Determining if Risk is Reduced So Far As Is Reasonably Practicable (SFAIRP)

RSK-WI-002

Applicability

ARTC Network Wide   SMS

Publication Requirement

Internal / External

Primary Source

RMWI3 Guidelines on SFAIRP v1.0

Document Status

Version #	Date Reviewed	Prepared by	Reviewed by	Endorsed	Approved
1.2	19 February 2018	Corporate Risk Manager	GM Risk & Safety	Group Executive Corporate Services & Safety	OSERC

Amendment Record

Amendment Version #	Date Reviewed	Clause	Description of Amendment
1.0	26 May 2016		Rebranded, renamed and assigned new document number as per COR-PR-001. Amendment of information to ensure consistency with Risk Management Information System and updated templates. Inclusion of additional guidance information.
1.1	19 December 2017	Various	Removal of references to RMIS. Consistent use of terminology for treatment.
1.2	19 February 2018	1.3, 1.4	Change of title for Executive roles. Change Division/ Business Unit.

Table of Contents

1 Introduction

1.1 Purpose

This work instruction provides guidance on the implementation of So Far As Is Reasonably Practicable (SFAIRP) principles. This Work Instruction supplements *RSK-WI-001 Conducting a Risk Assessment Workshop*, and *RSK-FM-001 Risk Assessment Template*, and shall be utilised when assessing safety related risks.

The provision of safety SFAIRP is a requirement of Rail Safety and Work Health & Safety Legislation. It requires each risk to be weighed against the resources needed to eliminate or reduce the risk. It does not require every possible measure to be implemented, but places the onus on the individual or organisation to demonstrate (or be in a position to demonstrate) that the cost of additional measures to control the risk (over and above those risk controls already in place) would be grossly disproportionate to the benefit of the risk reduction associated with the implementation of the additional risk control.

1.2 Scope

This Work Instruction is applicable to all ARTC employees.

1.3 Document Owner

The ARTC Corporate Risk Manager is the coordinator of this work instruction and is the initial point of contact for all enquiries relating to its application across the organisation.

The ARTC Group Executive Corporate Services & Safety is the owner of this work instruction and accepts the responsibility for its accuracy and currency.

1.4 Responsibilities

Group Executive Corporate Services & Safety is responsible for:
- The development, review and analysis of policies and practices to ensure compliance with So Far As Is Reasonably Practicable (SFAIRP) principles.

ARTC Corporate Risk Manager is responsible for:
- Providing advice and reasonable assistance to Executive and Senior Managers, Nominated Risk Managers, other employees and relevant external stakeholders in order to meet their obligations that safety risks are reduced SFAIRP;
- Monitoring and managing information in the Central Risk Register to ensure information is current and relevant.

Risk Owners are responsible for:
- Ensuring that decisions made regarding implementation of risk controls are consistent with the principles and processes outlined in this Work Instruction.

Nominated Risk Managers are responsible for:
- Ensuring that risk information is documented in an appropriate Risk Register that is consistent with this Work Instruction;
- Providing the Corporate Risk Manager with updates for risks and controls managed in the Central Risk Register.

Risk Facilitators are responsible for:

- Facilitating the gathering of information in Risk Assessment Workshops in a manner that is consistent with this Work Instruction;

- Providing finalised risk assessment documentation to the Corporate Risk Manager.

1.5 Parent Procedure

RSK-PR-001 Risk Management is the Parent Procedure for this Work Instruction.

1.6 Subordinate Documents

There are no documents subordinate to this Work Instruction.

1.7 Reference Documents

The following documents are related to this Work Instruction:

- COR-PO-006 Risk Management Policy

- RSK-PR-001 Risk Management Procedure

- RSK-WI-001 Conducting a Risk Assessment Workshop

- RSK-WI-003 Determining Effectiveness of Controls

- RSK-WI-004 Conducting a Risk Review

- RSK-WI-005 Project Risk Management

- RSK-GL-001 Risk Management Terms and Data Guideline

The following tools and templates, whilst not mandatory, may assist with meeting the requirements of this procedure and related subsidiary documents:

- RSK-FM-001 Risk Assessment Template

- RSK-FM-003 Risk Assessment Report Template

- RSK-FM-004 Risk Review Template

- RSK-FM-005 Project Risk Management Plan

- Guideline 001 ARTC Risk Assessment Template

The following documents were referenced in this Work Instruction:

- ISO 31000:2009 Risk management – Principles and guidelines

- SA/SNZ HB 436:2013 Risk management guidelines – Companion to ISO 31000:2009

- Rail Safety legislation (various)

- Meaning of Duty to Ensure Safety So Far As Is Reasonably Practicable Guideline, Office of the National Safety Regulator, issued December 2014

- Commonwealth Work Health and Safety legislation

1.8   Definitions

The following terms and acronyms are used within this document:

Term or acronym	Description
Causal & Contributing Factor	A condition or set of conditions leading to a risk. It is often used to describe "what could go wrong". Used in this document to describe the cause contributing to a risk.
	A causal factor, is a factor which may alone cause the risk to eventuate. A contributing factor, is a factor which, when combined with other factors could cause the risk to eventuate.
Central Risk Register	A consolidation of non-project risks into a single ARTC risk register that is managed by the Corporate Risk Manager.
Consequence	Outcome of an event affecting objectives.
	• An event can lead to a range of consequences.
	• A consequence can be certain or uncertain and can have positive or negative effects on objectives.
	• Consequences can be expressed qualitatively or quantitatively.
Control	A measure that modifies risk by either preventing the risk or reducing (mitigating) the consequences of the risk. Controls may include any process, policy, device, practice or other action which modifies risk.
Hierarchy of Controls	A sequence of options which offer you a number of ways to approach the control of hazards. The hierarchy is arranged in order of implementation preference.
	• Elimination
	• Substitution
	• Isolation
	• Engineering controls
	• Administrative controls
	• Personal Protective Equipment (PPE)
Level of Risk	Magnitude of a risk or combination of risks, expressed in terms of the combination of consequences and their likelihood.
Likelihood	A qualitative description of the chance of something happening.
Treatment	A control, or additional action for an existing control, that is not yet implemented. Also referred to as a proposed control.

Further terms and definitions related to risk are provided in *RSK-PR-001 Risk Management Procedure* and *RSK-GL-001 Risk Management Terms and Data Guideline*.

2 ARTC Risk Management and SFAIRP

It is essential that the process for identifying, analysing, evaluating and controlling safety risks is rigorous, structured and auditable.

The ARTC risk management framework, including risk assessment documentation, is structured in such a way that, when followed effectively, provides evidence and justification in the determination of the provision of safety So Far As Is Reasonably Practicable (SFAIRP).

In determining what is 'reasonably practicable', the following five factors must be considered:

1. The likelihood of the risk concerned eventuating;

2. The consequence, or degree of harm, that would result if the risk eventuated;

3. What was known or ought reasonably to be known, about the risk and any ways of eliminating or reducing the risk;

4. The availability and suitability of ways to eliminate or reduce the risk; and

5. The cost of eliminating or reducing the risk.

Consideration of what is "reasonably practicable" is undertaken in two stages:

1. Identification of what is possible to be done to ensure safety

2. Consideration of whether it is reasonable, in the circumstances, to do all that is possible.

In the evaluation and control of identified risks, the Hierarchy of Controls is a key tool used to consider all possible controls to eliminate or reduce a risk.

Where risks are managed rather than eliminated, ARTC must:

- ensure adequate controls are applied;

- provide training, education, instruction & information;

- provide supervision; and

- periodically review the relevant risk(s) and its controls.

3 Hierarchy of Controls

The Hierarchy of Controls is a tool that facilitates selection of the most appropriate means for reducing or eliminating the risk.

The principle behind the Hierarchy of Controls is that risk controls dependent on individual behaviour are less reliable and durable than risk controls that engineer or design out risks.

The Hierarchy of Controls (from most effective and desirable through to least effective and desirable) is as follows:

Elimination: Removing or otherwise eliminating the risk.

Substitution: Substituting the hazard that gives rise to the risk with a hazard that gives rise to a lesser risk.

Isolation: Isolating the hazard from the person(s) put at risk.

Design/engineering: Minimising the risk through engineering means.

Administrative: Minimising the risk through administrative means (for example, by providing appropriate training, or adopting safe work practices)

Personal Protective Equipment (PPE): Providing some type of personal barrier between the risk source and an individual (for example, protective eyewear, hi-visibility clothing, hearing protection etc.).

Usually a combination of measures will be the most effective approach. For example, PPE may be required in combination with other measures, such as engineering controls. Judgements must be made about the suitability and effectiveness of existing and proposed controls for reducing the risk.

The Nominated Risk Manager should consider all possible control options and select the combination that will produce the most effective and reasonable level of risk elimination or control.

4 Controls for Causal and Contributory Factors

"Causal & Contributory Factors" are the factors which alone ("causal" factor), or combined ("contributory" factor), could lead to the risk eventuating.

While applying an additional control may not reduce the overall Risk Level, it may address a specific causal or contributory factor that is otherwise not controlled, and therefore provide an additional level of protection against the possibility of the risk eventuating. This can be important when determining whether the risk is addressed SFAIRP.

During the risk assessment process, Bow Tie Analysis can provide an effective method of determining and demonstrating that identified causal and contributory factors have associated controls in place.

5 Suitability of Proposed Treatments

A proposed treatment needs to be assessed for its suitability under the circumstances. This involves whether the proposed treatment:

• Is effective in eliminating or minimising the likelihood and/or consequence of the risk; and

• Does not introduce new or higher risks; and

• Is available, technically suitable and practical to implement under the circumstances.

This includes considering the following:

• How effective would the additional and/or improved controls be?

Consider how available and suitable the controls are, the level of effort that is required to implement them, how much time is needed to deploy them, and any other relevant factors. Consider the effectiveness of individual controls, and how they will work together in combination.

• What would be the relative cost to implement the additional and/or improved controls?

Relative to the benefits likely to be provided by any new or improved controls, what are the relevant cost implications to implement the controls? Consider such costs as capital, maintenance, installation, commissioning, administration, training etc.

Further information on determining the suitability of controls is available in *Meaning of Duty to Ensure Safety So Far As Is Reasonably Practicable Guideline, Office of the National Safety Regulator,* issued December 2014*.*

6 Implications of Proposed Treatments

When considering potential treatments, consideration needs to be given to whether any new risks will arise from the additional controls, and/or whether effectiveness of other current controls will be negatively affected.

This can be an important factor in deciding whether to proceed with implementing the control. Where an additional control is possible, but negative implications have been identified, a careful decision has to be made regarding which risk may be higher.

7 Rejecting a Proposed Treatment

Demonstrating SFAIRP requires that all possible controls are considered, analysed and decisions made regarding whether to proceed with implementation.

It is essential that information regarding the decision to reject a proposed treatment is recorded. This includes:

- Why the proposed treatment was rejected;
- Reference to information / documents utilised in making the decision;
- Who made the decision to reject the proposed treatment;
- When the decision was made.

Rejected proposed treatments should be regularly reconsidered to see if any factors have changed since the decision has been made that may mean that implementation of the proposed treatment is now "reasonably practicable". This can include:

- An increase in likelihood or consequence of the risk, which may alter cost-benefit assessments;
- Reductions in cost for implementation;
- Technological changes which may mean implementation is now technically feasible;
- Increased expectations from stakeholders.

8 Removing a Control (Reverse SFAIRP)

On occasion, it may be appropriate to remove an existing control. Examples of where it may be appropriate to remove a control include:

- Where another control has been implemented that more effectively reduces risk, rendering the initial control irrelevant or unnecessary;
- Where it has been identified that an existing control is causing adverse effects, or increasing other risks;
- Where it has been identified that the relevant causal or contributory factors are no longer present, and the control is therefore no longer required.

Decisions to remove a control (either fully or partially) need to be carefully considered and all potential impacts assessed prior to removing the control. Items to consider during the decision making process include, but are not limited to:

- Is the control relevant to other risks, and if so, will these be adversely affected?

- Will the removal of the control potentially introduce other, new, risk sources (hazards), or reintroduce risks previously considered eliminated?

- If the control is removed, will the relevant causal and contributory factors have other appropriate controls in place?

- Will removal of the control mean that the residual risk is no longer eliminated or minimised SFAIRP?

Information regarding the decision to remove (or reduce) an existing control is to be recorded. This includes:

- Why the existing control was removed or reduced;

- Reference to information / documents utilised in making the decision;

- Who made the decision to remove or reduce the existing control;

- When the decision was made.