train derails and catches fire in Ontario, no reported injuries

At ten-to-midnight (local time) on 14 February 2015, a 100-wagon freight carrying crude oil derailed at 38 mph near Timmins, Ontario. Twenty-nine wagons were involved, of which seven caught fire. The incident occurred in a remote wooded area. There were no reported injuries.

US: Oil train derails filling West Virginia sky with fire, one injured, hundreds evacuated

At around 13:30 (local time) on 16 February 2015, a 109-wagon oil train carrying Bakken crude derailed near Mount Carbon, West Virginia. Twenty-six tankers were involved, many leaking oil, which subsequently caught fire. Oil is also thought to have leaked into the adjacent river. One wagon exploded, causing a local house to be destroyed. Its owner was treated for smoke inhalation - the only reported injury.

Switzerland: Passenger trains collide north of Zurich, 6 injured

At 06:40 (local time) on 20 February 2015, an express from Zurich struck the side of a commuter train at Rafz, causing it to derail. Six people were injured, one of them (a train driver) seriously.

The incident occurred when the commuter train was departing and the express came alongside on an adjacent line. There is a possibility that the commuter driver may have passed a signal at danger, having read across to the green intended for the express.

US: Freight derails in Minnesota, dangerous goods not spilled, no reported injuries

At 03:25 (local time) on 25 February 2015, 13 wagons in a 107-wagon freight derailed near Cotton, Minnesota. Three of the stricken wagons contained naphthalene, but no leakages are thought to have occurred. There were no reported injuries.

US: Commuter train collides with lorry at California level crossing, multiple injuries reported

At around 05:55 (local time) on 24 February 2015, a push-pull commuter train running in push mode struck a lorry at a level crossing in Oxnard, California. At least three carriages derailed, the vehicle caught fire and 28 people were taken to local hospitals. The lorry driver fled the scene and was later arrested.

US: Dangerous goods derailment in New Orleans

In the early evening of 1 March 2015, a freight carrying crude oil derailed in New Orleans. There were no reported leaks, no reported injuries and no reported damage to the remaining 106 vehicles. An investigation has been launched.

What can I do?

- Your company may already be briefing you on road driving risk - watch out for messages from your usual channels
- Check with your line manager what your company's processes are for reporting road traffic incidents
- Talk to your line manager, colleagues or safety representatives about any concerns or experiences of your own, or talk to CIRAS in confidence
- Find out if your company is tapping into the work of the Road Driving Risk Steering Group
- Look at the road driving risk section of the RSSB website

Examples of good practice

- Ensuring the workforce is aware of road driving risk, their company's commitment to safety and relevant policies - eg Network Rail's 'home safe everyday'
- Having a commitment to appropriate arrangements for the workforce to be able to travel to worksites by road in reasonable travel times, or by train/ public transport, or with appropriate policies on overnight accommodation
- Arranging relevant contractual conditions with suppliers - for example, taxi firms.
  Read about the Arriva Trains Wales in Right Track issue 11

models and numbers used by analysts and safety directors will downplay the risk.

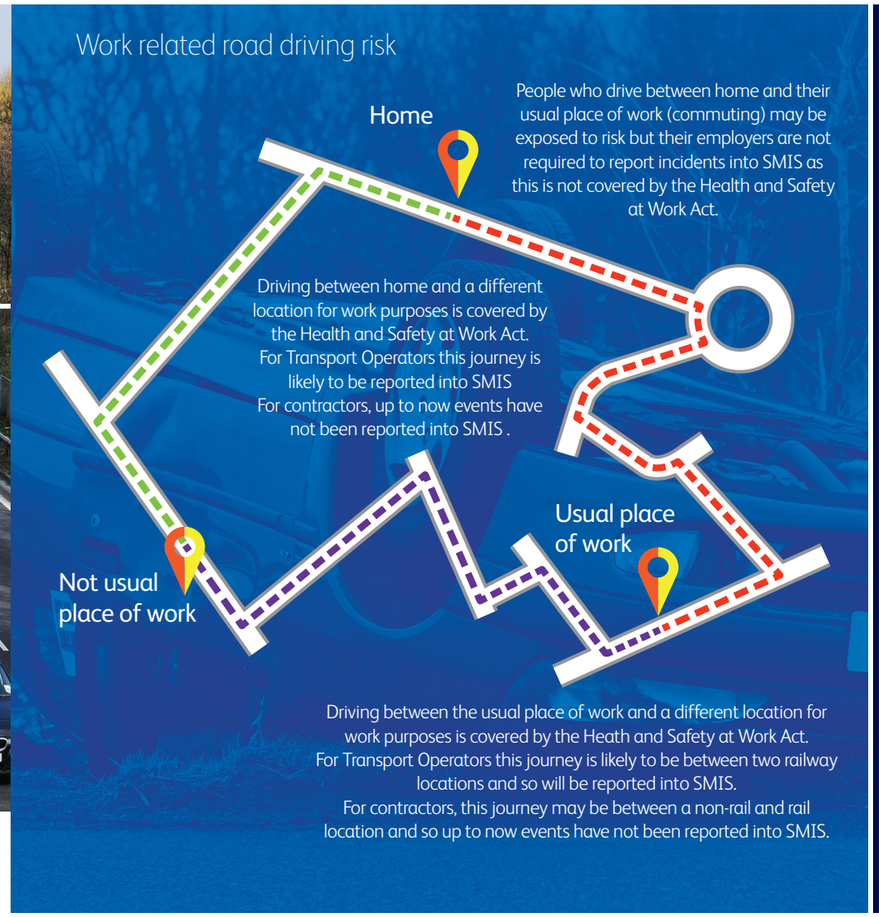
An RSSB survey of rail organisations in 2013 revealed 500 road traffic collisions, 100 injuries and 5 fatalities in one year, based on a response representing about a third of the industry. These figures are higher than the official data in SMIS.

Work is now under way to reform processes and approaches to extend the reporting scope. *cont*

In the last few years, the industry has been getting to grips with these issues, and it's likely that you'll have seen more communication within your own organisation about road driving risk including RED 35; and of course, there have been more frequent articles in Right Track.

The momentum on road driving safety is being harnessed through a dedicated steering group in RSSB, which neatly connects directly to other existing sector groups with representatives from across the railway, including train and freight operators, infrastructure contractors, agency staff suppliers and plant suppliers. Having this broad spectrum allows the industry to consider all aspects of the issue: train operators will want to focus on rail replacement buses, whereas agency staff travelling between sites is more likely to interest organisations working out on the tracks.

The result is a collective push to share more information. There is now a dedicated area of the RSSB website for road driving safety, which contains the RED 35 drama as well as a whole host of good practice documents and signposts to other websites for companies to use. Why not take a look? ■



RED 35

Many will have seen RED 35 - Fatigue at the Wheel - featuring a young, keen rail worker who is both a family man and a conscientious team player, yet still yielding to fatigue and becoming involved in a road traffic accident.

It shows how a wide range of things can line up so easily in a person's life in such a tragic manner, but also what can be done by everyone to make sure the workforce get to work and home again safely.

The video also prompts specific questions for managers to ensure that the potential for road vehicle driver fatigue is incorporated into job design, rostering, work risk assessments, and travel planning for work.

Newswire

Four days later, another freight derailed near Galena, Illinois, close to a local river. Two wagons, both of which were carrying crude oil, caught fire. Again, there were no reported injuries.

Netherlands: Rear-end collision causes slight leak, driver injured

On 6 March 2015, a passenger train struck the rear of a freight in Tilburg, causing the rearmost tank wagon to leak its cargo of butadiene.

The passenger train driver suffered a blow to the head; seven passengers sustained minor injuries. The Dutch Safety Board is investigating. It has likened the causes to the SPAD and collision at Amsterdam Sloterdijk in April 2012, which highlighted train protection, signal sighting and degraded operation issues (among other things).

US: Passenger train strikes lorry on Halifax crossing, 55 injured

In the early afternoon of 9 March 2015, a passenger train struck an articulated lorry at an automatic half-barrier crossing in Halifax, North Carolina, forcing the lorry driver to jump clear. Fifty-five people (including the train driver) were injured as the train derailed. The locomotive fell to its side, although the carriages remained upright. The cab of the lorry remained intact, but the low-loading trailer carrying a large power distributor was obliterated by the force of the impact. The 164-foot vehicle had a special permit to operate and was being escorted by police.

Netherlands: Train fire near Abcoude sends 25 to hospital

On the afternoon of 12 March 2015, a fire broke out on board a passenger train near Abcoude, Utrecht. *cont ...*

Communication is how we know what's going on, and what we're expected to do. In the railway industry, it's also how we know what is safe, and what is dangerous.

The latest issue of the RED DVD looks at the importance of effective communications between railway workers, whether that be track workers, train drivers, signallers, or a mixture of all. It also gives tips on ways you can make your communications more effective, making the railway safer for everyone working on it.

RED 42 DVD is available from May 2015 - watch out for it in your safety briefings!

For more information, search 'Red' on Opsweb, or email red@rssb.co.uk.

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Class 90 002 'Eastern Daily Press' at London Liverpool Street station on 24 March 2015. Photo: Nik Morris (van Leiden)

RAIB report
Liverpool Street

Platform 13: Unlucky for some

It was shortly after 10:00 on the morning of Wednesday 23 January 2013, when a Greater Anglia service from Liverpool Street to Norwich derailed just 260 metres from origin.

The train - a nine-car push-pull formation running in push mode - had just left Platform 13. A total of 17 wheelsets derailed on a tight curve but, as the train carried on, all were guided back on to the correct rail within 40 metres.

The driver wasn't aware that anything was wrong until the senior conductor told him that passengers had reported a rough ride, and the signaller advised that the signalling system had identified a problem at a set of points traversed by the train when leaving the terminus. As a result, the driver stopped and examined his train at Shenfield, but saw nothing unusual. In fact, no one realised that there had been a derailment until the train was examined by a specialist inspector when it arrived at Norwich and, at about the same time, a signal maintenance gang found track damage close to Liverpool Street.

RAIB found that the train came off on the curve because the track fixings had deteriorated over time. The problem was that the curve - and other non-standard trackwork at Liverpool Street - should have triggered mitigation measures to deal with the associated enhanced derailment risk, but didn't.

RAIB also found that no consideration had been given to these enhanced risks, because the maintenance management staff did not have the knowledge necessary to appreciate the need for, and undertake, this activity. By the same token, their lack of knowledge had not been appreciated by more senior staff. Furthermore, the Network Rail procedures for establishing a track inspection and maintenance regime for non-standard track did not require the regime to be checked independently.

RAIB has identified six learning points. One relates to effective communication between train and incident controllers when dealing with events which could be associated with urgent safety issues. A second reasserts the relevance of Network Rail's existing requirements for verifying maintenance management staff competencies relevant to risk assessing track assets.

Three learning points refer to the need for a complete record of assets requiring maintenance, the importance of looking for signs of rail movement when inspecting track, and the correct use of data obtained from a commonly used track geometry measurement device (an 'Amber' trolley). A final learning point refers to the need for proper archiving of inspection records.

After the incident, Network Rail made emergency repairs to the track in the immediate vicinity of the failure. Since then, the sleepers and fixings in the area have also been replaced.

In addition, the company is now recording dynamic track gauge throughout the Liverpool Street area, while an experienced track engineer is assessing track condition and making recommendations to enhance the local inspection and maintenance regime.

Network Rail and Greater Anglia have stated that staff at the Anglia Integrated Control Centre (AICC) have been briefed on the need for effective liaison when dealing with events which may involve both trains and track. Network Rail has nominated a route control manager to monitor the quality of safety-critical communications within the AICC.

RAIB has identified six learning points:

- Effective communication between train and incident controllers
- Verifying staff competencies
- Keeping a record of assets needing maintenance
- Looking for rail movement when inspecting track
- Using data obtained from 'Amber' trolleys correctly
- Archiving inspection records properly

The investigation gave rise to three recommendations, all of which are addressed to Network Rail. The first relates to providing assurance that suitable inspection regimes are established, recorded and validated for non-standard track assets. The second is intended to ensure assessment of management staff's safety critical track related competencies to ensure they have the necessary experience and knowledge to perform that role. The third recommendation seeks a review and, if necessary, improvement of the competency assessment processes applicable to managers with safety critical roles linked to the maintenance of assets other than track. ■

Newswire

One passenger was taken to hospital with burn injuries; the guard and 23 further passengers were treated at the scene for smoke inhalation.

Romania: RegioTrans loses safety certificate, suspends operations

RegioTrans - Romania's second largest regional passenger operator - suspended all operations on 17 March 2015 when the Romanian Rail Safety Authority revoked its safety certificate following what the *International Railway Journal* referred to as 'a spate of incidents in recent weeks'.

Other online sources suggest 'technical problems' with 29 of the company's railcars.

India: Derailment kills 30 in Uttar Pradesh

At 09:10 (local time) On 20 March 2015, a passenger train - the 'Janta Express' - derailed in Uttar Pradesh, killing at least 38 people and injuring 150 more. The locomotive at two carriages left the rails near the village of Bachhrawan. Locals rallied to aid the rescue operation.

Officials have been reported as saying that the train struck a set of buffer stops, having passed a signal at danger due to braking problems.

US: Freight carrying dangerous goods derails in Texas

At around 17:00 (local time) on 21 March 2015, a freight train carrying dangerous goods derailed in Bosque County, Texas. Twelve of the train's 40 wagons were involved, five of which were carrying methanol.

There were no reported injuries, but as leaks were suspected, all within a 1000-foot radius of the crash site were evacuated. Residents were allowed to return to their homes later the same evening. ■

On 3 September 2014, Bulleid Pacific 34067 'Tangmere' slows for the Bournemouth stop with the down 'Royal Wessex'. Photo: Hec Tate via Creative Commons Licence

The last high-risk SPAD involving a steam locomotive occurred on 3 March 2007, when no. 60800 Green Arrow passed a signal at danger by nine coach lengths.

In this case, the driver was unable to see the signal as it had been vandalised. While this did raise questions about driver route knowledge, it also led to considerations about fitting cages to the signal head and a more robust lens to the signal proper.

Right Track considers the recent steam-hauled SPAD in Wiltshire

SPADtalk

On the afternoon of 7 March 2015, steam locomotive no. 34067 Tangmere was working a 13-carriage special from Bristol Temple Meads to Southend. Just before half-five, the train approached Wootton Bassett Junction at 59 mph and passed over a temporary AWS magnet associated with a nearby temporary speed restriction (TSR).

The trouble was, the driver didn't cancel the warnings, so the brakes came on. This should have resulted in him contacting the signaller to report what had happened. Instead, he cancelled the AWS and deactivated the TPWS. He then opened the regulator and had built up such speed that, when the locomotive activated the AWS for SN43 - which was at caution - he was unable to bring the train to a stand at SN45, which was at danger.
The driver slammed on the brakes, but it was too late and the train came to a stand across the junction, blocking the Great Western Main Line and the Badminton route to and from South Wales.

Some 641 delay minutes were accrued, but as the points had already been set for the special, there was no damage to the infrastructure. There were also no reported injuries.

The incident is under investigation by RAIB and the full details of the circumstances are yet to emerge. Already RAIB says it has found no evidence that the signalling equipment, AWS or TPWS had malfunctioned prior to the incident, adding that it intends to consider all the factors that contributed to the SPAD, including the position of the temporary AWS magnet associated with the TSR. The investigation will also examine the factors that influenced the actions of the train crew, the adequacy of the safety systems installed on the locomotive and the safety management arrangements.

The figures show there to have been 11 steam-related SPADs in the last ten years, only two of which were rated high-risk (one of those being this incident). The reason for the high ranking in this case was down to the length of the overrun, the fact that a passenger train was involved and the layout of the junction, which raises possibilities not only of rear-end, but also side-on collisions. Right Track will monitor the situation and report back as it unfolds. ■

On 10 September 2007, Bulleid Pacific 34067 'Tangmere' arrives at Weston-super-Mare. Photo: James F Clay via Creative Commons Licence

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