

CSP Observer Programme – seabird return protocol options

Presentation to CSP TWG 7 March 2013

Background

Before 2009 the sole process in place to confirm the identification of bycaught seabirds collected by observers was through return of the body for necropsy. As well as confirming identification, a range of other information relevant to understanding the nature of the interactions was, and is, collected by the necropsy programme, including:

- injuries,
- body condition,
- stomach contents, and
- where possible, the likely cause of mortality.

In 2009/10 the use of photographic material was trialled as a means to obtain expert confirmation of identification, and was introduced formally as part of the CSP seabird identification project in 2010/11. When high quality photographs are available, expert confirmation of identification is often straight forward. Observer training has been developed to help achieve higher quality photographic outputs.

Identification from photographs represents a cost saving on returning birds for necropsy, though there is information loss as none of the other data collected by the necropsy project can be obtained.

With increasing observer coverage of offshore fisheries, aiming for full coverage, it is appropriate to reassess the cost-benefit position of the return protocols.

Options

Option 1: Status quo

Under this option all seabirds returned and all data collected.

Cost of seabird identification project likely to increase substantially due to higher number of seabirds return.

Option 2: First individual of each species on each trip returned, remainder photographed only

This option will continue to collect all data fields for at least some birds on all trips. Retaining the first bird of each species captured will allow trip by trip verification of adequacy of photographs as a basis for obtaining identification. Loss of information on factors other than identity for multiple capture situations.

Cost of identification project likely to achieve substantial savings compared to status quo.

Option 2a: For commonly bycaught species return first individual of each species on each trip returned and remainder photograph, for less commonly bycaught species return all birds

As option 2, but with additional benefit for less commonly caught species that full range of data is collected, which will help better understand the nature of interactions.

Cost saving will be less than option 2 but still a substantial saving on status quo as approximately 80% of bycaught birds currently returned are of the five most commonly caught species.

Option 3: For commonly bycaught species where observer is confident of identification take only photographs, return remaining seabirds.

This option will result in a less predictable rate and diversity of seabirds being return, and may scale over time more towards photos if identification confidence of observers increases, thus potentially losing capture of data other than identification confirmation.

Cost savings likely to be comparable to options 2 and 4, with potential for higher savings dependent on identification skill of observer.

Option 4: return seabirds only from a sample of trips, with photographs only from remaining trips

This option will result in a full, and representative sample of birds being returned. However, as many species are only rarely bycaught, the diversity of those being returned will correspondingly be lower as for some species the only captures will be on non-returning trips. Returned birds will continue to be dominated by the most commonly bycaught species.

Cost savings comparable to options 2 and 3.

This option could apply to only commonly bycaught species or to all seabirds.

Note: MPI observer services indicate that options involving trip-level sampling will be difficult to implement.

Process going forward

Feedback is sought from the group on which option provides the best cost-benefit trade-off, in order that the programme continues to collect information to help understand the nature and extent of seabird captures in New Zealand commercial fisheries, with particular regard to informing capture estimation and development of mitigation strategies. The chosen option will form the basis of the next seabird identification project contract period starting 1 July 2013, and will be formally consulted upon as part of the CSP Annual Plan 2013-14.