ARTC

Engineering Document Control

EGP-01-01

Applicability

ARTC Network Wide
SMS

Publication Requirement

Internal / External

Primary Source

PP-117 (v1.2)

Document Status

Version #	Date Reviewed	Prepared by	Endorsed	Approved
3.3	20 Oct 24	Standards	Manager Engineering Services	General Manager Technical Services and Assurance 23/10/2024

Amendment Record

Amendment Version #	Date Reviewed	Clause	Description of Amendment
3.0	23 Dec 21	All	Inclusion of Route Access, Network Information and Network Rules and approval by relevant manager. Clarification of roles for business unit endorsement. Expansion of consultation and implementation requirements.
3.1	25 Oct 22	Various	Update to reflect updated organisation structure Added professional engineering requirements
3.2	28 Jun 24		Updated to reflect new organisation structure
3.3	20 Oct 24		Updated approval requirements to reflect organisation changes. Changed procedural information to informative rather than prescriptive and minor editorial changes.

Table of Contents

1 Introduction

1.1 Purpose

The purpose of this Procedure is to provide guidelines for the preparation, registration, accessing and approval of documents managed by Technical Services and Assurance

This Procedure also details the steps to be taken for implementing changes to approved, or preparation of new documents.

1.2 Scope

This Procedure applies to documents owned and managed by Technical Services and Assurance Engineering including

- Engineering Documents
- Route Standards
- Operations Standards
- Network Information
- Equipment &System Type Approvals

1.3 Procedure Owner

The General Manager Technical Services and Assurance is the Procedure Owner and is the initial point of contact for all queries relating to this Procedure.

1.4 Responsibilities

Responsibilities for the preparation, review, endorsement and approval of documents are outlined in Appendix A Standards Documentation Responsibilities.

1.5 Reference Documents

1.5.1 Australian Standards

- AS 7472 - Railway Operations - Management of Change

1.5.2 ARTC Documents

- RSK-PR-001 Risk Management
- SYS-PR-001 Records Management Procedure
- EGP0101F-02 Engineering Document Change Approval (EDCA) Form
- EGP-21-01 Equipment & System Type Approvals
- EGH-01-02 Guideline for the preparation of Implementation Plans
- OGP-30-01 Route Access Condition Notices
- OGP-30-02 Network Information Books
- ARTC Safety Management System (SMS).

1.5.3 External Documents

- Preparation of a Rail Safety Management System Guideline – Office of the National Rail Safety Regulator

- Rail Safety National Law National Regulations: Division 4 – Network Rules

1.6 Definitions

The following terms are used within this document:

Term	Description
Codes of Practice	A consolidation of Standards, Procedures, and guidelines.
Engineering Documents	Documents containing engineering information. This may Standards, Specifications, Procedures, Instructions etc. Typically, these documents will have document numbers starting with 'E'
Governance	Documents containing requirements as to how engineering requirements are governed
Network Rules	The rules, systems and procedures relating to railway operations established or adopted by a rail infrastructure manager to ensure the safety of the manager's railway operations
Network Information	Infrastructure and operational information with track diagrams aligned with each of the relevant Network Control Centre Boards. Includes Network Information Books (NIB), NIB Diagrams and Line Diagrams.
New Equipment & System Approvals	New equipment and systems to be introduced into the ARTC network are managed in accordance with the new equipment & system approvals procedure. They are also known as type approvals.
Route Standards	The terms and conditions upon which access is granted to the ARTC network are specified in an Access Agreement negotiated between ARTC and the Operator.
Stakeholder	An entity that has an interest in the ARTC Standards documentation and can include, but is not limited to, Standards department; Other ARTC departments; Rolling Stock Operators; Alliance Partners; Track Owners or Lessees; Rail Infrastructure Managers, Other relevant Government Departments and Statutory Bodies.
Version	Issue – an alpha or numeric index indicating the stage of development of a document. Revision – A number indicating the change status of a document within an issue

2 Document Format

Documents managed by Technical Services and Assurance are to be formatted as per the supplied template when the document is requested. Where no format is supplied, they shall be as per the corporate ARTC Procedure Template.

2.1 Cover page

All Standards documents are to have a cover page which clearly states the title, version and number of the document.

2.2 Document Status and Amendment Record

All Standards documents and supporting documents are to include:

- Document Status indicating the document version (issue and revision), date of version and the relevant authorities for preparation, review, endorsement and approval.

- A list of any active technical notes against the document

- Document Amendment Record which clearly identifies the current version (issue and revision), date of change and outline of the nature of amendment.

2.3 Version Status

The following alpha-numeric indices are to be used for identifying the various stages of Draft, Preliminary, Final, Amended and Reissued documents.

Draft	Revision A.xx
Preliminary	Revision B.xx
First Issue	Version 1.0
Amendment 1	Version 1.1
Amendment 2	Version 1.2
Reissue	Version 2.0

Updating the list of active technical notes on the document cover sheet does not trigger a version change or document approval.

2.4 Headers and Footers

Headers and footers are to be used on each page to include the title and number of the document, the version of the document, date of last revision, page numbers and "This document is uncontrolled when printed."

3 Document Control

3.1 Endorsement and Approval

The responsible roles for document endorsement and approval are detailed in Appendix A Standards Documentation Responsibilities.

Document approval includes ensuring that documents are constructed in a manner such that they can be easily understood.

It is the responsibility of the responsible endorser to ensure requirements of Regulators relating to the notification of changes to documents are complied with.

3.2 Approved Documents

Approved documents are available electronically to all ARTC staff and external parties via the ARTC extranet and customer pages. Internal only documents are available to ARTC staff via Connect. Controlled hard copies are not issued and printed copies are uncontrolled.

The master copy will be held and maintained by the Integrated Systems& Document Controller except for NIB's, which are held and maintained by the Network Information Administrator.

3.3 Registration

All approved engineering documents are to be registered on the Master Engineering Document Register.

All approved new equipment & system approvals are to be registered on the New Equipment & System Approval Register.

3.4 Notification

3.4.1 Engineering Documents

Notification of every new or changed document or supporting document should be sent by the Integrated Systems Document Controller by global email to relevant stakeholders on the relevant distribution list. This will include the document number, name, a brief description of the change and the location of the approved document. A soft copy of the email notification will be saved by the Integrated Systems Document Controller. The responsibility lies with individual stakeholders to periodically check the appropriate source pages for the most recent published versions of documents.

The distribution lists are maintained by the Integrated Systems Document Controller. This forms the basis of Standards Groups in Outlook which are used for the email notifications. Standards Groups are sorted into engineering discipline.

3.4.2 Route Standards

Route Access Condition Notices are distributed as per OGP-30-01

3.4.3 Network Rules

Network Rule changes are published externally and communicated through the issue of a SAFE Notice (NSW) and Train Notice (SA/VIC/WA) at least 28 days prior to the change.

3.4.4 Network Information

Network Information is notified and published as per OGP-30-02

3.5 Drafts

When ready for stakeholder review, unapproved engineering/network rule documents and supporting documents will be made available to stakeholders through the appropriate means of consultation as per 4.4.

Stakeholder review for draft updated Network Information is as per OGP-30-02.

Documents in draft may note their revision number in letter format as the document progresses to indicated changes in draft versions.

3.6 Reporting

The General Manager Technical Services and Assurance is to provide a monthly summary report to advise the Safety & Environment Leadership Team (SELT) each month of documents approved in accordance with Appendix A during the previous month, as well as a summary report of Priority Rule Changes in review.

The General Manager Technical Services and Assurance is also to provide a monthly summary report of Priority Rule Changes in review.

4 Engineering Document Change Process

4.1 Change Classification

A change is classified as Class I if the change creates significant changes to current requirements to the extent that adjustment will be required by the end user. A change will typically be classified as Class I if it creates any more than negligible change for any of the following:
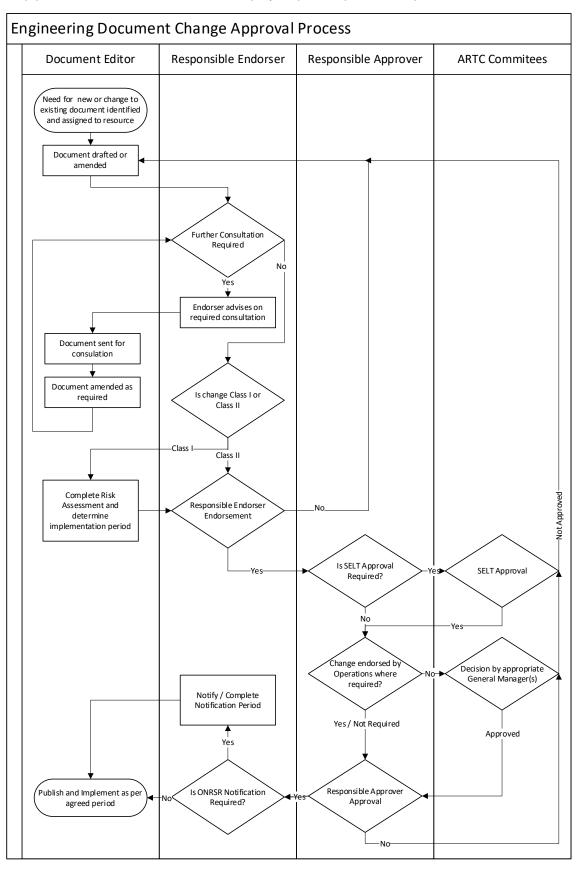
- Performance
- Risk profile
- Stakeholder costs
- Reliability and maintainability
- Service life
- Interface characteristics
- Operations
- Electromagnetic characteristics
- Delivered operation or maintenance manuals
- Skills, resources, training or human engineering design.

Otherwise, the change is classified as a Class II change. Class II changes to documents are classified as:

- Editorial changes or corrections to spelling, formatting or position titles.
- Consequential changes resulting from updates to related documents
- Changes involving negligible impact on ARTC or stakeholder costs, risk profiles, or resource requirements.
- Changes that would be considered Class I but have already been accepted by an alternate process (e.g. audit actions, business decision papers, updates to Network Information in line with SAFE Notices etc.)

4.2 Flowchart

The following flowchart summarises the engineering document change process. Refer to Step by Step procedure4.3 for a more detailed step by step description of the process.

Engineering Document Change Approval Process

Document Editor	Responsible Endorser	Responsible Approver	ARTC Commitees

Need for new or change to existing document identified and assigned to resource

Document drafted or amended

Further Consultation Required
No
Yes

Endorser advises on required consultation

Document sent for consulation

Document amended as required

Is change Class I or Class II
Class I
Class II

Complete Risk Assessment and determine implementation period

Responsible Endorser Endorsement
No
Yes

Is SELT Approval Required?
Yes
No

SELT Approval

Not Approved

Change endorsed by Operations where required?
No
Yes / Not Required

Decision by appropriate General Manager(s)

Approved

Notify / Complete Notification Period
Yes

Is ONRSR Notification Required?
No
Yes

Publish and Implement as per agreed period

Responsible Approver Approval
No

4.3   Step by Step procedure

The following process provides an informative explanation of the process for proposed changes. The actual steps taken for any particular change may require deviation from below depending on the nature and complexity of the change. Ultimate discretion as to if the process has been correctly applied sits with the Approval Authority.

1. When there is a need for new or change of existing document the document editor will contact the Integrated Systems Document Controller to request access to the document master copies

2. The Integrated Systems Document Controller may confirm with the responsible endorser that the document should be checked out. Once this confirmation is received the Integrated Systems Document Controller will provide the appropriate documents to progress the change, this will include

    o   Provisional document number and template (for new document)

    o   Master copies of documents (for existing documents)

    o   Issue register (for existing documents)

    o   Blank EDCA Form

    o   Type Approval Number (for new type equipment approvals)

    The Integrated Systems Document Controller will record that an existing document is booked out for amendment.

    A document does not receive and EDCA number or document number until it is submitted for approval.

Note: For network information the Network Information Administrator holds the master copies and may also be the responsible editor. Network Information is updated in line with the requirements of OGP-30-02

3. The document editor will make updates to the document as required using track changes and advise the responsible endorser when complete.

4. The responsible endorser will evaluate the scope of the change and advise if consultation is required and to what extent.

Note: Changes to network rules require both internal and external consultation

5. The document editor will review the consultation feedback and respond accordingly, making any appropriate changes to the document. Depending on the amount and nature of changes the document may require additional consultation after being updated, this is at the discretion of the responsible endorser.

6. The Responsible endorser will evaluate if the change Class I or Class II

    Class I changes progress as per 4.3.1

    Class II changes progress as per 4.3.2

4.3.1 Class I Changes

Following completion of Steps 1 to 6

7. The document editor undertakes an evaluation of risk. Where a formal risk assessment is conducted it should include all impacted parties and relevant discipline subject matter experts and be conducted in line with per RSK-PR-001. Once completed this information is returned to the Integrated Systems Document Controller.

8. The Integrated Systems Document Controller will package the document for endorsement and approval, this will include

   o The proposed document(s)

   o EDCA Form

   o Risk Assessments

   o Records of consultation

   o Any other supporting information

9. The responsible endorser shall review the changes for endorsement and advise the Integrated Systems Document Controller if the change is notifiable to ONRSR.

Note: Professional Engineering requirements may apply to some changes depending on the nature of change and applicability.

If the change is rejected the process reverts to Step 2.

10. The proposed changes are then sent to the appropriate business unit endorsers for endorsement. Endorsement is only required by representatives from the affect business units.

Notes: These approvers vary based on document discipline and are covered in Appendix A.

If the change is rejected it is to be returned to the responsible endorser to determine how to proceed.

11. The responsible approver reviews the change to determine:

   a. If the change has been acceptably managed, consulted and risk assessed

   b. If the change requires committee approval

   c. If the change has been accepted by the appropriate business unit endorsers, where required

Notes: Approval through additional committees (e.g. SELT) is required for some changes based on significance of change and business impact. This decision is made by the responsible approver

Changes not endorsed by the business unit may either be rejected or escalated to a higher level for decision. This may be direct or via a committee.

If the change is rejected the process reverts to Step 2.

12. Responsible approver returns the signed EDCA, approved document and supporting documents to the Integrated Systems Document Controller.

13. Notifiable changes must await submission and expiration of the prescribed notification period before proceeding.

14. Integrated Systems Document Controller enters the new document status in the appropriate Document Registers in accordance with the publishing checklists, arranges

for publication in the appropriate location and sends email notification. All documents associated with the change, including the EDCA form are to be filed in Standards records.

Note: *In some cases, a new document may be published before it goes live.*

15. The document editor ensures that all agreement implementation period, communications and other process are followed as per the agreed implementation requirements.

4.3.2   Class II Changes

Following completion of Steps 1 to 6

7. The Integrated Systems Document Controller will package the document for endorsement and approval, this will include:

    o The proposed document(s)

    o EDCA Form

    o Records of consultation

    o Any other supporting information

8. The responsible endorser reviews the changes for endorsement and advise the Integrated Systems Document Controller if the change is notifiable to ONRSR.

Note: *Professional Engineering requirements may apply to some changes depending on the nature of change and applicability.*

9. The responsible approver reviews the change to determine if the change has been acceptably managed, consulted and correctly classified as Class II.

10. Responsible approver returns the signed EDCA, approved document and supporting documents to the Integrated Systems Document Controller.

11. Notifiable changes must await submission and expiration of the prescribed notification period before proceeding.

12. Integrated Systems Document Controller enters the new document status in the appropriate Document Registers in accordance with the publishing checklists, arranges for publication in the appropriate location and sends email notification. All documents associated with the change, including the EDCA form are to be filed in Standards records.

13. The document editor ensures that all agreement implementation period, communications and other process are followed as per the agreed implementation requirements

4.4 Consultation

Consultation may be undertaken differently based on several factors, including

- Type of document
- Scope of a change
- Number of affected stakeholders
- Number of SME's who can reasonably contribute

The responsible approver nominates the level of consultation required for a given document. This may include one or more of the methods below

- Open consultation via the SharePoint page
- Consultation via direct provision of documents and feedback sheets
- Workshops
- Working group and steering committee meetings
- Email consultation

Where documents are made available to stakeholders on the consultation SharePoint page, a link will be provided to the appropriate Consultation Facilitators. The Consultation Facilitators will ensure the appropriate stakeholders provide their feedback via the SharePoint page.

Records of consultation shall be provided with the document submission by the document editor.

4.5 Implementation

For Class I changes implementation should be considered as part the change. The assessment should cover

- The risk posed if end users are unaware of the change
- If an implementation period is required and how long it should be
- What communications are necessary to ensure the change is received
- If new training, briefings, awareness or equipment is required as part of the change

A formal implemented plan may be adopted where deemed appropriate by the responsible endorser.

Appendix A: Standards Documentation Responsibilities

Document Type		Responsible Endorser	Operations Endorsement [1]	Responsible Approver [2]
Engineering Documents	Track & Civil	Principal Track Standards Engineer	Manager Asset Strategy	Manager Engineering Services
	Structures	Principal Structural Engineer	Manager Asset Reliability	
	Signalling	Principal Signalling Standards Engineer	Head of Engineering *or delegate*	
	Rolling Stock (3)	Principal Rolling Stock Interface Engineer	Manager National Services	
	Type Approvals	Relevant Principal Engineer	Type Approval Panel	
Engineering Governance	General	Manager Engineering Services	*N/A*	GM Technical Services and Assurance
	Project & Configuration	Manager Operations Services	*N/A*	
	Drawing and Systems	Manager Integrated Systems Framework	*N/A*	
Route Access Standards (RAS)		Principal Rolling Stock Interface Engineer	*N/A*	Manager Engineering Services
RAS Section Pages			*N/A*	Manager Operations Services
Operational Procedures (Network wide only)		Safe working Standardisation Lead	General Manager Network Coordination	Manager Operations Services
Network Information		N/A	N/A	Manager Assurance
Network Rules		Manager Operations Services	SELT or other committee as required	GM Technical Services and Assurance

Note:

1.   Operations endorsement is only required for Class I changes.

Where role title changes this approval should come from a position that reports to General Manager or equivalent.

Endorsers may vary from above based on individual nature of document changes. The Responsible Approver has discretion to alter as required.

2.   *Changes that require ONRSR notification requirement additional endorsement by GM Technical Services and Assurance*

3.   *Plant and Equipment documents may follow this or use the endorsement authorities reversed.*