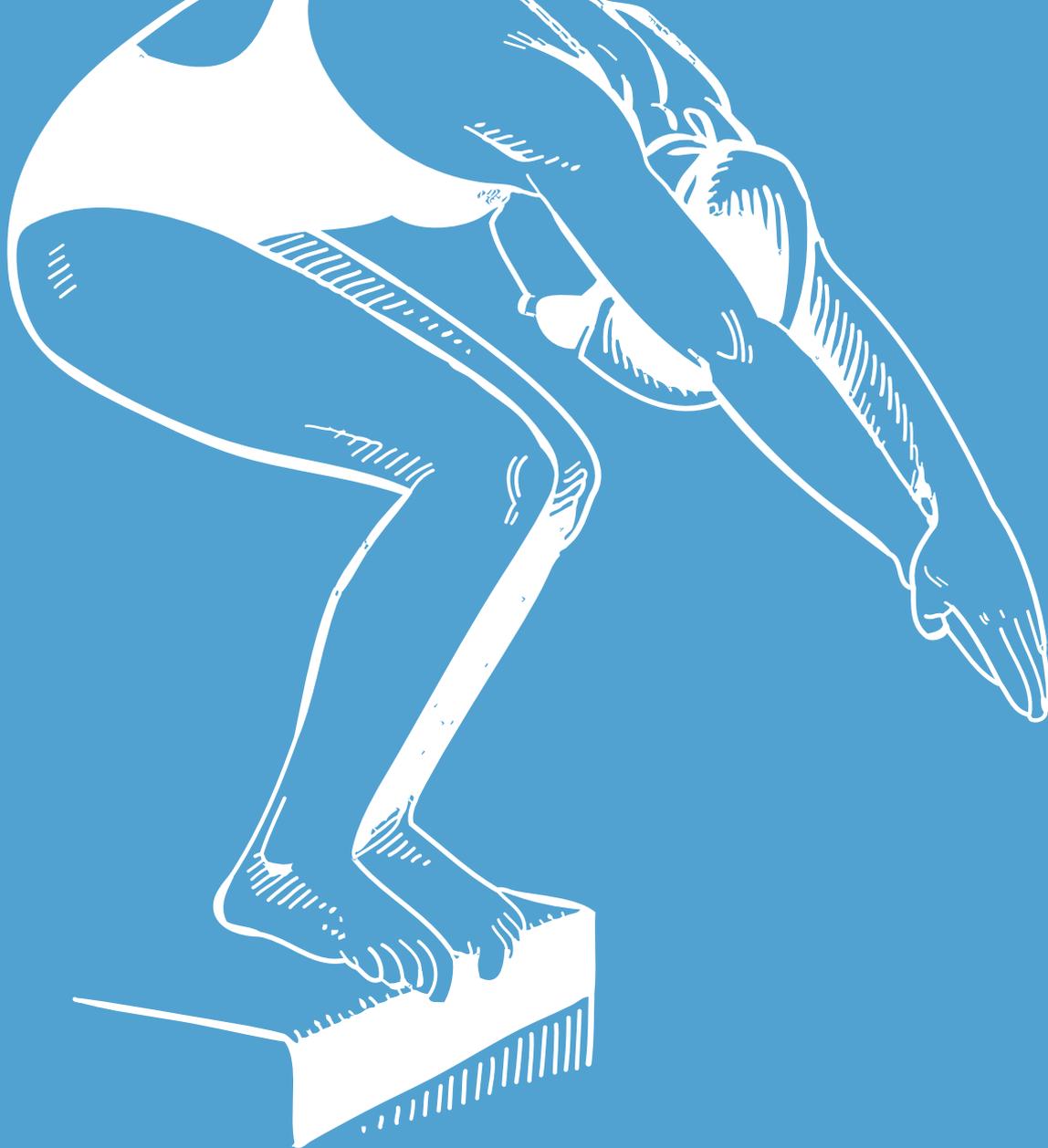


IMPLEMENTATION GUIDE FOR NSW
DEPARTMENT OF EDUCATION AND TRAINING
- PRINCIPALS AND CARNIVAL COORDINATORS

AQUATIC GUIDELINES

SAFE WATER ENTRY FOR COMPETITIONS – COMPETITIVE DIVE STARTS





REFERENCE GROUP

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- Gary Penfold - Aquatic and Recreation Institute / Warringah Council
- Michael Ilinsky - Royal Life Saving
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- Melissa Rickwood - AUSTRALIAN SWIMMING
- Selwyn Brown - NSW Department of Education and Training – St Clair High School
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FURTHER INFORMATION

NSW Department of Education and Training School Sports Unit, 322 Hume Highway, BANKSTOWN, NSW, 2200, telephone (02) 9707 6900

Royal Life Saving NSW, PO Box 8307, BAULKHAM HILLS BC NSW 2153 – telephone (02) 9634 3700

All support documents can be found at www.royalnsw.com.au

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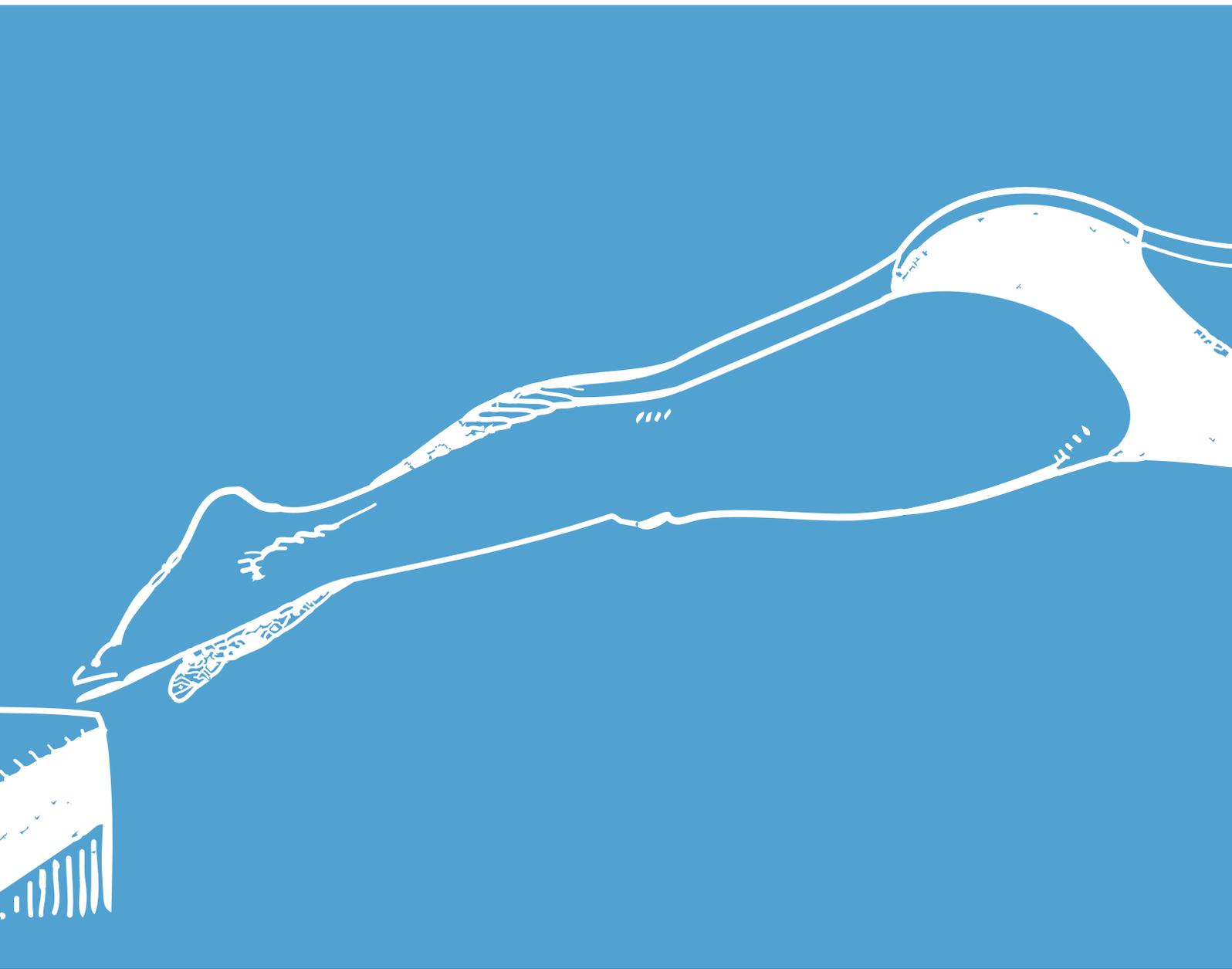
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There is a significant body of evidence to suggest that shallow water diving can lead to a range of injuries that include head injuries (broken teeth, scalp injuries and facial fractures) to the more significant spinal cord injury.



SECTION : 01

INTRODUCTION

There is a significant body of evidence to suggest that shallow water diving can lead to a range of injuries that include head injuries (broken teeth, scalp injuries and facial fractures) to the more significant spinal cord injury. Spinal cord injury is sudden and unexpected. It can be devastating and costly in human and social terms.

Each year in Australia, about 300 – 400 new incident cases occur. Water related events accounted for 10% (n=24) of persisting spinal cord injury cases reported during 2003-04 and 71% of these occurred to individuals under the age of 35 years. Ninety six percent (n=23) of water related spinal cord injury reported had injury to the cervical spinal segments, with 25% sustaining complete injury to the cord after diving into bodies of water without being aware of the depth. Twenty nine percent of the injuries (n=7) were related to surfing, 17% occurred in swimming pools and 38% were the result of diving into bodies of shallow water.

[Aquatic Guidelines – Safe Water Entry for Competitions – Competitive Dive Starts](#) has been developed in response to the Royal Life Saving Society Australia – Guidelines for Safe Pool Operation SU22 – Safe Water Entry for Competitions. Royal Life Saving Society Australia produced these Guidelines in 2006 as a result of a number of head and spinal injuries that had occurred during scheduled activities such as swimming carnivals and recreational swimming.

A competitive dive start is defined as entry into water from the side of the pool (flush or raised) or from a starting block for the purpose of starting a swimming based competition or training for a swimming based competition.

Diving is a common entry method for swimming carnival events. Diving into shallow water is a complex skill and is generally taught through structured education and training programs. Many competitors participating in swimming carnivals across NSW have not had the opportunity to undertake a progressive education program on diving.

[Aquatic Guidelines – Safe Water Entry for Competitions – Competitive Dive Starts](#) provide guidance to Principals and Swimming Carnival Coordinators on safe water entry for competitors during competition and training for competition and how to minimise the risk of injury associated with shallow water diving. Specifically the Guideline will:

- Provide Principals and Carnival Coordinators with information and processes to assist in determining what type of water entry is appropriate at the selected facility
- Outline the competitor induction training that is required prior to a swimming carnival
- Outline suggested swimming carnival announcements and facility induction procedures, especially in relation to diving in shallow water
- Provide suggested pre-event cautionary statements that reinforce appropriate diving protocols.

The statistical information above was sourced from: Cripps RA 2005. Spinal cord injury, Australia, 2003-04. Injury Research and Statistics Series Number 25. Adelaide AIHW (AIHW cat no. INJCAT77).

STEPS TO IMPLEMENT AQUATIC GUIDELINES-SAFE WATER ENTRY FOR COMPETITORS

There are three key steps in successfully implementing the Aquatic Guidelines. For the purposes of zone, region, or state based carnivals, step 3 should be implemented.

STEP 1.

ORGANISATION OF YOUR SWIMMING CARNIVAL

Principals should request a completed [Shallow Water Diving Information and Risk Assessment](#) form from the host aquatic facility.

The Shallow Water Diving Information and Risk Assessment form provides Principals and Carnival Coordinators with the following information:

PART 1: The [Water Depth](#) (in metres and centimetres) of the competition pool from both ends where entry may occur and a height (millimetres) measurement from water level to concourse or starting block. This information will then be applied to a Diving Depth Matrix by the facility operator (Appendix 3) to provide a “suggested entry” statement for Principals and Carnival Coordinators. The recommended diving depths outlined in the Diving Depth Matrix are based on the Royal Life Saving Australia Guideline SU 22 Safe Water Entry for Competitions.

The suggested entry statement will either identify:

1. [An in-water start recommendation](#) (based on the depth of the competition pool and concourse height the recommendation is to commence events in the water – no diving permissible).

2. [Competitive dive starts permitted](#) (based on the depth of the competition pool and concourse height a competitive dive start is permissible as long as additional steps in the Aquatic Guidelines are satisfied.)

Principals and Carnival Coordinators should then utilise the information in the Shallow Water Diving Information and Risk Assessment form and confirm the type of entry suitable for the swimming carnival.

Principals and Carnival Coordinators are reminded that “in-water” starts are a genuine option for carnivals with novice-swimmers. In-water starts significantly reduce the opportunity for a diving or spinal related injury.

PART 2: [Risk Identification, Assessment and Control Procedures](#) as compiled by the host aquatic facility. This section outlines the hazard description, current controls, likelihood details and consequence details together with a level of risk. This level of risk will be determined by utilising the Risk Management Matrix at Appendix 4.

This section will also identify key responsible people from the host aquatic facility and any actions that may be required.

Where schools undertake their own assessment or utilise an open water venue, the Shallow Water Diving Assessment templates (Appendix 1, 3 and 4) should be used.

SUPPORT DOCUMENTS:

[Appendix 1:](#) Shallow Water Diving Information and Risk Assessment

[Appendix 2:](#) Shallow Water Diving Information and Risk Assessment - SAMPLE

[Appendix 3:](#) Water Depth Matrix

[Appendix 4:](#) Risk Management Matrix

STEP 2.

IMPLEMENTATION OF SHALLOW WATER DIVING INDUCTION AND RECORDING OF STUDENT PARTICIPATION

Once a decision has been made on whether an in-water or competitive dive start will be required at the swimming carnival venue, it should be communicated to the competitors, staff, and officials.

Schools may take the opportunity to engage all their students in the Shallow Water Diving Induction. Alternatively, schools may choose to involve only those students nominating to participate in the school’s swimming carnival.

An appropriate person to facilitate the Induction program may include a qualified swimming coach, AUSTSWIM instructor or a Personal Development, Health and Physical Education teacher. Alternatively, principals may choose an appropriate staff member to facilitate the program. Key marshalling staff and officials should also participate in the Shallow Water Diving Induction to assist with its implementation.

It is recommended that Principals and Carnival Coordinators keep a record of student participation in the Shallow Water Diving Induction program. Participation may be recorded on class rolls. Alternatively, a participation register is attached at Appendix 5.

The Shallow Water Diving Induction program should be conducted each year immediately prior to the school swimming carnival. Information contained in the program may also be included in classroom learning activities relating to relevant sections of the K-6 and 7-10 Personal Development, Health and Physical Education syllabuses.

It is recommended that students who did not participate in the Shallow Water Diving Induction program and students new to the school who wish to enter events in the school swimming carnival, participate in a pre-event induction at the aquatic facility on the day of the carnival.

SHALLOW WATER DIVING INDUCTION PROGRAM:

AIM: To provide students participating in a swimming carnival with information relevant to the performance of a shallow water dive.

DURATION: 10 – 15 minute presentation and discussion. Competitors who receive regular coaching or participate in squad training may be exempt from this program on production of relevant certificates, letters or testimonials from their swim coach or instructor.

Resources supporting the implementation of the Shallow Water Diving Induction program is available online at: www.royalnsw.com.au

STEP 3.

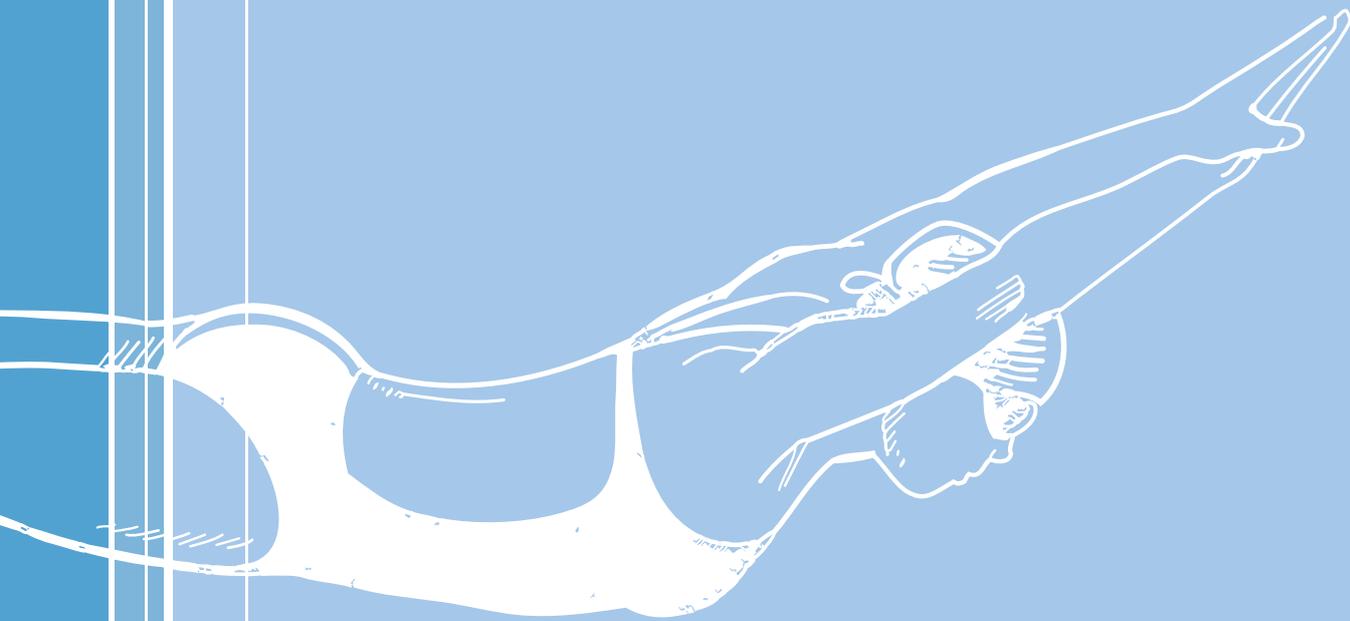
ANNOUNCEMENTS TO COMPETITORS AND OFFICIALS ON CARNIVAL DAY

It is important that competitors and officials are provided with important information concerning the carnival facility or venue prior to the first carnival event.

This induction activity, developed in collaboration with the facility management, should focus on risk management or control procedures relevant to the performance of a shallow water dive and any other safety related facility protocols, for example, evacuation policy. Announcements may be completed during pre-event roll-call or assembly.

Prior to each scheduled event, all competitors in that event should be warned that there are risks associated with shallow water diving and reminded of the Shallow Water Diving Induction program. The water depth at entry point should also be made clear to the competitors in each event. These announcements are particularly important if the event start is to commence from a [starting block or platform or in shallow water \(relay event\)](#). Pre-event statements can be made during the event marshalling process.

Suggested pre-event statements are included in [Appendix 6: Announcement Information](#).



SECTION : 02

SUPPORT DOCUMENTS

- Appendix 1: Shallow Water Diving Information and Risk Assessment
- Appendix 2: Shallow Water Diving Information and Risk Assessment – COMPLETED SAMPLE
- Appendix 3: Water Depth Matrix
- Appendix 4: Risk Management Matrix
- Appendix 5: Permission Note – Suggested Wording
- Appendix 7: Shallow Water Diving Induction Program – Participation Register
- Appendix 8: Announcement Information and Pre-event Statements (Marshalling Area)

APPENDIX 1 – SHALLOW WATER DIVING INFORMATION & RISK ASSESSMENT

ATTENTION: Principal and Carnival Coordinator

Please ensure you read and understand all PARTS to this document prior to signing and agreeing to terms and conditions.

PART 1 – WATER DEPTH

After consultation with Royal Life Saving NSW, the Aquatic and Recreation Institute and the NSW Department of Education and Training (DET) it has been deemed important that provide you with information on shallow water diving. This is particularly pertinent to relay events or other activities where diving in shallow water may be a scheduled carnival event or activity.

CARNIVAL POOL –			
DEEP END DEPTH (or location)	Metres	SHALLOW END DEPTH (or location)	Metres
Concourse / Starting Block height above water	mm	Concourse / Starting Block height above water	mm
OTHER INFORMATION			

SUGGESTED SAFE WATER ENTRY TECHNIQUE

Based on the Royal Life Saving Guidelines for Safe Pool Operation Guideline SU22 the following entry is suggested.

DEEP END (or location)		SHALLOW END(or location)	
OTHER INFORMATION If you undertake Competitive Dive starts please ensure appropriate induction, training and competitor announcements are undertaken in accordance with DET requirements.			

PART 2 - RISK IDENTIFICATION / ASSESSMENT / CONTROL

DATE	LOCATION		
IDENTIFICATION			
ASSESSORS			
WORK AREA			
HAZARD DESCRIPTION			
ASSESSMENT			
CURRENT CONTROLS			
LIKELIHOOD DETAILS			
CONSEQUENCE DETAILS			
LEVEL OF RISK			
PROPOSED CONTROLS			
			BY DATE
ELIMINATION			
SUBSTITUTION			
ENGINEERING			
ADMINISTRATION			
LIKELIHOOD DETAILS (After proposed controls implementation)			
CONSEQUENCE DETAILS (After proposed controls implementation)			
LEVEL OF RISK			
APPROVAL TO IMPLEMENT CONTROLS & RESPONSIBLE PERSON			
RESPONSIBLE PERSON	NAME	BY DATE	STATUS
ADDITIONAL ACTIONS TO BE TAKEN			

APPENDIX 2 – SHALLOW WATER DIVING INFORMATION & RISK ASSESSMENT (SAMPLE)

ATTENTION: Principal and Aquatic Carnival Coordinator

Please ensure you read and understand all PARTS to this document prior to signing and agreeing to terms and conditions.

PART 1 – WATER DEPTH

After consultation with Royal Life Saving NSW, the Aquatic and Recreation Institute and the NSW Department of Education and Training (DET) it has been deemed important that **WARINGAH AQUATIC CENTRE** provide you with information on shallow water diving. This is particularly pertinent to relay events or other activities where diving in shallow water may be a scheduled carnival event or activity.

CARNIVAL POOL –			
DEEP END DEPTH (or location)	1.8 Metres	SHALLOW END DEPTH (or location)	1.01 Metres
Concourse / Starting Block height above water	750 mm	Concourse / Starting Block height above water	300 mm
OTHER INFORMATION	If boom is to be utilised for entry please consult with Lifeguard staff		

SUGGESTED SAFE WATER ENTRY TECHNIQUE

Based on the Royal Life Saving Guidelines for Safe Pool Operation Guideline SU22 the following entry is suggested.

DEEP END (or location)	Copetitive Dive Start Permissible	SHALLOW END(or location)	Copetitive Dive Start Permissible
OTHER INFORMATION If you undertake Competitive Dive starts please ensure appropriate induction, training and competitor announcements are undertaken in accordance with DET requirements.			

PART 2 - RISK IDENTIFICATION / ASSESSMENT / CONTROL

DATE 12th May 2007	LOCATION 25 metre Carnival Pool (Shallow end)		
IDENTIFICATION			
ASSESSORS	(INSERT KEY STAFF UNDERTAKING RISK ASSESSMENT)		
WORK AREA	Shallow end		
HAZARD DESCRIPTION	Risk of steep dive into shallow end of pool causing possible head/neck injury		
ASSESSMENT			
CURRENT CONTROLS	Non-elite swimmers require clearance from Principal		
LIKELIHOOD DETAILS	Very likely – could happen at anytime		
CONSEQUENCE DETAILS	Permanent disability or ill health (possible death)		
	LEVEL OF RISK	1	
PROPOSED CONTROLS			
ELIMINATION		BY DATE	
SUBSTITUTION			
ENGINEERING			
ADMINISTRATION	Portable dive blocks are not offered for carnivals at shallow end. Basic carnivals are a deep end start	1st July 2007	
LIKELIHOOD DETAILS (After proposed controls implementation)	Very unlikely – could happen but probably never will		
CONSEQUENCE DETAILS (After proposed controls implementation)	Death or permanent disability or ill health		
	LEVEL OF RISK	3	

APPROVAL TO IMPLEMENT CONTROLS & RESPONSIBLE PERSON

RESPONSIBLE PERSON	NAME	BY DATE	STATUS
MANAGER/TEAM LEADER	(NAME OF MANAGER)	(INSERT DATE)	IMPLEMENTED

ADDITIONAL ACTIONS TO BE TAKEN D2 2.1 Terms & Conditions – shallow end pool depth is 1 metre-signage indicates no diving permitted. Hirers requesting the use of shallow end start to complete own risk assessment. D2 2.2 Inclusion of RLSSA "Guidelines for Safe Pool Operation" in terms and conditions.

APPENDIX 3 – DEPTH MATRIX

The following information is provided for schools who undertake their own water depth assessment. Please ensure you add depth details to Appendix 1 with a corresponding “SUGGESTED SAFE WATER ENTRY TECHNIQUE”.

DIVING DEPTH MATRIX

Water depths for starts for competition swimming and training (for trained competitors)

DEPTH	COMMENT	ENTRY
Less than 900mm	Dive starts should not be permitted	All events should be commenced in the water
900 – 1000mm	Concourse level to a maximum height above water of 200mm	Competitive dive starts may be permitted
	If concourse level greater than 200mm	In-water start
1000 – 1200mm	Concourse level to a maximum height above water of 400mm	Competitive dive starts may be permitted
	If concourse level greater than 400mm	In-water start
1200mm or greater	Maximum height of 750mm	Competitive dive starts may be permitted
	If greater then 750mm	In-water start

APPENDIX 4 - RISK MANAGEMENT MATRIX

The following information is provided for schools who undertake their own risk assessment. Please ensure you add appropriate details to Appendix 1 PART 2 RISK IDENTIFICATION / ASSESSMENT / CONTROL

A matrix can be used to give each individual risk a numerical rating, allowing the risks to be categorised according to severity. The first step is to determine the level of consequence (harm) should something happen. The second step is to determine how likely it is for something to happen.

CONSEQUENCE

Classify the category of the consequence using the following table: Table 1.

CATEGORY	CONSEQUENCE (HARM)	DESCRIPTION
1	Catastrophic	Fatalities
2	Major	Serious injury, such as permanent disability
3	Moderate	Medical treatment or lost time injury
4	Minor	Minor injury, such as first aid
5	Insignificant	No injury

LIKELIHOOD

Estimate how likely the consequence is to happen as a result of exposure to the hazard using the following table: Table 2.

CATEGORY	PROBABILITY	DESCRIPTION
A	Almost certain, common	Is expected to occur in most circumstances
B	Likely, has happened	Will probably occur in most circumstances
C	Possible, could happen	Might occur at some time
D	Unlikely, not likely	Could occur at some time
E	Rare, practically impossible	May occur only in exceptional circumstances

A risk score can be determined by cross referencing the potential consequence with the likelihood of the consequence being realised in the following table: Table 3.

LIKELIHOOD						CONSEQUENCE (HARM)
A	B	C	D	E		
1	2	4	7	11	1	
3	5	8	12	16	2	
6	9	13	17	20	3	
10	14	18	21	23	4	
15	19	22	24	25	5	

The risk score can provide a ranking that will give an indication of the priority and the qualitative level of risk and the need to take remedial action.

HIGH – immediate correction required. Consider discontinuing

MEDIUM – attention needed, correction required

LOW – perhaps acceptable as is

The level of acceptable risk varies with all hazards, the ways and available means of reducing risk and the skills and competencies of persons managing the risks.

APPENDIX 5: SHALLOW WATER DIVING INDUCTION PARTICIPATION REGISTER

SCHOOL		DATE OF INDUCTION	
TEACHER		CLASS	

STUDENT NAME	COMPLETION DATE
1	
2	
3	
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APPENDIX 6:

ANNOUNCEMENT INFORMATION

It is important that competitors and officials are provided with important information concerning the carnival facility or venue prior to the first carnival event. This induction activity, developed in collaboration with the facility management, should focus on risk management or control procedures relevant to the performance of a shallow water dive and any other safety related facility protocols, for example, evacuation policy. Announcements may be completed during pre-event roll-call or assembly.

The following information is suggested only. Principals and Carnival Coordinators should ensure all appropriate induction information is provided to competitors, officials and staff. This information is only relevant to shallow water diving.

“The water depth at this venue is (announce depth) metres at (deep end or entry point) and (announce depth) metres at (shallow end or entry point). All competitors – please ensure you enter the water appropriately and only when instructed.”

PRE-EVENT STATEMENTS

This information is only relevant to shallow water diving.

Prior to each scheduled event, all competitors in that event should be warned that there are risks associated with shallow water diving and reminded of the Shallow Water Diving Induction program. The water depth at entry point should also be made clear to the competitors in each event. These announcements are particularly important if the event start is to commence from a starting block or platform or in shallow water (relay event). Pre-event statements can be made during the event marshalling process.

The following statements should be read to competitors in the pre-marshalling area prior to each event commencement:

“The water you are diving into is _____ metres deep. Remember Lock hands, lock head, steer up for EVERY dive entry”

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www.royalnsw.com.au

