

Seal Policy

Introduction

As early as 1827, Tasmania Governments recognised the devastation caused by failure to regulate the seal fishery. It has been estimated that the natural seal population around Tasmania was around 200,000 seals prior to the seal fishery commencing. When stocks began to recover in 1891, laws to provide a level of protection for the seal population were introduced, and have continued in force for over a century. The protection provided by legislation encouraged the seal populations to grow, and the growth trend continues. As at 2010 seal numbers are estimated at around 80,000. As with most other native fauna, seals no longer breed in all areas they occupied 200 years ago.

Seals are a protected species and Government policy is that no active intervention measures are proposed to facilitate population rebuilding.

The TARFish policy on seals is based on minimising interactions with seals and thus reducing the potential impacts to recreational fishers from such interactions.

Possible Solutions to Minimising Interactions.

In Tasmania fur seals (Australian and New Zealand fur seals) interact with recreational fishers on a regular basis. Anecdotal evidence suggests that this interaction is sporadic, opportunistic, but can be intense when it occurs. These interactions may result in, damage to gear, a loss of catch or the potential for injuries to occur to humans and seals. There are a number of different practices that can be employed by recreational fishers to minimise interactions with seals.

Approaching Fishing Location

If the intended fishing ground is a known seal area or fits the description of a preferred seal area, it is essential the following steps be taken to minimise the possibility of an interaction.

1. *NEW AND OCCASIONAL GROUNDS*

- If, after leaving the launching or mooring facility, it is necessary to round a boundary point, travel well to seaward before making the turn.
- Avoid travelling close to all shoreline and especially areas that have suitable seal resting or sunning positions.
- Throttle back well before fishing activities are commenced
- Avoid abrupt throttle applications.
- In the case of line fishing, consider leaving the engine at idle

2. *REGULAR GROUNDS AND COURSES*

If the operation involves regular trips and/or regular destinations, in addition to the above;

- On a daily basis, vary the course taken on leaving the ramp or mooring.
- Vary the direction from which the fishing ground is approached.
- On a daily basis, vary vessel cruising speed.

These three practises will lessen the likelihood of seals identifying the fishing activity as a regular food source.

During Fishing Activities

1. NOISE

- Keep noise to a minimum.
- Put matting or carpet on the deck of your boat
- Wrap rails and gunwales with carpet and tape or use a split piece of PVC pipe.
- Do not drop or throw bins and buckets and other equipment in the boat
- Land fish into a container of water or a well sound-proofed bin.
- Do not leave fish flapping on deck.
- Avoid aggressive throttle applications.

2. NOTHING OVER THE SIDE

- Food scraps, used bait and fish offal should not be discarded on fishing grounds.
- Catch can still be cleaned at sea, but do so well away from any fishing gear or fishing activity. Anything, edible or not, discarded over the side, will attract the attention of birds and birds will attract the attention of seals.

3. REGULAR INSPECTION

- Do not leave hooked, trapped or netted fish in the water any longer than is necessary.
- Establish the prime time for the target species and consider removing gear from the water entirely during the quiet periods.

If seal interactions continue, consider moving or even ceasing fishing for the day. Seal interactions in Tasmania are not significantly different from those in other States and countries that have seal populations.

It is normal for seals to 'swim through' an area rather than hang around, so the problem may go away fairly quickly. This is also a good strategy to minimise the link between fishing activity and food reward.

Reducing Seal Interactions

- **NEVER FEED SEALS!** Never use fish for a decoy or throw fish waste to seals. This is training them to link boats with an easy feed.
- Try to avoid areas where seals are known to interact with fishers and if a seal takes your fish move away.
- Keep noise to a minimum because seals have good hearing
- Seals are curious and may approach and potentially swamp vessels, so be alert and always observe marine safety rules.
- Remember, seals target fish not boats, so try to minimise your interactions with them.

Minimising interactions is underpinned by the fact that - If there is no reward in the form of food, the interaction will be reduced.

Appendix – Background Information.

Seal Species in Tasmania

The Australian Fur Seal

The Australian fur seal is the world's fourth rarest seal species. Hunted to the brink of extinction last century, it is now wholly protected. The Australian fur seal is found from the coast of NSW, down around Tasmania to Victoria and South Australia. It is the most common seal in Tasmanian waters and breeds on small isolated rocks in Bass Strait between October and January. Australian fur seals also haul-out at various rocky areas around the Tasmanian coastline, particularly outside the breeding season when seals disperse from the breeding colonies.

Adult male seals can grow to 200-225 cm and weigh 220 kg to 360 kg. Bull Seals, males, are usually dark grey/brown, with a mane of coarse hair on the neck and shoulders. Young seals of both sexes have grey-brown backs and yellowish belly fur. The dense coat is made of woolly underfur and long, coarse outer hairs to trap air which waterproofs and insulates the seal. Like all seals, they moult each year, replacing their old fur with new growth. A layer of fat assists with warmth and streamlining.

The Australian fur seal is an opportunistic predator, eating mainly fish, squid, octopus and cuttlefish. Of the nineteen fish species known to be consumed, Jack Mackerel, Redbait and Leatherjackets form the main prey items.

Australian fur seals breed on ten rocky Bass Strait islands, but because seals only come ashore to rest and breed, it is impossible to know exactly how many there are. Based on counts at the breeding colonies each year, scientists estimate there are about 5,000 pups born in Tasmanian waters each year. However, not all pups will survive to become adults. Pup mortality for most fur seal species is between 3 to 30%, however, storm induced mortality can be as high as 70%. This natural mortality continues throughout the life of the seal, but at a lower level than that of the pups. Seal mortality also occurs as a result of human activities such as deliberate persecution through shooting, fisheries bycatch and entanglement in plastic, non biodegradable materials. Males are highly mobile leaving Bass Strait at the end of the breeding season in January and returning to the haul-out colonies of Southern Tasmania.

The New Zealand Fur Seal

The New Zealand fur seal is found in West Australia, South Australia, Tasmania and New Zealand. This species is increasing rapidly throughout Australian waters. In Tasmanian waters it mainly occurs on the west and south coasts. Only a small number of New Zealand fur seals breed on remote islands off the south coast. The total population in Tasmania is estimated at 1000 to 1200. About 350 pups are born annually. Like the Australian fur seal, not all pups will survive.

The New Zealand fur seal's main prey includes Redbait and Jack Mackerel and Lanternfish species. Lanternfish are a deep water fish species prolific in the Southern Ocean. Unlike the Australian fur seal, the New Zealand fur seal also consumes seabirds such as Little Penguins and Shearwaters. Under normal circumstances it's very difficult to tell the difference between the Australian and the New Zealand fur seal. The New Zealand fur seal is slightly smaller than the Australian fur seal and are best distinguished by their much darker colouration.

Australian fur seals will clump together, New Zealand fur seals will not tend to clump together.

Legislative Protection

Australia's main piece of conservation legislation is the Environment Protection and Biodiversity Conservation Act 1999 (Australian Government) (the EPBC Act), which came into force on 16 July 2000. Under the EPBC Act all marine mammals occurring within Australian waters are listed 'Marine'. It is an offence to kill, injure, take, trade, keep, or move any member of a listed marine species on Australian Government land or in Commonwealth waters without a permit. In Tasmania, the corresponding piece of legislation is the Tasmanian Threatened Species Protection Act 1995. The New Zealand fur seal is listed as rare under the Tasmanian Threatened Species Protection Act 1995.

Seal Aggregations

Australian fur seals are highly mobile and in general, are encountered around the entire coastline of Tasmania. Seal numbers in a particular location may vary due to time of year, weather conditions, food availability and coastal geography. Whilst a group of seals congregating onshore is usually referred to as a 'haul-out colony', it doesn't necessarily follow that it is a 'breeding colony'. Seal numbers in inshore waters of Southern Tasmania increase in late winter and spring.

As recreational fishing activities can be vulnerable to seal interactions in areas of high seal populations, identifying these areas prior to commencing fishing is beneficial. It is not necessary to avoid coastal areas where seals are common, but an understanding of seal behaviour and some modification of fishing behaviour may lessen the impact of any interactions. Local knowledge should be sought where possible.

Seal Haul Outs

Small offshore islands and exposed reefs are the most favoured locations, but also look for large ledges at the base of high cliffs. There will be a gentle slope or a series of steps allowing for easy access to and from the site. The 'haul-out' will also face away from prevailing seas and swells for the area. Old and debilitated individuals and small groups often favour sections of shoreline with extensive gutters and waterways between boulders and rocky outcrops.

Breeding Colony

Seals come ashore each year and form breeding colonies. The adult males come ashore first and establish territories. Females congregate within these areas and are defended by the resident male often with considerable aggression towards the females and other males.

Food

Seals are highly mobile carnivores, meat eaters. The distribution of seals is dependent on where the food is. This will have a greater influence than local geographical features. Food preferences appear to be squid, redbait and mackerel, although, over 40 species of fish and over 10 cephalopod species have been identified as being eaten by seals. All of these species are seasonal in abundance. If preferred prey is unavailable, seals may target other species

including rock lobster when they are discarded from a fishing vessel. Sick and older seals may target easy prey. Fish trapped in gillnets, or on a hook, offer an easy meal. Areas subjected to strong tidal flow or currents provide a good source of food, especially if the location also offers some protection so that fish may feed from, without actually swimming in, the main stream. Prominent points that jut well out beyond the main coastline or those that are 'turning points' of the coastline provide a good food source, particularly when a submerged reef extends further to seaward.

Assume seals are present near;

- Strong current and tidal flows;
- Small islands and rocky outcrops;
- Prominent and 'boundary' points;
- Cliff faces with sheltered and accessible ledges.

Seals are highly mobile and may travel 60 to 80kms per day in their quest for food.

What Attracts Seals to Fishing Activity?

The following are attractive to seals, especially when associated with the reward of food.

- **Birds** - Any increased bird activity will attract the attention of seals. If birds are circling high in the air and diving or feeding on the surface, this activity can be seen over long distances. To avoid creating bird activity, do not clean fish during fishing activities or discard by-catch in areas where fishing occurs.
- **Noise** - Noise associated with fishing operations will attract seals when there is a link (for the seal) between the noise and the reward (i.e. fish). Noises to be aware of are motor noise, particularly alterations in speed and or revolutions and especially bursts of throttle, lines and particularly nets running out over metal decks and railings, any gear, including plastic buckets and bins dropped or tossed around the deck (this is a particular problem in aluminium dinghies) and fish fighting to free themselves from either a hook or a net.
- **Gear Markers** - Seals see shimmer, glare and major reflected light. They can distinguish between colours but their colour vision is not well developed. Seals see well in dimly lit situations e.g. underwater but have more difficulty seeing in air. Evidence suggests that coloured buoys and markers may play a role in attracting seals to fishing operations. The size, colour, number, reflectivity and contrast of buoys to the surroundings affect the seal's ability to locate the markers.
- **Frequently Fished Areas** - Seals learn by association. If they have consistently received food in a particular location, then they are more likely to return. Frequently fished areas offer a regular food source. If fishing occurs in, or close to one of these locations, then seals are more likely to be attracted to the operation.
- **Long Gear Deployment** - With particular reference to net fishing, the longer gear is left in the water with caught fish in the net (even non-target species), the more likely it is that a seal will find it. Once a seal has found this source of food, it begins to learn and over time will be increasingly difficult to exclude from a fishing activity.