

Golf ball diving Risk Assessment

The purpose of a golf ball dive is to collect lost balls from ponds on a golf course. The ponds are usually shallow (max 5m deep) and tend to be quite silty. The golf balls are usually buried in the silt and are collected by kneeling on the bottom and finding the balls by touch alone. As a consequence, the underwater visibility is usually reduced to near zero once collection commences. In such conditions it is virtually impossible to read instruments without rising above the silt cloud, or to retain buddy contact. Some ponds contain weeds and occasional debris, but the risk of entrapment or injury from these causes is considered low. Due to these factors, the use of standard buddy diving procedures is not considered appropriate and nor is the use of a "buddy line" as this is more likely to be a cause of entrapment than a benefit, particularly in the low visibility. Golf ball dives will only be undertaken by divers who are BSAC Sports Divers, or equivalent, and above.

This document should be read by all divers taking part in golf ball dives organised by Totnes Sub-aqua Club, and will be made available to all club members via an annual distribution and on the club website.

It is the Dive Manager's responsibility to carry out a risk review prior to every dive, based on this generic risk assessment, plus consideration of prevailing conditions. If conditions change such as to be significantly different from those applying at the time the original assessment was undertaken, then the Dive Manager shall reassess the dive plan accordingly.

Hazards should be continuously monitored and the Dive Manager should be prepared to put any contingency plans into place at any point during the dive.



Standard Controls

It is the responsibility of each individual diver to undertake personal risk control measures as befits their level of training and experience and, if appropriate, the Dive Manager shall brief the divers on the risks associated with the dive.

As part of the risk control measures the Dive Manager shall ensure that there is an oxygen kit and first aid kit available (It will be acceptable for the oxygen kit to be left in the car park, provided this is within a reasonable distance of the pond being dived. The first aid kit and first aiders will be provided by the golf club, although the Dive Manager should confirm that this is the case if operating at an unfamiliar club).

Anyone managing a branch dive must obtain the Diving Officer's consent to the planned dive. On completion, the Diving Officer shall be advised of the safe return of all divers, or of any accidents or incidents, at the earliest opportunity.

Divers should ensure that their equipment is properly maintained and functional.

Divers to carry a knife/tool for cutting and DSMB for emergency signalling.

The Dive Manager shall ensure that there is a minimum of 2 divers plus shore cover at every pond being dived.

Dive manager/shore cover to signal divers to surface, check gas and signal all okay every 15 minutes during dive.

Dive manager/shore cover to monitor divers' bubbles as they break surface to look for signs of excessive gas consumption. If there is evidence of significant ly increased flow of bubbles other divers to be recalled and sent to investigate.

Shore cover to have a suitable means of signalling divers to check gas and of recalling divers, e.g. metal tube and hammer to create sound signal. All divers must be briefed on gas check signal and recall signal prior to entering the water.

No diver to enter/re-enter the water with less than 1000l of gas in their cylinder (i.e. min 100 bar in 10l cylinder).



Hazard:	Risk of:	Risk Evaluation:	Controls:	Immediate measures to deal with consequences if risk does occur:
Drowning	Serious injury/death of diver	Medium	All divers should be advised that the carrying of an independent alternative source (AS), such as a pony or twin-set, is recommended.	First Aid to be administered. Dive Manager (or shore cover) to contact emergency services, as required. Hospitalise.
Equipment failure	Serious injury to diver/death	Medium	Divers to perform a gear check before entering the water. Equipment to be well maintained and regularly serviced.	Diver to abort dive and return to surface.
Line, weed and other underwater obstructions	Panic, entrapment or entanglement, injury to diver, running out of air, serious injury to diver/death	Medium	Divers should aim to have their equipment streamlined and avoid dangling equipment as far as is possible. Divers must have diving tool/knife for cutting. Divers to return to surface at regular intervals to check in with surface cover.	Send up DSMB as signal if unable to free self. Dive Manager/shore cover to recall other divers and send to assist.
Heart attack	Death	Medium	Divers to complete medical self-declaration/referral to medical referee.	BLS to be instigated. Dive Manager (or shore cover) to contact emergency services. Hospitalise.
Running out of gas	Serious injury to diver/death	Medium	Divers to ensure they have adequate gas for the dive. All divers should be advised that the carrying of an independent alternative source (AS), such as a pony or twin-set, is recommended. No diver to enter/re-enter the water with less than 1000l of gas in their cylinder (i.e. min 100 bar in 10l cylinder). Dive manager/shore cover to signal divers to surface, check gas and signal all okay every 15 minutes during dive. Dive manager/shore cover to	Diver to use AS, abort dive and return to surface. If there is evidence of significant ly increased flow of bubbles other divers to be recalled and sent to investigate.



Hazard:	Risk of:	Risk Evaluation:	Controls:	Immediate measures to deal with consequences if risk does occur:
			monitor divers' bubbles as they break surface to look for signs of excessive gas consumption.	
Cold water	Regulator freezing/freeflow – injury to diver	Low	Divers to choose appropriate equipment for the environment. Equipment to be well maintained and regularly serviced. Avoid breathing from regulators on surface prior to dive and do not take regulator out of mouth during dive.	Diver to abort dive if necessary.
Cold water and/or wind chill	Hypothermia	Low	Divers to choose appropriate, well fitting exposure protection in good condition. Divers to be prepared to exit water early if cold.	First Aid to be administered. Dive Manager (or shore cover) to contact emergency services, as required. Hospitalise, as required.
Debris at entry/exit site or otherwise unsuitable	Injury to diver	Low	Dive Manager to consider whether divers can enter/exit water safely. Divers should only enter water if easy to do in full kit and exit is possible.	Divers to change method of entry or abort dive.
Golf buggies	Injury to diver/damage to equipment	Low	Drivers to ensure that they are familiar with operation of buggy (golf club staff will demonstrate controls if required) and should use access roads across course where possible and avoid going "off road" unless required to reach pond.	First Aid to be administered. Dive Manager (or shore cover) to contact emergency services, as required. Hospitalise, as required.
Golf balls in play	Injury to diver/shore cover	Low	Divers and shore cover to pay attention to surroundings and in particular to golfers playing on adjacent holes	First Aid to be administered. Dive Manager (or shore cover) to contact



Hazard:	Risk of:	Risk Evaluation:	Controls:	Immediate measures to deal with consequences if risk does occur:
				emergency services, as required. Hospitalise, as required.
Hot weather	Hyperthermia/sunburn	Low	Divers to take precautions against over-heating/sun. Divers to avoid dehydration.	First Aid to be administered. Dive Manager (or shore cover) to contact emergency services, as required. Hospitalise, as required.
Leptospirosis (Weil's disease)	Injury to diver	Low	Divers to try to avoid changing or purging regulators, or other activities that could cause water to be swallowed. Divers to avoid bringing broken skin into contact with water – the use of drysuits is recommended. Wash kit down thoroughly after diving.	If divers develop flu-like symptoms after exposure to water they should consult their GP.
Blue-Green Algae (Cyanobacteria)	Injury to diver	Low	If the water has a scum or bloom on the surface divers should not enter the water. Divers to try to avoid changing or purging regulators, or other activities that could cause water to be swallowed. Divers to avoid bringing broken skin into contact with water – the use of drysuits is recommended. Wash kit down thoroughly after diving.	If divers develop flu-like symptoms or gastroenteritis after exposure to water they should consult their GP.
Lifting bags of golf balls	Injury to diver	Low	If particularly heavy bag, diver to consider use of lifting bag attached to bag and requesting help from shore cover to assist in recovery.	First Aid to be administered.
Low visibility	Panic, injury to diver, running out of air, serious	Low	All divers to be Sports Diver or above and to be familiar with diving in low visibility.	Diver to abort dive if necessary.



Hazard:	Risk of:	Risk Evaluation:	Controls:	Immediate measures to deal with consequences if risk does occur:
	injury to diver/death			
Sharp objects	Injury to diver	Low	Divers to take care if they encounter debris and to avoid touching jagged/rusty edges of metal unless wearing gloves. Dive knives to be kept in sheath unless in use.	First Aid to be administered. Dive Manager (or shore cover) to contact emergency services, as required. Hospitalise, as required.
Trips, slips and falls	Injury to diver/damage to equipment	Low	Divers should exercise caution when carrying diving equipment. Divers not to put fins on feet until at or very near to water entry point - this must not involve divers being exposed to a risk of falling in without having fins on.	Remove casualty from danger and administer first aid. Hospitalise, as required.
Uncontrolled ascent	Serious injury to diver/death	Low	Divers should ensure they are properly weighted and capable of making a safe and controlled ascent, and that inflation and dump systems are working correctly.	Oxygen kit and trained O2 administrators on site. Diving monitored by shore cover able to provide/direct assistance.