



Rail Safety Statistics

2015-16 Annual Statistical Release

Publication Date: 22 September 2016

Next release: September 2017

Background

This release contains statistics on rail safety in Great Britain from 2002-03 to 2015-16.

Rail safety statistics for Great Britain include information on train accidents and the number of fatalities and injuries affecting passengers, workforce and members of the public.

Data are sourced from the Rail Safety and Standards Board (RSSB), London Underground Limited (LUL), the British Transport Police (BTP) and the Office of Rail and Road (ORR).

More detailed commentary about the statistics contained in this release can be found in RSSB's [Annual Safety Performance Report](#) and ORR's [Annual Health and Safety Report](#)

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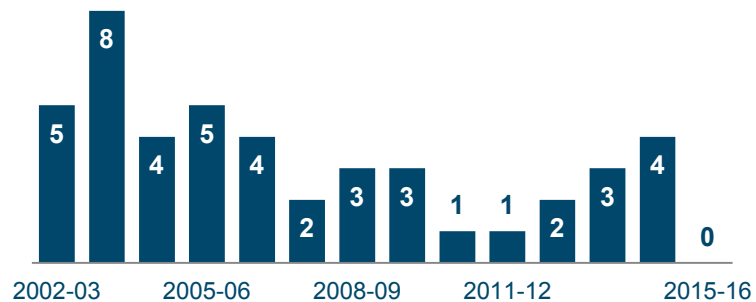
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Summary

Fatalities on the Railway

There were **no workforce fatalities** in 2015-16 for the first time since the time series began in 2002-03.

Workforce fatalities on the railway, Great Britain, 2002-03 to 2015-16



The number of **passenger fatalities increased to 11** - up from four in 2014-15 - although no one died as the result of a train accident for the ninth consecutive year.

There were **316 fatalities to members of the public**, of which 278 were suicides or suspected suicides.

Injuries on the Railway

The **total number of injuries decreased** in 2015-16 compared to the previous year, with the majority of the decrease having been on the mainline.

The number of injuries on London Underground and trams, metros and other non-Network Rail networks has been stable.

Other Safety Incidents on the Railway

There were **759 train accidents** in 2015-16, an increase of four accidents compared to 2014-15.

There were **3 fatalities on level crossings** in 2015-16 - all were pedestrian users. This was 8 fewer fatalities than in 2014-15.

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A **passenger** is a person on railway infrastructure who intends to travel, is in the process of travelling or has travelled. This is regardless of whether they have a valid ticket.

This **does not include** travellers who trespass or who commit, or attempt to commit suicide. People who are injured in this way are classified as members of the public

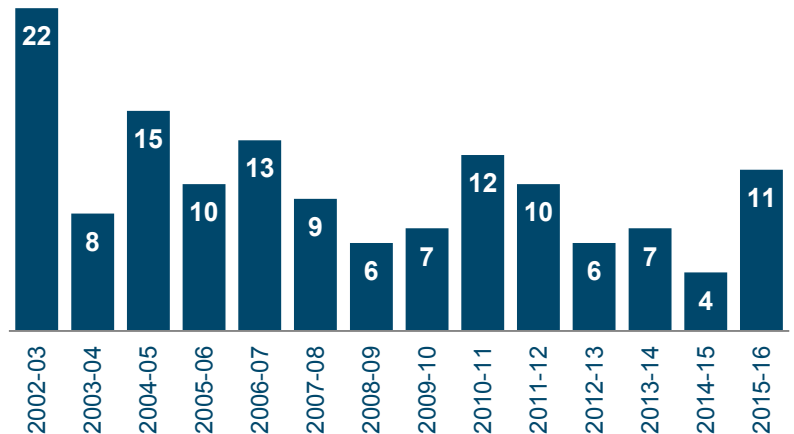
Passenger Fatalities

There were **eleven passenger fatalities** in 2015-16.

This was the **highest number** since 2010-11.

Eight occurred on the mainline and three on London Underground.

No passenger fatalities in train accidents for the ninth year in a row.



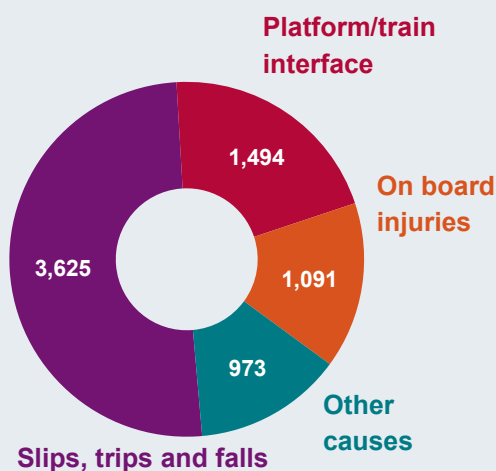
Passenger Injuries on the Mainline

7,183 injuries in 2015-16

3.3%

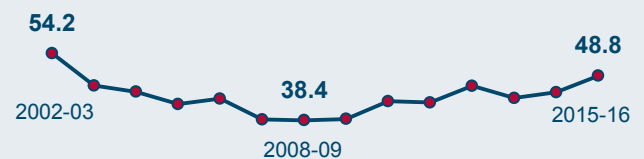
compared to 2014-15

Of which **288 were major injuries**



Fatalities & Weighted Injuries (FWI)

Passenger harm on the mainline, as measured by FWI, increased by 8.6% to **48.8 in 2015-16**



This was driven by an increase in the number of fatalities, even though the number of injuries decreased.

FWI is a single figure combining the number of fatalities, major injuries, minor injuries and shock/trauma incidents.

Passenger Injuries on London Underground

4,069 injuries reported in 2015-16

4.6%

compared to 2014-15

This is the third year in a row where there were **more than 4,000 injuries** on London Underground

There were **127 major injuries**

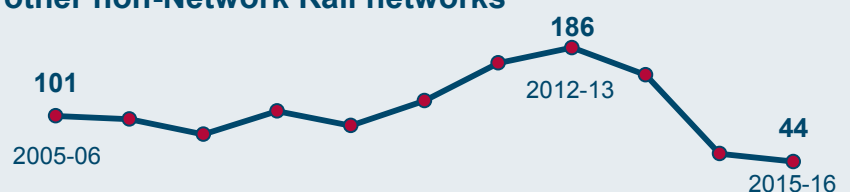
and

3,942 minor injuries

Passenger Injuries on trams, metros and other non-Network Rail networks

There were **44 passenger injuries** on trams, metros and non-Network Rail networks in 2015-16.

Down 18.5% compared to 2014-15

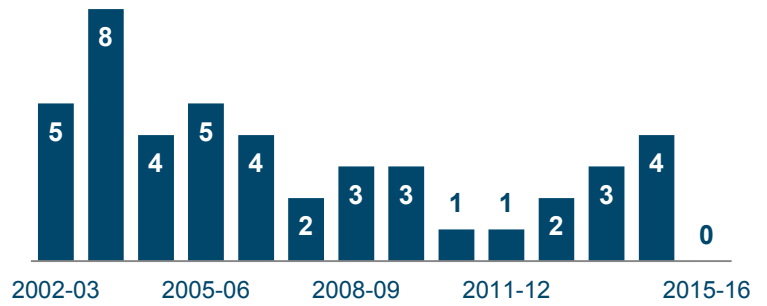


A member of the **workforce** is defined as a person working for the industry on railway activities either as a direct employee or under contract.

Workforce Fatalities

There were **no workforce fatalities** in 2015-16 for the first time since the time series began

The previous lowest was 1 fatality in both 2010-11 and 2011-12



Assaults, Threats and Verbal Abuse

6,960 incidents in 2015-16

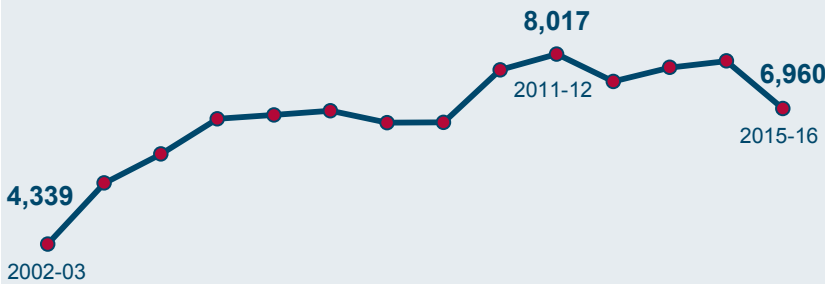
Down 11.7% compared to 2014-15

of which:

27% physical assault

21% threat

52% verbal abuse



Workforce Injuries on the Mainline

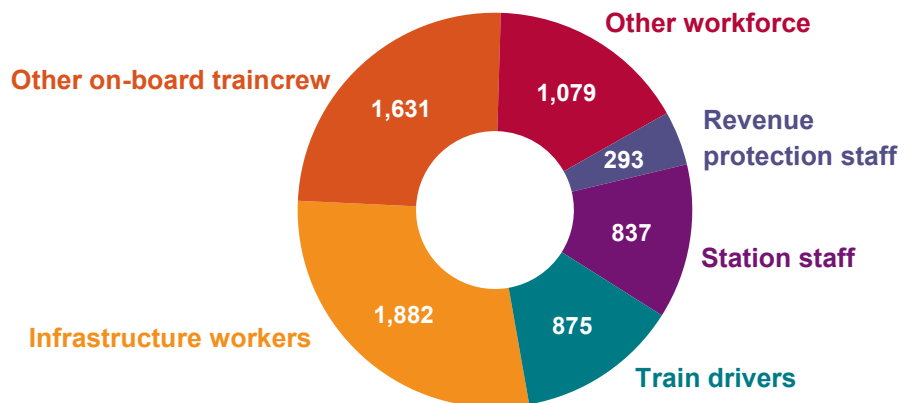
6,597 injuries

in 2015-16

7.7%

compared to 2014-15

Of which **157 were major injuries**



Workforce Injuries on London Underground



3,607 injuries in 2015-16

15.9%

compared to 2014-15

71% to station staff **13%** to train drivers

16% to other workers

Workforce Injuries on trams, metros and other non-Network Rail networks

247 injuries to the workforce in 2015-16

6 more injuries than in 2014-15



Members of the public are defined as neither passengers nor workforce.

It also includes people who trespass or who commit, or attempt to commit, suicide.

Public Fatalities

There were **316 public fatalities** in 2015-16

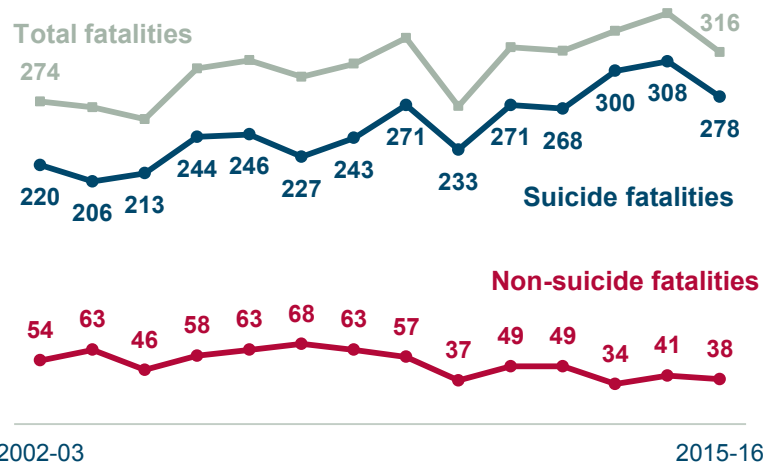
Down by 9.5% compared to 2014-15

of which **38 were non-suicide fatalities**

and

278 were suicide or suspected suicide fatalities

(252 on mainline and 26 on London Underground)



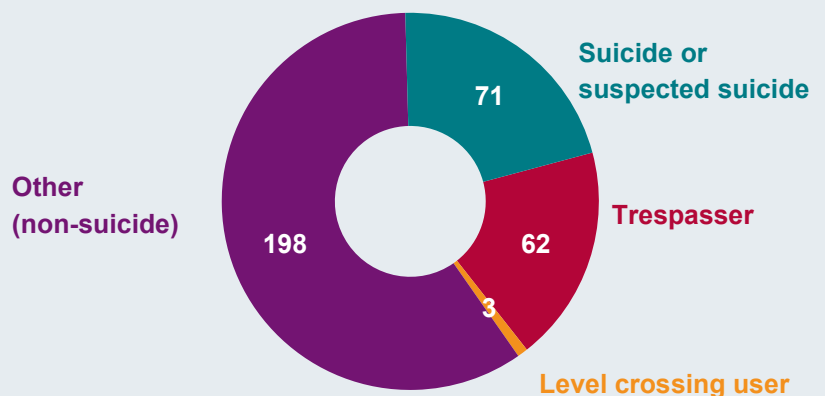
Public Injuries on the Mainline

334 injuries to members of the public in 2015-16

16.0%

compared to 2014-15

Of which **71 were major injuries**



Public Injuries on London Underground

23 injuries to members of the public in 2015-16

6 fewer than in 2014-15

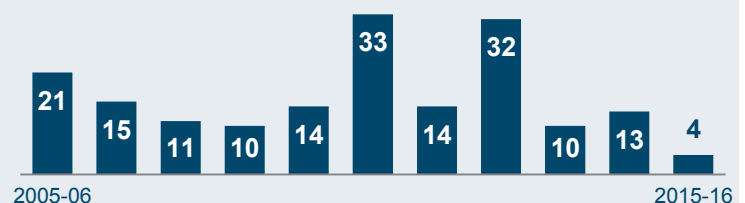
All injuries in 2015-16 were the result of suicide or suspected suicide

Of which **6 were major injuries**

Public Injuries on trams, metros and other non-Network Rail networks

There were **4 injuries** to members of the public on trams, metros and non-Network Rail networks in 2015-16

The **lowest number** since the time series began



Train Accidents

2015-16

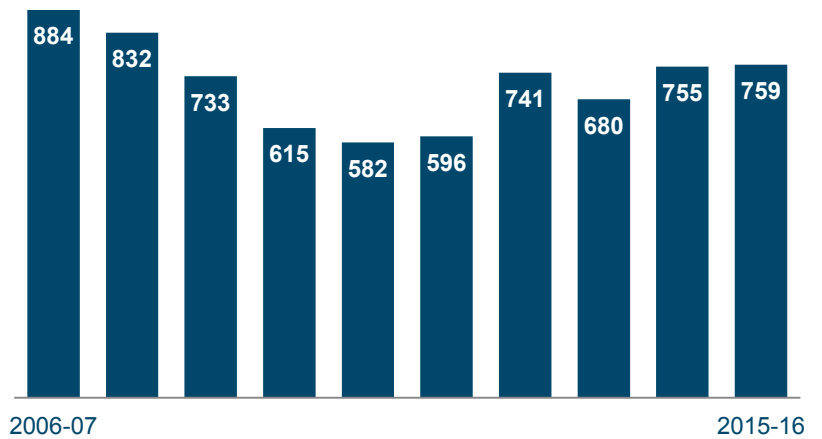
There were **759 accidents** in 2015-16

4 accidents compared to 2014-15

80% occurred on the mainline

1% on London Underground

19% on trams, metros and other non-Network Rail

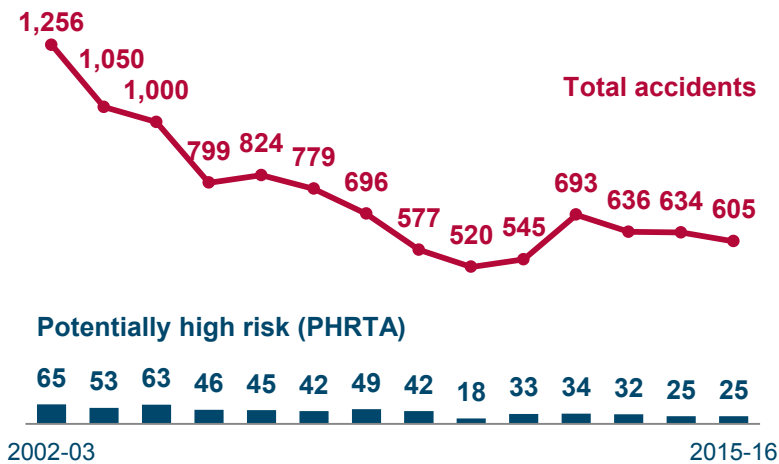


A **PHRTA** is a **Potentially Higher Risk Train Accident**.

These are RIDDOR reportable accidents and are those that have the greatest risk of resulting in physical injury.

The majority of train accidents carry a notably lower potential for serious consequences. These are known as **non-PHRTAs**.

Train Accidents on the Mainline



Of the **25 PHRTAs on the mainline** in 2015-16
15 involved at least one passenger train

There were:

11 derailments

6 collisions between trains

4 collisions with vehicles at level crossings

4 other collisions

Train Accidents on London Underground

There were **11 accidents** on London Underground in 2015-16

The **same** as 2014-15



There were **3 PHRTAs**:

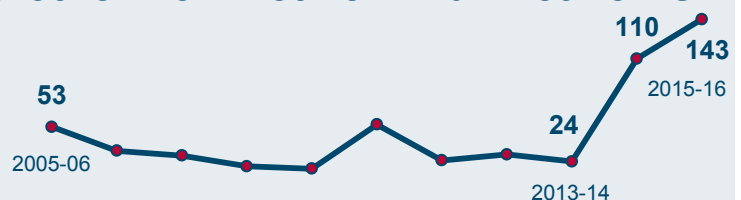
2 derailments

1 buffer stop collision

Train Accidents on trams, metros and other non-Network Rail networks

There were **143 accidents** in 2015-16

The large increase in 2014-15 is primarily because of improved reporting in the tramway sector and an extension to the tram network in Manchester and Nottingham



Level Crossing Incidents



There were **3 fatalities** at level crossings in 2015-16

All to pedestrians using level crossings
8 fewer fatalities than in 2014-15

There were also **12 suicide fatalities** at level crossings
Down from 29 in 2014-15

18 other incidents at level crossings in 2015-16:

- 4 collisions with road vehicles
- 3 collisions with gates and barriers
- 11 vehicles on the line

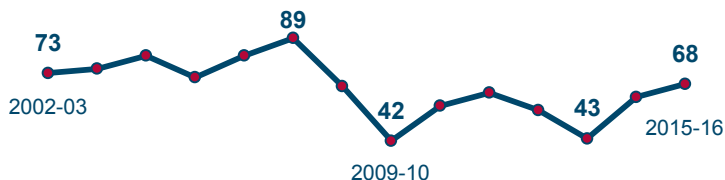
There were an additional **385 near misses** at level crossings in 2015-16



Network Rail has closed more than 1,000 level crossings since 2009-10, including 76 in 2015-16

Vehicle Incursions

There were **68 vehicle incursions** onto the railway in 2015-16



There were:

- 56** on the mainline
- 0** on London Underground
- 12** on trams, metros and other non-Network Rail networks

Of the **56 incursions on to the mainline:**

- 32** were via a fence
- 11** were via a level crossing
- 9** were via an access point
- 4** were via a bridge

Bridge Strikes



There were **1,753 bridge strikes** in 2015-16

4.4%
compared to
2014-15

Of which **45** were serious or potentially serious

Over 90% of bridge strikes each year occur to rail over road bridges

Notes

Related Publications

The statistics in this release have previously been reported in two publications:

[Rail Safety and Standards Board - Annual Safety Performance Report](#) (13 July 2016)

[Office of Rail and Road - Annual Health and Safety Report](#) (19 July 2016)

More detailed commentary about the trends and background information can be found in these two reports.

As well as the mainline data that is reported in both the publications above, this statistical release includes information from non-mainline networks, as well as finalised data for London Underground. There may be minor differences in the mainline and London Underground data compared to the other two publications - see the revisions section below for more information.

Data Sources

Data for the mainline rail network, which is owned, run and maintained by Network Rail, are provided by the **Rail Safety Standards Board** (RSSB). The scope is generally limited to incidents which occur in stations, on trains or elsewhere on Network Rail managed infrastructure, such as the track or trackside. Workforce fatalities which occur away from these locations, but occur during working time, are also included.

The data for London Underground is provided by **London Underground Limited** (LUL). Train accident data for London Underground is not available before 2006-07. Totals presented before this time include mainline and non-mainline data only.

The data for non-mainline networks are derived from the **Office of Rail and Road's** (ORR) webform. The dataset includes safety incidents reported by heritage operators, tramways, light rail systems and other operators on non-Network Rail infrastructure. Data for non-mainline networks is only available from 2005-06. Any totals presented in this release before this time include mainline and London Underground data only.

Revisions

There have been revisions to data previously published with this statistical release. Details are available in the [revisions log](#).

The rail safety statistics for the mainline network and London Underground are comparable to data published earlier in the year. Occasionally differences may occur as there may have been updates to incident reports since.

Reasons for changes could include changes as a result of further investigations into incidents or the development of injuries sustained in previously reported incidents.

Injury Categories

Employers, the self-employed and those in control of premises are required by law to report specified workplace incidents to the relevant enforcing authority, as set out by the **Reporting of Injuries, Diseases and Dangerous Occurrences Regulations** (RIDDOR) 2013. The ORR have produced [guidance](#) which provides more detail on the types of incidents which are RIDDOR reportable. These statistics also include non-RIDDOR reportable minor injuries.

The injury categories reported in these statistics are generally as follows:

- **Fatality** - death occurs within one year of the incident
- **Major injury** - injuries to passenger, staff or member of the public as defined by Schedule 1 of RIDDOR 2013. This includes most fractures, amputations, loss of sight, crush or burn injuries
- **Minor injury** - RIDDOR reportable minor injuries, which are injuries that are not fatalities or major injuries and the injured person is unable to work for more than seven consecutive days. This also includes all other physical injuries outside the scope of RIDDOR
- **Shock or trauma** - from being involved in or witnessing events that have the potential of a fatal outcome or from other causes such as verbal abuse.

Further information on the quality of the statistics in this release can be found in the [Rail Safety Statistics Quality Report](#)

Pre-created tables available on the Data Portal

All data tables can be access on the [Data Portal](#) free of charge. The data portal provides on screen data reports, as well as the facility to download data in Excel format and print the report. We can provide data in csv format on request.

The data in this report can be found in the following data portal tables:

- Passenger Safety - Key Statistics - [Table 5.18](#)
- Workforce Safety - Key Statistics - [Table 5.34](#)
- Workforce Assaults and Abuse - [Table 5.7](#)
- Public Safety - Key Statistics - [Table 5.22](#)
- Train Accidents - Key Statistics - [Table 5.26](#)
- Road Rail Interface - Key Statistics - [Table 5.24](#)

A number of additional related tables are also available on the data portal.

European Safety Benchmarking

The UK is required to submit Common Safety Indicators (CSIs) data to the European Union Agency for Railways on an annual basis. The CSIs can be used to assess and benchmark the performance of the UK railway against other EU member states.

The results of analysis of CSIs submitted for 2010 to 2013 can be found on the ORR website: [Railway safety benchmarking - Safety on the UK's mainline railway network](#) (October 2015)

National Statistics

The [United Kingdom Statistics Authority](#) designated these statistics as National Statistics in accordance with the Statistics and Registration Services Act 2007 and signifying compliance with the Code of Practice for Official Statistics. National Statistics status means that official statistics meet the highest standards of trustworthiness, quality and public value.



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