

# RISK ANALYSIS INSTRUMENT

Identifying and mitigating hazards is the first step in preventing a potential adverse event. As required by the NS OH&S Act, existing and potential hazards must be identified in the workplace. The Continuing Care Risk Analysis Instrument is intended to provide support in understanding the severity of impact and the probability of occurrence of these hazards.

**HAZARD** is a condition with the potential to cause personal injury or death, property damage, or operational degradation.

Although there are a wide variety of hazards, the most common categories are:

- Biological Safety: A disease-causing organism (e.g. animal bite, blood/bodily fluids, etc.)
- Communicable Diseases: Infectious diseases (e.g. airborne, transmitted through body fluids, etc.)
- Equipment Safety: Electrical equipment-shock hazard, equipment failure, etc.
- Fire Safety: Event of fire, fire alarms, smoke inhalation, use of fire extinguisher, etc.
- Situations & Interactions Safety: Lone worker safety, home visits, unsecured animals, unsecured weapons, workplace violence, threats, etc.
- Work-Related Travel Safety: Winter driving, isolated or remote locations, travelling alone, etc.

**RISK** is the possibility of an adverse event occurring and the potential consequence of that event. Risk is measured by objectively considering the probability and severity/consequence of an event.

**RISK MANAGEMENT** is the assessment, analysis and management of risks. Recognizing which events (hazards) may lead to harm in the future and minimizing their probability and severity/consequence.

---

When determining RISK, before identifying controls to put in place consider the following 3 steps:

**1. Identify the Hazard(s):**

When identifying a Hazard, consider these four perspectives: product/service provided, process, place/work environment, and people.

**2. Assess the Probability of Risk:**

Identify the severity and the probability of occurrence, determine the relative Risk and overall significance and prioritize the Hazards

**3. Risk Control and Management:**

Document your findings and proposed actions or controls. Identify controls that are currently in place and develop further actions in order to eliminate or reduce the risks where possible, e.g. safe work practices, personal protective equipment, training, administrative controls, eliminating / removing the risk where possible, etc.

# 1

## IDENTIFY THE HAZARD(S) AND DETERMINE THE SEVERITY

When a hazard is identified, determine the severity of impact by rating the consequence or effect of each hazard.

Ask yourself, is the severity of the risk:

**Negligible:** An event that, if it occurred, would not likely cause an injury, affect employee health or cause significant property damage. No impact to the facility or services provided.

**Marginal:** An event that, if it occurred, may cause non-serious injury or minor occupational illness, minor property damage with low repair cost or may cause brief interruption in service.

**Serious:** An event that, if it occurred, may lead to hospitalization or lost time from an injury that does not cause permanent disability or lead to severe occupational illness.

**Catastrophic:** An event that, if it occurred, would have extreme negative consequences that would result in severe injury, death, or an occupational illness that would seriously impact the staff or client's safety.

# 2

## ASSESS THE PROBABILITY OF RISK

Identify the likelihood that an incident will occur when exposed to a hazard, regardless of the risk level. Ask yourself, is the probability of the risk:

**Highly Unlikely:** Hazard will likely never happen.

**Rare:** Hazard will not likely happen, but MAY happen in the next several years.

**Occasional:** Hazard will likely happen sometime in the next year.

**Likely:** Hazard is likely to occur within the next month or next few months.

**Frequent:** Hazard is likely to occur either daily or several times a week.

(See **Rate the Risk** and **Risk Calculation** on page 3.)

# 3

## RISK CONTROL AND MANAGEMENT

After you have identified the calculated risk using the risk matrix (page 3), document your findings and proposed or implemented actions and controls, e.g. safe work practices, personal protective equipment, training, administrative controls, eliminating or removing the risk where possible, etc.

When implemented, these actions and controls will lower the risk rating.

## RATE THE RISK

After you have identified the severity and assessed the probability, determine the calculated risk using the matrix below. For example, a risk with a **marginal** severity rating and a **rare** occurrence would be considered a low risk. A risk with a **serious** severity rating and a **likely** occurrence would be considered a high risk, etc.

		SEVERITY OF IMPACT				
		Negligible	Marginal	Serious	Catastrophic	
		Risks would not likely cause an injury, affect employee health or cause property damage	May cause non-serious injury or minor occupational illness	An injury that does not cause permanent disability or lead to severe illness	May cause death or permanent disability	
PROBABILITY OF OCCURRENCE	Frequent	Hazard is likely to occur either daily or several times a week	Low Risk	High Risk	High Risk	High Risk
	Likely	Hazard is likely to occur within the next month or next few months	Low Risk	Medium Risk	High Risk	High Risk
	Occasional	Hazard will likely happen sometime in the next year	Low Risk	Medium Risk	Medium Risk	High Risk
	Rare	Hazard will not likely happen, but MAY happen in the next several years	Low Risk	Low Risk	Medium Risk	Medium Risk
	Highly Unlikely	Hazard will likely never happen	Low Risk	Low Risk	Low Risk	Low Risk

## RISK CALCULATION

**Low Risk:** Regular monitoring should be performed to ensure that the controls continue to be effective and there may still be actions that can be taken to further reduce risks.

**Medium Risk:** Consideration should be given as to whether the risks can be lowered to an acceptable level. Additional controls should be implemented as soon as possible and within a defined time period.

**High Risk:** Hazard is significant and triggers further investigations and controls. Take immediate action to eliminate or reduce the risk to acceptable levels. It may be necessary to stop the task until appropriate controls are in place.

### References:

*Risk Management Framework, Australian Capital Territory Education and Training, July 2005*  
*NHS National Patient Safety Agency, HealthCare Risk Assessment Made Easy Guide, 2007*  
*NSHA OHSMS Section 4: Hazard Identification, Risk Assessment and Risk Control, 2019*