

# ARiSO

AUSTRALIAN RAIL INDUSTRY  
STANDARDS ORGANISATION

## AS 7454

### Management of Network Route Competence

STANDARDS



Advancing safety and productivity

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Development of this Standard was prepared by an Australian Rail Industry Standards Organisation (ARISO) Development Group consisting of representatives from the following organisations:

BHP, Jacobs, MTM, Pacific National, PTA WA, TasRail, and TfNSW.

The Operations Standing Committee verified that ARISO's accredited process was followed in developing the product, before the ARISO Board approved the document for publication.

ARISO wishes to acknowledge the positive contribution of subject matter experts in the development of this Standard. Their efforts ranged from membership of the Development Group through to individuals providing comments on a draft of the Standard during the open review.

I commend this Standard to the Australasian rail industry as it represents industry good practice and has been developed through a rigorous process.



**Alan Fedda**  
Chief Executive Officer  
Australian Rail Industry Standards Organisation

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## Document history

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2026	18 June 2026	This document has been reviewed to ensure it remains relevant and applicable. The latest review assessed the content, confirming that while updates were made to align with current industry practices, technologies, and regulatory requirements, the original authorship and copyright have been acknowledged as required.

## Approval

Name	Date
Australian Rail Industry Standards Organisation Board	18 June 2026

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## Preface

This standard was prepared by the Management of Network Route Competence Development Group, overseen by the ARISO Safety and Operations Standing Committee.

The review of this document provides alignment with current methodologies, including the following changes:

- (a) Emphasizes systematic evaluation on a risk basis and includes a comprehensive list of criteria such as applicant and assessor preparation.
- (b) Stresses the completion of reviews to identify improvement opportunities considering elements like safety and updates in rail traffic crew (RTC) research and assessment methodologies.
- (c) Specifies retaining records and responding to requests from other registered training organizations (RTO) or statutory authorities.

## Objective

The objective of this document is to specify the principles for the development, training, and assessment of route competence for rail traffic crew (RTC), and to provide guidance to rolling stock operators (RSO) on the development and management of route competence programs. This document supports rail transport operators (RTO) in meeting their Rail Safety National Law obligations for the competence of rail safety workers and for managing risks associated with route knowledge and route competence.

## Compliance

There are four types of provisions contained within Australian Standards developed by ARISO:

- (a) Requirements.
- (b) Recommendations.
- (c) Permissions.
- (d) Constraints.

**Requirements** – it is mandatory to follow all requirements to claim full compliance with the Standard. Requirements are identified within the text by the term ‘shall’.

**Recommendations** – do not mention or exclude other possibilities but do offer the one that is preferred. Recommendations are identified within the text by the term ‘should’.

Recommendations recognize that there could be limitations to the universal application of the control, i.e. the identified control is not able to be applied, or other controls are more appropriate or better.

For compliance purposes, where a recommended control is not applied as written in the standard it could be incumbent on the adopter of the standard to demonstrate their actual method of controlling the risk as part of their WHS or Rail Safety National Law obligations. Similarly, it could also be incumbent on an adopter of the standard to demonstrate their method of controlling the risk to contracting entities or interfacing organisations where the risk may be shared.

**Permissions** – conveys consent by providing an allowable option. Permissions are identified within the text by the term ‘may’.

**Constraints** – provided by an external source such as legislation. Constraints are identified within the text by the term ‘must’.

ARISO Standards identify known hazards relevant to the railway industry. Appendix D provides a non-exhaustive list of hazards relevant to the scope of this Standard.

**Appendices** in ARISO Standards may be designated either “normative” or “informative”. A “normative” appendix is an integral part of a Standard and compliance with it is a requirement, whereas an “informative” appendix is only for information and guidance.

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## Section 1 Scope and general

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### 1.1 Scope

This document covers the development, implementation, and maintenance of route competence for RTC, including training, assessment, and ongoing management to support safe rail traffic operations under varying conditions.

It applies to RSOs that manage route competence within their rail safety management systems, as well as RTOs and other training providers involved in delivering and assessing such training. It also applies to RTC employed directly by an RSO or provided by contractors operating under the RSO's safety management system, including track vehicle operations across rail infrastructure managers (RIM) networks.

The document supports compliance with the Rail Safety National Law and should be applied in alignment with nationally endorsed units of competency.

This document is not specifically intended to cover urban on-street tramway or light rail networks, or heritage railways operating on isolated networks, but elements of this document may be applied to such systems as deemed appropriate by the relevant RIM.

This document is not specifically intended to cover Network Control Officers, Train Guards or Shunting staff but elements of this document may be applied to such roles as deemed appropriate by the relevant RIM.

### 1.2 Normative references

There are no normative references in this document.

**NOTE:**

Documents for informative purposes are listed in a Bibliography at the back of the Standard.

### 1.3 Defined terms and abbreviations

For the purposes of this document, the following terms and definitions apply:

#### 1.3.1

**individual factors**

factors concerning experience, capabilities and learning styles that can affect a person's ability to learn a route

#### 1.3.2

**proceed authority exceedance (PAE)**

when a train exceeds the limit of authority, a train proceeds without a proceed authority or proceeds whilst a restraint authority is in place

#### 1.3.3

**rail infrastructure manager (RIM)**

As defined in Rail Safety National Law.

#### 1.3.4

**rail traffic**

trains and track vehicle or vehicles travelling in the network

#### 1.3.5

**rail traffic crew (RTC)**

competent workers responsible for the operation of rail traffic