



ANNUAL REPORT 2017

ACCIDENT INVESTIGATION BOARD NORWAY

RAILWAY DEPARTMENT

Introduction

The Accident Investigation Board Norway (AIBN) is a multimodal organisation covering four transport modes. In year 1989, it was set up to investigate air accidents and incidents. The first railway accident investigation started 1 July 2002. Today, the AIBN is a multi-modal body investigating accidents and incidents in aviation, railways (including LTR, tramways and metros), road transport and the marine sector. The different transport modes are organised in different departments within the AIBN reporting to the Director General. The multi-modal concept has been very successful in relation to stimulating cooperation, how to approach an investigation, methodology, sharing relevant safety issues and learning from the other transport sectors. In year 2002, the AIBN's mandate was expanded to cover railway accidents, in 2005 road accidents and in 2008 marine accident, investigations were included in our mandate.

Rail accident investigation in Norway is subject to the Directive for the Accident Investigation Board Norway, laid down by the Ministry of Transport and Communications on 12 June 2002. The AIBN itself decides the scale of the investigations, including an assessment of the investigation's expected safety benefits with regard to resources required.

The AIBN is independent, focus entirely on safety, and not apportion blame or liability, nor do we enforce law or carry out prosecutions. The most important elements in the railway safety investigations are to improve the safety of railways, learning from experience and preventing accidents from recurring. Over the years, the investigations have increasingly addressed the human element, focusing on the system of interaction between human factors, technology and organisational factors. In addition, the AIBN addresses Safety Management System (SMS), safety culture etc.

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Regulation

Railway accident investigation in Norway is regulated in detail by the Norwegian Act of June 3rd 2005, No.34, relating to notification, reporting and investigation of railway accidents and railway incidents, and regulations stipulated pursuant to the Act. The act includes railway, metro, LTR and tramways.

EUs safety directive for railway was adopted and made official March 1st 2006 as Regulation 2006-03-31 nr 378. *Regulation for official investigation of railway accidents and serious incidents etc.* (“The Railway Investigation regulation”).

Mandate

AIBN shall investigate accidents and incidents in the aviation, railway, road and marine sectors.

The objective of the investigations is to elucidate matters deemed significant for the prevention of transport accidents. The AIBN shall not apportion any blame or liability under civil or criminal law.

The AIBN itself decides the scale of the investigations conducted, including an assessment of the investigation's expected safety benefits with regard to necessary resources.

Budget

The 2017 total budget is NOK 73871000,-

Organisational flow charts

Relationship between the AIBN and other national bodies:

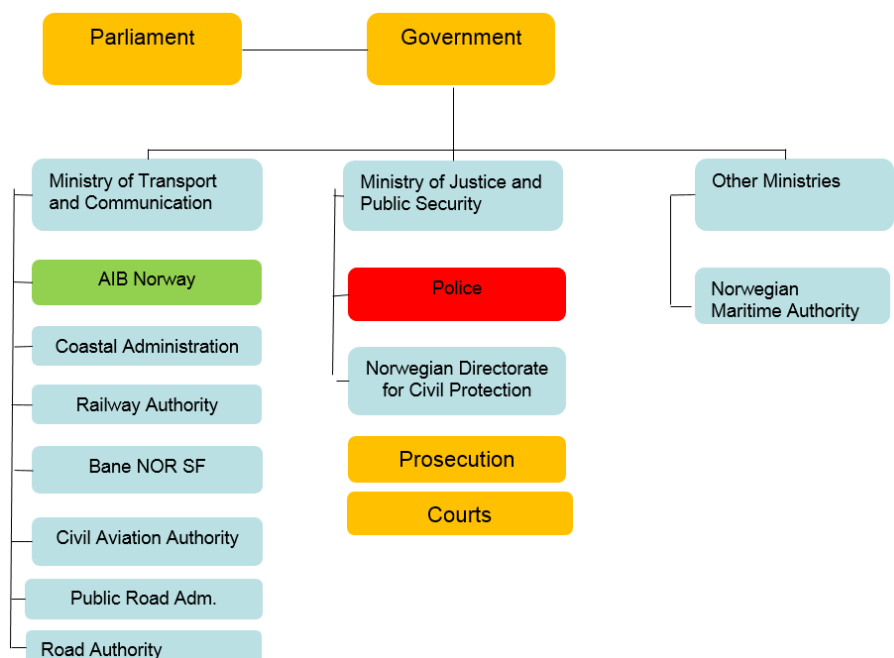


Figure 1: AIBN and other national bodies.

Relationship between the AIBN and the railway sector:

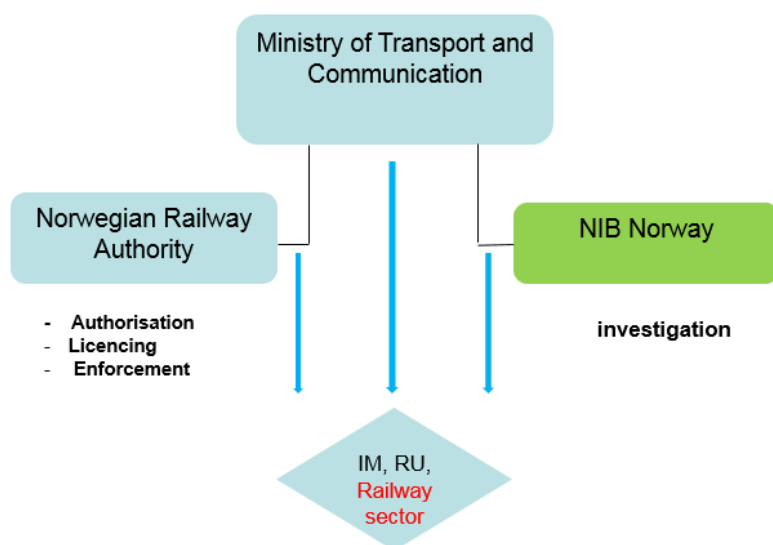


Figure 2: AIBN and the railway sector.

Accident Investigation Board Norway (AIBN) - Organisation

The AIBN organisation as of 31st December 2016:

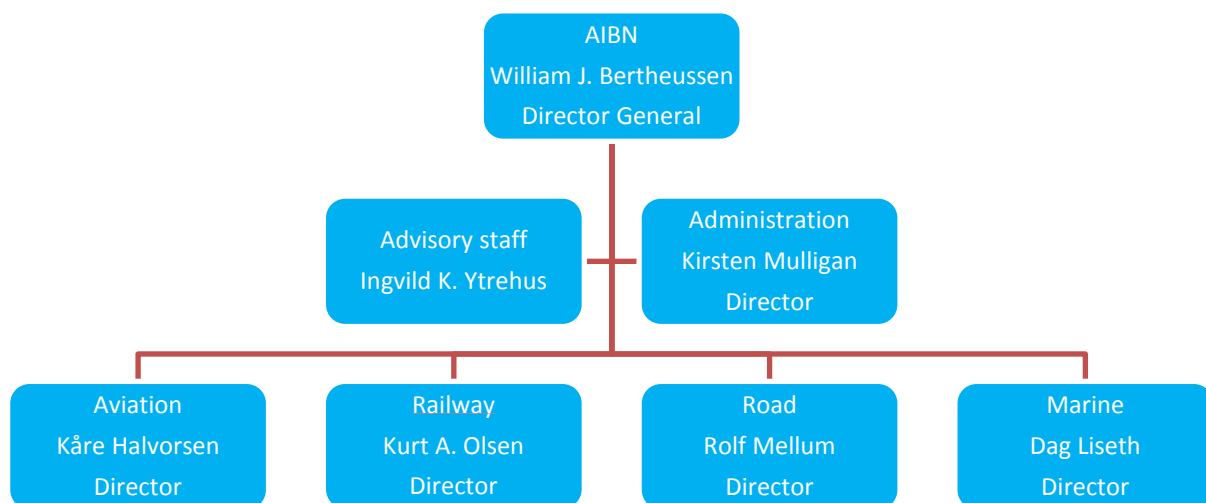


Figure 3: The AIBN organigram.

The AIBN employs 5 railway investigators with either a professional railway or investigation background, and who have been given extensive and bespoke training concerning railway operations, railway engineering and investigation skills.

All investigators carry an AIBN identification card, which identifies their powers at the scene of an investigation.

The AIBN railway investigators have the power to:

- Enter railway property, land or vehicles.
- Seize anything relating to the accident and make records.
- Require access to and disclosure of records and information.
- Require people to answer questions and provide information about anything relevant to the investigation.

Notifications of accidents and serious incidents – key numbers

The AIBN, Railway department received totally 229 notifications by telephone in 2016. The number of notification includes rail-, metro- and tram traffic including LTR. According to the Norwegian Railway Authority (responsible for official statistics), the total number of reported accidents and incidents is on the average level compared to the previous years.

Thirty-four accidents were registered including 24 fatalities. Trespasses and suicides are included.

Nine accident or serious incident safety investigations started this year.

The AIBN, Railway department was involved in eight safety investigations as of 31st December 2017.

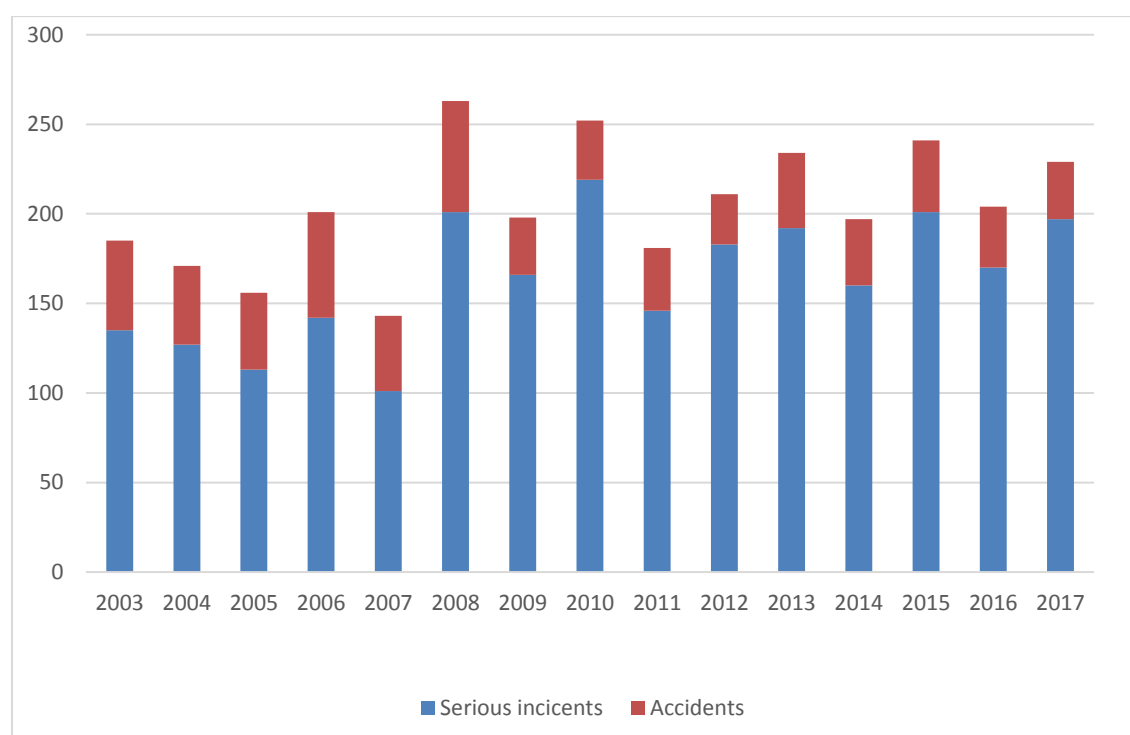


Figure 4: Key numbers, notified railway accidents and serious incidents.

	2007	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017
Serious railway incidents	101	201	166	219	146	183	192	160	205	170	197
Railway accidents	42	62	32	33	35	28	42	37	40	34	32
Total	143	272	198	252	181	211	234	197	245	204	229
Published reports	13	9	11	9	10	9	9	7	9	7	8

Table 1: Key numbers, reported railway accidents and serious incidents (not official statistics).

Other activities

During 2017, several meetings have been arranged with the Norwegian Railway Authority, IMs and the operators, including metro and tram operators. The meetings have focused on closing safety recommendations, accident reporting and classification, organisational changes, point of contact etc.

Norway, Sweden, Denmark, Finland, Estonia, UK and Ireland are members of the Nordic Network of Accident Investigation Bodies (NRAI). The network organises one meeting per year, where the main objective is to inform each other about safety investigations in progress, safety learning, European Union Agency for Railways (ERA) network and task force meetings and any other business common to the Nordic Region. ERA participates in the NRAI meetings.

The AIBN is heavily involved in preparing a common Peer Review programme and review criteria where all investigating bodies are encouraged to participate to monitor their effectiveness and independence.

Investigation reports

The Accident Investigation Board, Norway, Railway Department, published nine final investigation reports, within 12 months after the date of the occurrence. This gives approximately two reports pr. year for each Investigator. See appendix A for details.

Key elements of the report (roadmap):

The AIBN reports follow the Directive 2004/49/EC of the European Parliament annex IV (Principal content of accident and incident investigation report) and include the following key elements:

- Notification of the accident
- Summary (in Norwegian and English language)
- Facts
- Investigations carried out
- Analysis
- Conclusion
- Planned and implemented measures
- Safety recommendations (in Norwegian and English language)
- References
- Appendices

Safety recommendations

The Accident Investigation Board Norway, the Railway department, published nine safety recommendations in 2016. An overview of the recommendations, see appendix B.

Status of the safety recommendations, (see actions taken for the 2017 safety recommendations below):

Year:	2010	2011	2012	2013	2014	2015	2016	2017
Open:	0	0	0	0	0	0	0	1
Closed:	16	16	9	6	9	9	8	7
Total:	16	16	9	6	9	9	8	8

Table 2: Number of safety recommendations.

Accident Investigation Board, Norway

Lillestrøm, September 30, 2018

Appendix A - Published reports 2017

See link: <http://www.aibn.no/Jernbane/Avgitte-rapporter>

No:	Identification:	Date of occurrence:	Report published:
1	<p>On Friday 29 April 2016, at 03:30 at night, two trains belonging to GreenCargo AB collided at Alnabru shunting yard. One of the trains was what is known as a shunting stock, which in this context means freight cars that are being transported by a shunting locomotive to be parked or made up into a complete train. The other train was a freight train coming from Bergen.</p> <p>The collision occurred when the freight train was on its way in to park on the track next to the shunting stock. The shunting stock was about to park 18 cars, and backed too far so that it hit the freight train at the run-off point between the two tracks.</p> <p>The tracks at the place of the incident are not equipped with a signalling system, and it is Bane NOR SF's local traffic controller who controls train movements in the area. The recommended practice at Alnabru is that the local traffic controller notifies the shunting personnel of incoming trains, so that they can stop the shunting operation. This was not done in the case in question.</p> <p>Because there is no technical barrier in the form of a signalling system to prevent collisions, operational barriers are necessary.</p> <p>The Accident Investigation Board Norway submits a safety recommendation to the effect that Bane NOR SF should consider whether the recommended practice should become fixed instructions.</p>	29.04.2016	23.03.2017
2	<p>In the early hours of 8 May 2016, three persons climbed onto a work train that was parked at Skarpsno between Moelv station and Rudshøgda station on the Dovrebanen line. On the weekend in question, maintenance work was being undertaken on the section. The work was concluded at approx. 16:00 on Saturday 7 May and was scheduled to restart at 6:00 on Sunday morning.</p>	08.05.2016	04.05.2017

	<p>While climbing onto the parked work train, one person came into contact with the overhead catenary line, causing an electric shock. The person died in the accident. The deceased was a student at Ringsaker folkehøgskole and had celebrated the end of the school year that evening.</p> <p>The contact line system was de-energised while the work took place, but was live during the break in the work that night. Bane NOR SF's internal regulations and practice indicate that catenary systems are energised when work is not being undertaken. For this reason, the project had chosen to use a guard at the site for the purpose of supervising the rolling stock. The project had conducted risk assessments, but they were not capable of identifying the risk of electric shock for third parties and therefore measures to prevent this.</p> <p>The Accident Investigation Board Norway (AIBN) submits a safety recommendation in which Bane NOR SF is requested to conduct a risk assessment of its internal regulations and practice for connecting and disconnecting the current in overhead catenary system when rolling stock is parked on open lines.</p>		
3	<p>31 May was the first hot day in 2016, which contributed to Green Cargo AB's freight train 5242 derailling due to buckling of the track just north of Bøn station on the Hovedbanen line. The four rearmost wagons were completely or partly derailed. The section was closed for repairs for a total of four weeks.</p> <p>The year before, Bane NOR SF had installed a cable duct at the derailment site for the level crossing protection system at Bøn station, next to the ballast shoulder. This may have contributed to weakening the lateral support in the curve where the buckling occurred. At the same time as the cabling project was carried out, vegetation was removed along the section, which led to increased sun exposure and may thereby have caused increased compressive forces on the continuously welded track. In connection with the buckling, there was also a track fault that had developed over time. The track fault had been registered in the last four measurements by the line measurement and inspection vehicle on the section (carried out during the period between May 2015 and April 2016), and the tendency was already present before the cable duct work started. In August 2015, at the same</p>	31.05.2016	22.05.2017

	<p>time as work was carried out, some track irregularities on the section were reported.</p> <p>The AIBN believes that the most important contributory causes to the derailment were as follows:</p> <ul style="list-style-type: none"> - Bane NOR did not have sufficient control of the compressive stresses on the tracks. - Bane NOR had not corrected the track fault in time. - The overall risk situation for the section was not sufficiently known and addressed in connection with the work carried out the previous autumn. <p>The AIBN submits two safety recommendations to Bane NOR SF as a result of this accident. One concerns the control mechanisms that are intended to ensure that track corrections are carried out and documented. In the other safety recommendation, the AIBN recommends that Bane NOR SF strengthen its process for ensuring a shared risk understanding at the interface between project-based work and day-to-day operations.</p>		
4	<p>On Friday 2 September, one bogie of a metro train derailed after stopping at Gulleråsen station. On Saturday 3 September, the same thing happened in the same place.</p> <p>Following an inspection of infrastructure and the metro train after the derailment on 2 September, the section of the line was reopened for traffic without dry rails having been discovered.</p> <p>After the derailment on 3 September, it was observed that the rails were dry and that there were shavings in the ballast as a result of wear and tear.</p> <p>Investigations carried out by the Accident Investigation Board Norway (AIBN) showed that a central system for filling wheel flange lubricant at the workshop at Ryen was out of order and that equipment for stirring lubricant at Avløs workshop was disconnected. This led to more trains than planned operating with their wheel flange lubrication system out of order. Over time, this will result in the lubrication layer on the rails being worn down.</p> <p>The AIBN does not make any safety recommendations in its report because of actions already decided or implemented by Sporveien T-banen AS after the derailments.</p>	02.09.2016	29.08.2017

5	<p>On 3 October 2016 at approx. 21:55 hour train 474 collided with a rock-fall in to the track. In addition to the train driver and head conductor, there were 14 passengers on board the train. Two of the passengers suffered minor injuries and were sent for a medical examination. The material damage to the train and infrastructure was extensive.</p> <p>Bane NOR had inspected the area and implemented rockfall protection measures. The risk class was set to R1, and the next inspection was scheduled for 2023. The boulders that came down broke from a rock cutting where individual boulders were secured by rock bolts. The rockfall was caused by earth and rock material that came loose from the slope above the track and crashed into the rockfall ditch that had been constructed. The rockfall was so big that some of the boulders landed on the track. The rockfall was caused by the collapse of an earth-filled crack behind the boulders, which was sloped towards the railway line. The boulders that had been bolted remained in the rock cutting. A triggering factor may have been heavy rain that had washed away gouge material behind and under the rock, which caused it to collapse.</p> <p>The Accident Investigation Board Norway (AIBN) submits one safety recommendation. It states that Bane NOR should have procedures that address the increased risk of landslides and rockfalls resulting from changes in the climate and weather.</p>	03.10.2016	07.09.2017
6	<p>On 10 October 2016, a wheelchair user reversed out of the rearmost door of a metro train, which was partly beyond the platform at Romsås station. The wheelchair and user fell down between the track and the tunnel wall, and the wheelchair user sustained minor injuries.</p> <p>A passenger who was trying to help sustained electric shock injuries after touching the wheelchair, which was probably in contact with the train's electrical components. The Accident Investigation Board Norway (AIBN) is of the opinion that neither the train driver nor the passenger foresaw the risk of an electric shock being conducted via the wheelchair.</p> <p>Metro trains normally operate with three to six carriages, and, depending on their length, they are meant to stop at designated marks on the platform. There are no technical or operational barriers that ensure that metro trains stop at the correct mark. This is mainly the responsibility of the train driver. As train drivers alternate between different lines and train lengths, combined with monotonous and,</p>	10.10.2016	28.09.2017

	<p>in part, automated work, errors in judgement will occur. The AIBN believes greater awareness is needed of the importance of stopping both three-carriage and six-carriage trains in the correct position. Measures implemented to increase awareness should subsequently be followed up by measuring whether the desired effect has been achieved.</p> <p>As a consequence of the accident, the AIBN makes one safety recommendation to Sporveien T-banen AS, in which it requests that measures are implemented to ensure that metro trains stop more precisely at the correct stop marks.</p>		
7	<p>On Thursday 27 October 2016, a track maintenance vehicle started rolling uncontrolled towards Marnardal and derailed at a high speed after 5.6 km. The excavator was completely destroyed and damaged the infrastructure and surrounding terrain by Marnardal.</p> <p>The Accident Investigation Board Norway (AIBN) concludes that two possible scenarios may have caused the excavator to start rolling out of control as it was being prepared for work. One scenario is linked to a technical fault in the brake system. The other concerns incorrect operation of the brakes.</p> <p>The investigation of the brake system found errors in technical drawings, and a lack of risk assessments in connection with the introduction of new components and functions. The investigation of the operational procedures found errors in the procedures and a lack of compliance with procedures.</p> <p>The vehicle was operated by NJD Railvac AS for Bane NOR SF. This means that Bane NOR SF has an overarching responsibility for safety management in the supplier's activities.</p> <p>The AIBN submits one safety recommendation for Bane NOR SF to strengthen its control of suppliers' safety management through its management of suppliers.</p>	27.10.2016	18.10.2017
8	<p>At 05.27 on Saturday 11 March 2017, train 304 collided with a road-rail excavator that was on the tracks near Dallerud south of Lillehammer on the Dovrebanen line. A misunderstanding between the principal site safety supervisor (PSSS) and the local safety supervisor (LSS),</p>	11.03.2017	18.12.2017

<p>who was driving the excavator, lead to it being driven onto the tracks by mistake. The train driver applied the emergency brakes upon discovering the excavator, but it was not possible to stop the train in time. The excavator driver saw the lights of the train and managed to get out before the impact.</p> <p>The Accident Investigation Board Norway (AIBN) is of the opinion that several factors contributed to this incident, including the work method, night work, unclear communication and failure to use contact magnets.</p> <p>At the time of the accident, Veidekke AS was carrying out ditch clearing on assignment for Bane NOR SF. The work team had been allocated six short track possessions in between ordinary train operations. The work method involved great variations in the level of activity, and the AIBN believes that this may have had a bearing on alertness and on the risk of errors. The combination with night work over several nights where sleep during the day does not provide full recuperation also involved a possibility of accumulated sleep deprivation.</p> <p>A misunderstanding arose between the PSSS and the LSS that resulted in the LSS not understanding that a train was going to pass before the next track possession. Bane NOR SF has a standard for communication in place that is intended to reduce the possibility of misunderstandings arising in verbal communication. At the time of the accident, the standard was applied in communication between the PSSS and the traffic controller, but after the accident, it has been decided that the standard should also apply to communication between the PSSS and the LSS.</p> <p>The PSSS used contact magnets as required by the regulations, but the LSS did not. If the LSS had used contact magnets, that alone would not have been enough to prevent the accident, since the train already occupied the block section. However, the verbal feedback from the LSS to the PSSS that magnets had been applied might have uncovered the misunderstanding and reduced the chance of the excavator being driven back onto the tracks. Contact magnets and the pertaining procedure are intended to help to ensure both the safety of those working on the tracks and safe train operations.</p> <p>In the AIBN's opinion, track possessions can be useful when it comes to granting access to the tracks for repairs and maintenance work, but the efficient work time and the time spent on preparations and conclusion must be</p>		
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	weighed against each other. The steps of the procedure must be complied with in order for this work method to be sufficiently safe. Time pressure must not result in steps being skipped in order to be able to carry out more work in the time available.		
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Appendix B - Safety recommendations

The safety recommendations are translated from Norwegian language. The Norwegian text remains the official version of the safety recommendations. Should ambiguity arise between the two, the Norwegian text takes precedence.

See link: <http://www.aibn.no/Jernbane/Avgitte-rapporter>

Report No.	Rec. No.	Safety recommendation:	Ministry of Transportation and Communication Status report.	Status:
2017/01	01	On Friday 29 April 2016, a shunting stock backed into the side of an incoming freight train at Alnabru. The tracks at the scene of the incident are not equipped with a signaling system. Bane NOR SF has specific instructions for how to manage train and shunting routes in this area. In addition, there exists a recommended practice for the local traffic controller at Alnabru that contains work procedures for how to avoid collisions. The Accident Investigation Board Norway recommends that the Norwegian Railway Authority ensure that Bane NOR SF has sufficient barriers against collisions in areas that	Bane NOR SF has introduced changes at Alnabru in that trains are not allowed to enter when shunting is in progress in adjacent areas. Bane NOR SF states that for other locations, barriers have already been established through operational regulations and that it is rare for more than one shunting operation to take place at the same time in such areas.	Closed
2017/02	02	On Sunday 8 May 2016, three persons climbed up onto a work train that was parked between Rudshøgda and Moelven stations on the Dovrebanen line. One person		Open

		came into contact with the catenary line and died. The diesel-powered work train was undertaking ballast cleaning on the line during the weekend in question. The power supply was disconnected while the work took place, but was reconnected during breaks in the work. The current regulations do not provide sufficient guidelines for parking rolling stock during breaks in work. The Accident Investigation Board Norway (AIBN) recommends that the Norwegian Directorate for Civil Protection and Emergency Planning ask Bane NOR SF to carry out an internal risk assessment of the regulations and practice for connecting and disconnecting the power when rolling stock is parked on open lines.		
2017/03	03	On 31 May 2016, Green Cargo AB's freight train 5242 derailed due to buckling of the track just north of Bøn station on the Hovedbanen line. One of the factors that caused the buckling was a track fault that had developed over time. Bane NOR SF registered the track fault several times, but it was not repaired. The Accident Investigation Board Norway recommends that the Norwegian Railway Authority request Bane NOR SF to review and improve the control mechanisms that are supposed to ensure that track corrections are carried out and documented.	Bane NOR SF has registered 38 measures in the Synergi system following the accident. Most of these measures focus on reviewing established control mechanisms and procedures. One of the lessons learned is to pay attention to the content of risk assessments. The senior management team of the infrastructure division has reviewed the AIBN's report in a meeting. All the measures registered in Synergi will be followed up by the management team.	Closed
2017/03	04	On 31 May 2016, Green Cargo AB's freight train 5242 derailed due to buckling of	Bane NOR SF has initiated learning processes in infrastructure projects (project entity) and in the area	Closed

		<p>the track just north of Bøn station on the Hovedbanen line. Work had been carried out on the section prior to the derailment. Bane NOR SF was unable to identify the risk factors that caused increased vulnerability to buckling, neither those that were known to the operating organisation nor those that were introduced through the work performed the year before. The Accident Investigation Board Norway recommends that the Norwegian Railway Authority request Bane NOR SF to strengthen its process for ensuring a shared risk understanding at the interface between project-based work and day-to-day operations.</p>	<p>project entities that are dealt with by the heads of the individual infrastructure areas. See also measures under the recommendation concerning control mechanisms. This process includes reviews of handover records and descriptions of safety-related issues. The infrastructure division has established a learning log that primarily focuses on learning from incidents in severity categories 1, 2 and 3. A learning sheet will be prepared for use in presentations for organisations, discussion in meetings and information screens at Bane NOR SF's bases. The infrastructure projects entity has also established a separate learning process to ensure this review.</p>	
2017/05	05	<p>On Monday 3 October 2016, a passenger train ran into a rockfall and derailed just north of Bjerka Station on the Nordland line. Most of the boulders fell into the rockfall ditch, but some boulders landed on the track. The rockfall started in an area that had been inspected and where protection measures had been implemented. The Accident Investigation Board Norway recommends that the Norwegian Railway Authority ensure that Bane NOR SF develops adequate procedures and methods to monitor slope stability resulting from changes in the climate and weather.</p>	<p>Bane NOR SF will cooperate with the Norwegian Water Resources and Energy Directorate (NVE) on further development of landslide forecast models. An evaluation of how generic control of rock cuttings should be carried out is under planning. The evaluation is scheduled for completion by 1 April 2018. Each object is assessed by an engineering geologist, and this could result in more or less frequent inspections. Erosion and weathering break down rock. The work of securing the railway line against rockfalls is an ongoing effort. Climate change can cause changes to the rate at which the rock is broken down. The effect of such changes must be assessed carefully when reviewing the relevant generic work procedures. Such a review will be carried out by 1 June 2018.</p>	Closed
2017/06	06	<p>On 10 October 2016, a metro train stopped in an incorrect position at Romsås station, such that the two rearmost</p>	<p>Grounds: Sporveien T-banen AS has introduced notification to metro train drivers via the HMI system to show whether the train has three or six</p>	Closed

		<p>doors were beyond the end of the platform. A wheelchair user reversed out of the train and sustained minor injuries when falling down between the track and the tunnel wall. There are no technical barriers that ensure that metro trains stop at the correct stop marks. The Accident Investigation Board Norway advises the Norwegian Railway Authority to ask Sporveien T-banen AS to implement measures to ensure that metro trains stop more precisely at the correct stop marks.</p>	<p>carriages. Control and verification of designated stop marks have taken place at all 101 stations. Trainee courses and whiteboard meetings also focus on the importance of stopping in the correct position.</p> <p>Sporveien T-banen AS writes that it has overriding operating regulations with requirements and operational provisions for MX3000 trains that apply to drivers when securing the train and leaving the driver's cab. The driver training includes how to deal with situations where persons end up outside the train. However, it has not focused on the risk of e.g. wheelchairs conducting electricity when coming into contact with electrical components. This topic is now being implemented in trainee training courses, courses in the Safety Regulations related to the Maintenance and Operation of Electrical Installations (FSE Regulations) and refresher courses.</p>	
2017/07	07	<p>On Thursday 27 October 2016, a track maintenance vehicle started rolling uncontrolled towards Marnardal and derailed at a high speed after 5.6 km. The vehicle was operated by NJD Railvac AS for Bane NOR SF. This means that Bane NOR SF has an overarching responsibility for safety management in the supplier's activities. NJD Railvac AS had made changes to the vehicle without carrying out a risk assessment, and there were weaknesses in the operational practice. The Accident Investigation Board Norway recommends that the Norwegian Railway Authority request Bane NOR SF to</p>	<p>Bane NOR SF has now introduced procedures to reduce the probability of Railvac vehicles rolling out of control in future. It has introduced stricter requirements for the use of emergency calls to notify the traffic controller and other trains in the area so that measures to limit potential consequences can be implemented. It has increased the number of supplier audits and appointed a dedicated working group for work on and near tracks. It has also conducted a separate audit of Norsk Jernbanedrift with a particular focus on material and a general audit. This audit identified seven non-conformities which we expect it to follow up. The Norwegian Railway Authority is planning an audit in autumn 2018 on the topic of supplier management with a focus on work on and near</p>	Closed

		strengthen its control of suppliers' safety management through its management of suppliers.	tracks and the effect of implemented measures.	
201708	08	At 05.27 on Saturday 11 March 2017, a passenger train collided with a road-rail excavator that was carrying out work for Bane NOR SF south of Lillehammer station on the Dovrebanen line. The work was carried out during the night, broken down into several short track possessions in between ordinary train operations. This work method involves great variations in the level of activity, which can in turn have a bearing on the workers' alertness and on the risk of errors. The Accident Investigation Board Norway recommends that the Norwegian Railway Authority request Bane NOR SF to conduct a risk assessment of track possessions as a work method in order to improve the safety of work involving great variations in level of activity.	The Norwegian Railway Authority has previously been informed that the infrastructure division has appointed a working group to look into safe work on and near tracks. The working group submitted its recommendation before Christmas, and the immediate measures proposed have now been implemented. Several other measures have also been identified, and the working group will continue its work on those. 'Track access' was one of the areas that the working group identified. It will therefore be expedient to assign the risk assessment work relating to track possession as a work method to this group. The risk analysis is scheduled to take place before the end of March 2018.	Closed

Appendix C – Directive for the Accident Investigation Board Norway

Laid down by the
Ministry of Transport and Communications on 12 June 2009.

1 Organisation

The Accident Investigation Board Norway (AIBN) is an administrative agency that reports to the Ministry of Transport and Communications. The AIBN is an independent body as regards professional issues.

The areas of road, air and railway transport are the responsibility of the Ministry of Transport and Communications. Marine transport is the responsibility of the Ministry of Trade and Industry.

The Ministry of Transport and Communications cannot instruct the agency in professional matters in those areas for which the AIBN is responsible. With the exception of such matters as stated in Section 476, seventh subsection of the Norwegian Maritime Code, the same applies to the Ministry of Trade and Industry within the marine sector.

2 Objective

The AIBN shall investigate accidents and serious incidents in the aviation, railway, road and marine sectors.

The objective of the investigations is to elucidate matters deemed to be significant for the prevention of transport accidents. The AIBN shall not apportion any blame or liability under civil or criminal law.

The AIBN itself decides the scale of the investigations to be conducted, including an assessment of the investigation's expected safety benefits with regard to necessary resources. Details of the objectives within the various transport sectors:

Aviation

The AIBN shall investigate aviation accidents and serious aviation incidents within the framework stated in Act No. 101 of 11 June 1993 relating to Aviation (the Aviation Act), Chapter XII Notification, reporting and investigation of civil aviation accidents and civil aviation incidents etc., and regulations stipulated pursuant to the Act. Reference is also made to Council Directive 94/56/EC of 21 November 1994 establishing the fundamental principles governing the investigation of civil aviation accidents and incidents.

Railways

The AIBN shall investigate railway accidents and serious railway incidents within the framework stated in the Act of 3 June 2005, No. 34, relating to notification, reporting, and investigation of railway accidents and railway incidents etc. (the Railway Investigation Act), and regulations stipulated pursuant to the Act.

Road traffic

The AIBN shall investigate serious road accidents and road incidents within the framework stated in the Act of 18 June 1965, No. 4, relating to road traffic (the Road Traffic Act),

Chapter VII Investigation of traffic accidents etc., and regulations stipulated pursuant to the Act.

Marine

The AIBN shall investigate marine accidents within the framework stated in the Norwegian Maritime Code of 24 June 1994, No. 39, Chapter 18 (II) Maritime inquiries, and regulations stipulated pursuant to the Code and obligations Norway has assumed under international law.

3 Delineation

The activities of the AIBN do not comprise areas of responsibility that come under the Police and Prosecution Authority, the Armed Forces, the Norwegian Railway Inspectorate, the Norwegian Public Roads Administration, the Norwegian Civil Aviation Authority or the Norwegian Maritime Directorate.

The AIBN shall also cooperate with other parties to the extent necessary, where this may be beneficial in terms of resource use and user-friendliness.

4 Duties

Within the framework of current legislation the responsibilities of the AIBN shall include:

- investigating transport accidents/incidents as mentioned in Item 2,
- preparing reports containing a statement from the AIBN on the causes of the accident/incident and any recommendations on matters the responsible party should consider rectifying to prevent re-occurrences of the same or similar nature, but without outlining specific solutions.
- performing special duties of significance for safety as may be imposed on the agency by the Ministry of Transport and Communications, and for maritime matters in consultation with the Ministry of Trade and Industry, pursuant to statutes and regulations,
- representing the Ministry of Transport and Communications and/or the Ministry of Trade and Industry as required, or participating in meetings with the said ministries in various international organisations and forums within the relevant transport sectors.
- issuing comments/statements on matters submitted by the Ministry of Transport and Communications, and for maritime matters in consultation with the Ministry of Trade and Industry, to the extent requested by the ministries, assisting in processing cases, etc.

The AIBN shall report to the Ministry of Transport and Communications in the course of the year and in a separate annual report on the agency's activities and results.

The activities shall be conducted within the framework of current statutes, rules and regulations. Cases shall be considered in accordance with generally accepted administrative principles and applicable rules for case processing in the public sector.

5 Day-to-day management

Day-to-day management of the AIBN is exercised by the Director General. The Director General is appointed by the King upon recommendation from the Ministry of Transport and Communications.

The Director General shall:

- inform the Ministry of Transport and Communications of important matters that come under the AIBN's area of responsibility,
- ensure good quality in cases submitted to the Ministry of Transport and Communications,
- decide all cases that do not require submission to a higher authority,
- ensure that the AIBN is run efficiently in accordance with current statutes, rules and regulations and the requirements stipulated in the management dialogue,
- ensure that there are documentable systems for internal control and risk management, and that evaluations are conducted of the agency's efficiency, goal achievements and results.

Within limited areas the Director General may delegate authority to other employees of the AIBN and issue further instructions for the performance of the delegated authority in general or for individual cases.

6 Authority to issue a directive

The Ministry of Transport and Communications has the authority to stipulate a new directive or make changes in the directive.

7 Entry into force

This directive enters into force on 12 June 2009.

From the same date the directive for the AIBN of 21 June 1999 with subsequent changes is repealed.