

**Oliver Stewart**  
**RAIB Recommendation Handling Manager**



12 February 2026

Mr Andy Lewis  
Deputy Chief Inspector of Rail Accidents

Dear Andy,

**RAIB Report: Train overspeeding at Spital Junction, Peterborough on 17 April 2022.**

I write to provide an update<sup>1</sup> on the action taken in respect of recommendations 2 & 3 addressed to ORR in the above report, published on 10 July 2023.

The annex to this letter provides details of actions taken in response to the recommendations and the status decided by ORR. The status of recommendations 2 & 3 is '**Open**'.

ORR will advise RAIB when further information is available regarding actions being taken to address these recommendations.

We will publish this response on the ORR website.

Yours sincerely,

Oliver Stewart

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<sup>1</sup> In accordance with Regulation 12(2)(b) of the Railways (Accident Investigation and Reporting) Regulations 2005

## Recommendation 2

*The intent of this recommendation is for Network Rail to work with operators of trains to assess the risks of trains overspeeding at junctions fitted with approach controls.*

Network Rail should:

- a) Identify junctions fitted with approach controls where the risk from overspeeding could lead to derailment, injuries or damage.
- b) Share this information with the operators of trains which use the identified junctions to facilitate a collective re-assessment of the risk of trains overspeeding at those junctions. This assessment should consider, among other factors, the acceleration capability of the rolling stock using the junctions, the degree of overspeed and the potential consequences.

## ORR decision

1. We deemed the initial response to this recommendation from Network Rail to be insufficient as it did not explain what measures were being taken to assess the risk of trains overspeeding at junctions fitted with approach controls. In addition, Network Rail did not provide evidence of having discussed the issue with railway undertakings, as per the intent of the recommendation.
2. In response to the two incidents at Spital junction and several other overspeed incidents, ORR convened a cross-industry meeting of Network Rail, TOCs and FOCs on 8 December 2025. The key purpose of the meeting was to improve cooperation between Network Rail and railway undertakings and increase the rate of progress in addressing Peterborough overspeed recs 2 and 3.
3. To identify junctions that may be applicable to the recommendation, in May 2025 Network Rail issued Special Inspection Notice (SIN) 223 – Identification of Junctions with Overspeed Risk. The stated purpose of the SIN was to identify *all facing turnouts at junctions where there is a permissible speed of 50mph or greater on approach and where the turnout speed is 50% or lower than the permissible approach speed*. This specific requirement was decided by Network Rail and goes beyond the requirement of the recommendation to *identify junctions fitted with approach controls where the risk from overspeeding could lead to derailment, injuries or damage*.
4. The SIN identified approximately 900 junctions, with numerous approaches/routes through these junctions. This information was collected by the 14 Network Rail routes and has since been cascaded to all the primary railway undertakings who use these routes. The remaining railway undertakings have subsequently been contacted by ORR to identify those junctions considered potentially high-risk.

5. Following the meeting on 8 December 2025 we asked Network Rail to review the effectiveness of SIN223 and provide us with:

- Details of how information arising from RU junction risk assessments is being integrated and used to target further overspeed risk controls across the network.
- A summary of the arrangements that are in place to ensure effective cooperation and collaboration between parties on addressing this shared system risk.
- An explanation of the assurance arrangements in place to confirm that SIN223 has driven meaningful risk reduction.

6. Network Rail provided a response to this request on 20 January 2026 explaining how the output from SIN223 together with the high-risk junction identification work done by railway undertakings was being used in joint risk assessments.

7. We have also written to RSSB, ASLEF and RDG to consider how to improve cooperation across the industry on overspeeding. To this end, we are also engaging with infrastructure managers other than Network Rail and the freight operating companies.

8. On the basis of the action taken by Network Rail we have concluded that the status of the recommendation is 'open' rather than 'insufficient response'. We will consider closing the recommendation when Network Rail and railway undertakings have an agreed list of high-risk junctions.

9. After reviewing the information provided ORR has concluded that, in accordance with the Railways (Accident Investigation and Reporting) Regulations 2005, Network Rail has:

- taken the recommendation into consideration; and
- is taking action to close it.

**Status: Open.**

### **Previously reported to RAIB**

10. On 5 April 2024 ORR reported the following:

We consider the response provided by Network Rail to recommendations 2 and 3 to be insufficient. We have requested a meeting with Network Rail to discuss how the risk of trains overspeeding at junctions fitted with approach controls is being assessed. In addition, we have asked Network Rail to provide more information on the work being done with RSSB, the timescales for any outputs from the workshops and contingency measures if the project does not achieve what is expected or RSSB is unable to provide sufficient resource.

### **Update**

11. Network Rail have created the following Special Inspection Notice:



NR\_SIN\_223.pdf

12. On 20 January 2026 Network Rail provided the an update in response to our letter following the industry workshop on 8 December 2025:

*We are collating the information the RUs have shared regarding their view of higher risk junctions, with our register of findings from SIN223. We expect this to provide a shorter list of high priority junctions which we will undertake joint risk assessments with the RUs.*

*The approach to the joint risk assessment should be consistent and the factors considered based on the output of RSSB research. The process has been trialled on a recent upgrade project, and further trials are due to commence on ECML. The risk assessment tool will be shared with all routes, once industry agreement on the factors and their weighting is obtained which should be very soon.*

*We believe the joint risk assessment is best undertaken at the Route Operations Risk and Mitigation group (OPSRAM) and Train Operations Sub-Groups (TOSG) meetings. The risk assessments will bring together our view on junctions with potential high consequence, the RU view of the likelihood of a driver making a mistake based upon driving practices, and the RSSB assessment of causal factors. This will give a systemic and consistent view of risk.*

*We propose the updated view of overspeed risk can then inform what further mitigations are appropriate and should be subject to joint agreement by Network Rail and the RUs.*

*Working with the RUs, we will produce a timebound plan for the completion of the joint risk assessments and share this with you at the earliest opportunity.*

*As covered in the response above, we believe the best forum to enable effective collaboration is the route led OPSRAM / TOSG, with the appropriate attendance from all RUs, Network Rail operations, and Network Rail engineering. Work is already ongoing in OPSRAM / TOSG to address plain-line overspeeding and compliance with permanent, temporary, and emergency speed restrictions.*

*There is an opportunity for the industry to improve the understanding of the current risk through more proactive assurance of actual train speeds through junction areas. This could be achieved through RU sampling of OTMR data and/or the application of speed traps across the network. NR is also working with the RSSB and Huddersfield University on the feasibility of utilising signalling Train Describer train movement data to identify overspeed events enabling more proactive management of risks (RSSB project COF-UOH-85).*

*The SIN process is a mechanism for engineering standard holders to obtain specific safety information about assets and to instruct changes to those assets. SIN 223 was issued by NR's Technical Authority as part of an engineering-led action plan to address Rec 2 from the Spital Junction RAIB report. The intent of SIN223 was to gain a better understanding of which junctions presented the*

*greatest risk from an overspeed incident. To be clear, there was no expectation that SIN223 would directly reduce risk.*

*As described above, the outputs from SIN223 together with the work RUs have completed will feed into the joint risk assessments and so facilitate a better system view of train overspeed risk, which can then inform a review of mitigations.*

### **Recommendation 3**

*The intent of this recommendation is to reduce the risk of trains overspeeding at junctions by considering appropriate mitigation measures.*

Based on the findings of the assessments undertaken as part of Recommendation 2 (paragraphs 202c and 203b), Network Rail, in conjunction with train operators, should jointly consider and implement risk mitigation measures at the junctions identified where the risk from overspeeding could lead to derailment, overturning or damage. Such risk mitigation measures could include:

- a) technical means (such as additional protection by signalling configuration changes) and/or the use of new technology (such as in-cab information systems to better inform drivers)
- b) operational considerations (such as reinforcing driver awareness, changes to service patterns and/or how signallers regulate trains at these junctions).

### **ORR decision**

13. As explained in our update on recommendation 2, we welcome the work done so far to identify high-risk junctions, while also encouraging greater cooperation across industry to complete that work and consider what mitigations need to be in place to reduce the risk of overspeed incidents. We note that the output of the SIN does not identify what overspeed mitigations are already in place at high-risk (TPWS, speed boards etc).

14. As the purpose of the SIN was rapid recording of essential speed information, other factors which may reduce/mitigate risks at identified junctions, were not considered mandatory at this stage. The SIN states that factors which will be taken into consideration when deciding which junctions require mitigations/additional mitigations are:

- a) distance from junction signal to turnout
- b) aspect sequences
- c) timing/distance of aspect releases
- d) estimated attainable speed
- e) sighting distances
- f) S&C design details

### **Previously reported to RAIB**

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## Previously reported to RAIB

### Recommendation 2

*The intent of this recommendation is for Network Rail to work with operators of trains to assess the risks of trains overspeeding at junctions fitted with approach controls.*

Network Rail should:

- a) Identify junctions fitted with approach controls where the risk from overspeeding could lead to derailment, injuries or damage.
- b) Share this information with the operators of trains which use the identified junctions to facilitate a collective re-assessment of the risk of trains overspeeding at those junctions. This assessment should consider, among other factors, the acceleration capability of the rolling stock using the junctions, the degree of overspeed and the potential consequences.

### ORR decision

1. We consider the response provided by Network Rail to recommendations 2 and 3 to be insufficient. We have requested a meeting with Network Rail to discuss how the risk of trains overspeeding at junctions fitted with approach controls is being assessed. In addition, we have asked Network Rail to provide more information on the work being done with RSSB, the timescales for any outputs from the workshops and contingency measures if the project does not achieve what is expected or RSSB is unable to provide sufficient resource.

2. After reviewing the information provided ORR has concluded that, in accordance with the Railways (Accident Investigation and Reporting) Regulations 2005, Network Rail has:

- taken the recommendation into consideration; but
- has not provided a sufficient response setting out how it will be delivered.

**Status: Insufficient response. ORR will advise RAIB when further information is available regarding actions being taken to address this recommendation.**

### Information in support of ORR decision

3. On 5 March 2024 Network Rail provided the following initial response:

#### Action Plan

#### Please provide milestones with dates

*The action plan for this recommendation is co-dependant with that for recommendation 3.*

#### Preliminary and enabling work.

Network Rail in collaboration with RSSB and via a Request for Help, will facilitate workshops with train operators to identify types of junctions and/or characteristics where there is a perceived greater risk relative to other junctions. In addition, those

driving factors pertinent to safely traversing junctions will be identified. These actions will be used to gain some understanding of driving behaviours relevant to junctions and which may be used to inform risk models.

**Recommendation 2a will be addressed as follows:**

Network Rail, in conjunction with RSSB and train operators will take the outputs of the preliminary and enabling work, the relevant signalling arrangements and infrastructure characteristics, to identify those junctions where there may be an increased overspeeding risk.

**Recommendation 2b will be addressed as follows:**

NR will present to TOCs/FOCs the characteristics of those junctions identified for 2a including where appropriate, details of the junction signalling arrangements, aspect sequences, signage, speed reductions, distance from junction indicator and cautionary aspects, approach releasing arrangements, signal sighting information.

TOCs and FOCs will determine from the information and their understanding of driving behaviour and train characteristics, the likelihood of overspeed at the junctions identified.

Network Rail, RSSB and train operators will collaborate to assess the relative risk for identified junctions using the information above. This may require the development of risk assessment tools separate from these recommendation action plans. Any resulting recommendations will be classified into those which can be addressed locally e.g. signal sighting opportunities, those which require an intervention into the signalling system such as a change to aspect sequences and release conditions, and those which impact on the established principles of junction signalling and need to be considered as part of Rec3. Reasonability tests will be applied to recommendations in order to contain the scope to that which can be achieved within industry constraints.

### Evidence required to support closure of recommendation

Evidence that each action point has been considered and/or addressed.

Outputs will be defined further when work has progressed sufficiently.

## Recommendation 3

*The intent of this recommendation is to reduce the risk of trains overspeeding at junctions by considering appropriate mitigation measures.*

Based on the findings of the assessments undertaken as part of Recommendation 2 (paragraphs 202c and 203b), Network Rail, in conjunction with train operators, should jointly consider and implement risk mitigation measures at the junctions

identified where the risk from overspeeding could lead to derailment, overturning or damage. Such risk mitigation measures could include:

- a) technical means (such as additional protection by signalling configuration changes) and/or the use of new technology (such as in-cab information systems to better inform drivers)
- b) operational considerations (such as reinforcing driver awareness, changes to service patterns and/or how signallers regulate trains at these junctions).

## ORR decision

4. As stated in paragraph 9, we consider the response provided by Network Rail to recommendations 2 and 3 to be insufficient.

5. After reviewing the information provided ORR has concluded that, in accordance with the Railways (Accident Investigation and Reporting) Regulations 2005, Network Rail has:

- taken the recommendation into consideration; but
- has not provided a sufficient response setting out how it will be delivered.

**Status: *Insufficient response*. ORR will advise RAIB when further information is available regarding actions being taken to address this recommendation.**

## Information in support of ORR decision

6. On 5 March 2024 Network Rail provided the following initial response:

### Action Plan

#### Please provide milestones with dates

*The action plan for this recommendation is co-dependant with that for recommendation 2.*

#### **Recommendation 3 will be addressed as follows:**

Network Rail, in conjunction with RSSB and train operators will identify opportunities for risk reduction taking consideration of results and learning from Rec 2. Two areas of parallel research will be necessary to identify measures that could provide mitigation. These are detailed below.

#### **Recommendation 3a will be addressed as follows:**

Network Rail will submit a Request for Help to RSSB with the aim of conducting a review of current junction signalling practice. An early initial review will determine the scope of further review based on a number of considerations including, reasonableness of carrying out further in-depth review, repetition of previous studies into junction signalling, practicability of any changes to current practice.

A parallel study will look at technical solutions beyond current conventional signalling arrangements including speed advisory and supervisory speed systems and opportunities ahead of ETCS deployment.

A further request for help to RSSB to seek opportunities to improve driver behaviours and awareness at junctions using factors identified in rec 2.

**Recommendation 3b will be addressed as follows:**

Network Rail will submit a Request for Help to RSSB asking that research be carried out into operational factors that could reduce the risk to trains traversing junctions by modifying driver behaviour or changing awareness.

Network Rail in conjunction with RSSB will investigate whether changes in train regulation could result in reducing the risks to train traversing junction by, for example, changes in timing, aspect sequences, release conditions and assess the reasonability of such changes in the context of running the operational plan.

**Evidence required to support closure of recommendation**

Evidence that each action point has been considered and/or addressed.

Outputs will be defined further when work has progressed sufficiently.