

Network Safeworking Rules and Procedures

Rail Traffic Integrity

Rule Number: 4003

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Document History

Version	Effective Date	Pages updated	Reasons for change
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1. Purpose

The purpose of this rule is to provide information to *Rail Traffic Crews* about requirements for ensuring *Rail Traffic* is *Fit for Purpose* before *Accessing*, and during *Travel* in the *Network*.

2. General

Rail Traffic must be identifiable and comply with *Arc Infrastructure's* gauge outline in accordance with the W190-400-001 Standard Gauge Code of Practice Track & Civil Infrastructure and W190-400-002 Narrow Gauge Code of Practice Track & Civil Infrastructure.

Rail Traffic Crews must not, without *Authority*, bypass, disconnect or turn off any device provided for the safe operation of *Rail Traffic*.

Prior to entering the *Network*, *Rail Traffic Crews* must ensure that all necessary brake tests have been performed, in accordance with *Arc Infrastructure's* instruction Automatic Air Brake Instructions, and equipment is within specified limits.

Details of the *Rail Traffic Consist* must be provided to the *Network Controller*, by the *Operator's Representative*, prior to the *Rail Traffic* departure.

Where the *Rail Traffic Consist* changes en-route the details must be provided to the *Network Controller*, by the *Operator's Representative*, prior to the *Rail Traffic* departure from that *Location*.

Rail Traffic Integrity must be re-established whenever the *Consist* changes. *Rail Traffic Integrity* must be documented and maintained.

Loading carried on *Rail Traffic* must be *Secure* and *Restrained* safely throughout the journey.

2.1 Testing Equipment

Prior to entering the *Network*, *Rail Traffic Crews* must ensure that the following equipment is fully operational:

- Speedometer, if this can be checked;
- *Motive Power Unit* lights;
- *Motive Power Unit Whistle*;
- Communications Equipment;
- *Driver Supervisory Systems*; and
- *End of Train Marker*.

2.2 Dangerous Goods

Before *Rail Traffic Travels* in the *Network*, the classes of *Dangerous Goods* and the identification numbers of vehicles carrying *Dangerous Goods*, must be recorded in the *Consist* documentation.



NOTE: *Dangerous Goods* must be loaded, labelled and *Marshalled* in accordance with the [Australian Code for the Transport of Dangerous Goods by Road and Rail \(ADG Code\)](#)©.

3. Brakes

3.1 Holding Rail Traffic Stationary

Rail Traffic braking systems must be capable of stopping and holding the *Rail Traffic* stationary in all *Network* conditions applicable to the *Route*.

3.1.1 Security of Rail Traffic Left on Running Lines

Whenever it is necessary for *Rail Traffic*, or a portion of *Rail Traffic*, to be left unattended on a *Running Line* for longer than 30 minutes, in addition to the full application of the *Automatic Brake*, *Handbrakes* must be applied as follows:

Figure 4003-1 Rail Traffic handbrake application table

Section of line	Percentage of <i>Handbrakes</i> to be applied
All NG Main Lines	100 per cent
<i>Dual gauge</i> Kwinana-Avon Yard	33 per cent
SG Avon Yard-Kalgoorlie	50 per cent
SG Kalgoorlie-Esperance	100 per cent
SG Kalgoorlie-Leonora	100 per cent
All crossing loops	33 per cent

Vehicles not provided with *Handbrakes* must, where necessary, be chocked to meet the requirements shown above.

3.2 Abnormal or Defective Brakes

If during *Travel* there is an abnormal application of brakes or the braking performance is inadequate, the *Rail Traffic Crew* must:

- bring the *Rail Traffic* to a complete Stop;
- advise the *Network Controller*;
- if necessary, apply *Protection* for the *Rail Traffic* in accordance with Rule 4001 Protecting Rail Traffic;
- if possible, determine the cause of the application or the extent of the defect;
- if possible, remedy the cause of the application or defect; and
- tell the *Network Controller* when the journey has been resumed or if the defect cannot be remedied.

3.3 Handbrakes and Securing Devices

Equipment used for *Securing* rollingstock must be tested before rollingstock is detached from a *Motive Power Unit* or a continuous brake system.

If a vehicle without working *Handbrakes* needs to be detached and *Secured* it must be coupled to a vehicle that has working *Handbrakes* and can *Secure* the combined weight of both vehicles.

4. Rail Traffic Safety Management Systems

Rail Traffic Safety Management Systems include:

- Speedometer; or
- Annett's Key System.

5. Driver Supervisory Systems

Driver Supervisory Systems include:

- Vigilance Control;
- Detonator Detector System; or
- Automatic Train Protection System.

6. Defective Equipment

Where any Safety Management System fails en-route, the *Rail Traffic Crew* must obtain the *Operator's Representative's* approval to continue.

The *Network Controller* must be advised by the *Rail Traffic Crew* of:

- the system failure; and
- the *Operator's Representative's* approval to continue.

6.1 Speedometer Failure

Where approved to continue by their *Operator's Representative*, affected *Rail Traffic Crews* must advise the *Network Controller* of the approval and ensure that permissible speeds are not exceeded and may continue to *Travel* until:

- the *Motive Power Unit* is Remarshalled at the first suitable *Location*;
- the equipment can be repaired or replaced; or
- the *Motive Power Unit* is *Worked Out of Service*.

6.2 Driver Supervisory Systems

If Driver Supervisory Systems in the leading *Motive Power Unit* is faulty and needs to be isolated during *Travel*, the *Rail Traffic Crew* and the *Network Controller* must confer to determine what actions are required to ensure safety of the *Rail Traffic* and *Workers*.



NOTE: Actions to ensure safety of the *Rail Traffic* may include:

- getting a second crew member for driver only operation;
- reduction of speed; or
- *Travel at Restricted Speed*.

If the affected *Motive Power Unit* cannot continue to *Travel* safely, it must be:

- remarshalled at the first suitable *Location*; or
- *Worked Out of Service*.

7. Defective Vehicles



WARNING: Where there is a risk of being struck by *Rail Traffic* on *Adjacent* lines, the *Rail Traffic Crew* must arrange *Protection* in accordance with Procedure 9010 Protecting Work from Rail Traffic on Adjacent Lines.



WARNING: *Adjacent* lines may be under the control of different *Network Controllers* or *Access Providers*.

If the *Rail Traffic Crew* becomes aware that one or more of their vehicles may be defective, the crew must:

- stop if necessary;
- tell the *Network Controller*;
- *Protect* the *Rail Traffic*, if required; and
- inspect *Rail Traffic* for fault or failure, or if this is not possible, arrange for inspection.

7.1 Inspecting and Managing Defects



WARNING: If the *Rail Traffic Crew* suspect that a vehicle defect may have caused damage to *Infrastructure* the *Rail Traffic Crew* must tell the *Network Controller*.

If the inspection confirms that there is a defect, the *Rail Traffic Crew* must tell the *Network Controller*:

- the nature of the defect; and
- if the defect can be remedied on site.

If the *Rail Traffic Crew* considers that the defective vehicle cannot *Travel* normally, the *Rail Traffic Crew* or *Operator's Representative* must determine:

- the vehicle's fitness for *Travel*;
- any restrictions to be placed on the vehicle for *Travel*; or
- the proposed plan for removing the vehicle from *Running Lines*.

If the defective vehicle is able to *Travel*, the *Rail Traffic Crew* must tell the *Network Controller* about operating restrictions that apply.

If the vehicle is to be detached, the *Rail Traffic Crew* must:

- advise the *Network Controller* of the details of the vehicle including any *Dangerous Goods* and their defects;
- jointly agree with the *Network Controller*, as to the *Location* of where the vehicle is to be detached;
- *Secure* the vehicle at the agreed *Location*; and
- place red NOT TO GO cards on the vehicle.

Any equipment that has been detached from a vehicle must be moved to a position where it cannot be struck by *Rail Traffic*.

The *Network Controller* must be advised of any detached equipment, and if the detached equipment cannot be moved *Clear* of the line.

8. References

4001 Protecting Disabled Rail Traffic

9010 Protecting Work from Rail Traffic on Adjacent Lines

W190-400-001 Standard Gauge Code of Practice Track & Civil Infrastructure

W190-400-002 Narrow Gauge Code of Practice Track & Civil Infrastructure

Australian Code for the Transport of Dangerous Goods by Road and Rail (ADG Code) ©

Automatic Air Brake Instructions

9. Effective Date

3 February 2020