Salmon, Aquaculture and Seals Working Group Meeting No 17

November 11th 2016, RSPCA Headquarters, Southwater

Draft Meeting Notes

In attendance:	(SMRU –Cha	air),	Freedom Food),
(Seal Protection Action	n Group), (Ir	nternational Animal Resc	ue), (RSPCA),
Freedor	m Food), (B	Sorn Free Foundation),	(Sainsburys)
Joining the meeting by	/ Google Hangout :	(RSPCA),	(RSPCA)
Joining the meeting by	/ telephone:	(Scottish Natural He	ritage)
Apologies:	(Marine Scotland),	(Crown Estates)	(Scottish
Natural Heritage),	(Waitrose),	(Marine I	Harvest),
(Scottish Salmon Proc	ducers Organisation).		

1. Opening matters:

Introductions and housekeeping
The minutes from meeting 16 were approved

Actions arising from the previous meeting:

- 1. SN to find regional figures for PBR calculations and circulate to group *done*
- 2. SB to check dates the ADD system was changed at Sconser in 2015 did seal depredation cease once a new ADD system was installed or before, or after? The report was that there was no difference with the new ADD.
- 3. SB to circulate PDF of MHS presentation **Done**.
- SB to take suggestions for further analysis of shooting incidents back to MHS No comments were received.
- JC/CB to organise meeting with FF members to address seal concerns contact had been made with the companies, but more on an individual basis than through a formal meeting.
- 6. AC to circulate a copy of presentation, report and link to the videos done
- 7. AO to circulate his own timeline on startle response device *it was not really clear what this actually meant.*
- 8. SN to make enquiries about the state of developments on the startle device within the University of St Andrews there still seems to be a lot of obfuscation associated with this device, which the group felt was very frustrating.
- 9. SN to approach Knox nets and/or other net manufacturers to try to build on previous studies examining net deformation by seals in captivity this is a continuing action and has not yet been addressed.
- 10. SN to consult with group on suitable dates later, and with JC about venue availability done.

2. Latest Seal Shooting Figures

AO reported that the trend for shooting seals was still going down in aquaculture whereas the wild fisheries number still exceeded those which had been shot in aquaculture, in spite of the ban on netting. **SN** stated that it would be interesting to see the overall effect of the netting ban over time. The number of seals shot in aquaculture fell by 61% in the first two quarters of 2016, compared to the previous year.

AO stated that the number of seals shot in the Moray Firth were still going up, and it was a puzzle as to why this was. It was also asked whether the number of seals shot on Freedom Food farms was accurate. **MJ** replied that the trend in shootings on FF farms would not drop in a linear fashion, but rather there would likely be unaccounted for 'ups' as well as 'downs'.

One of the key questions is why are the numbers being shot tending to plateau and also why do some sites contribute significantly to the totals? To date we can only speculate. **JA** reminded everyone that after a FF site has shot a seal, it must conduct a review as to why the seal was shot. Part of the review would be to find out why it happened and put a plan in place to stop it happening again.

MJ mentioned in response to **AO** that **MH** could possibly be shooting more at some sites because of greater awareness.

3. Welfare Implications of Seal shooting paper

AO spoke to the paper on the Seal Licensing system and its effect on seal welfare by Nunny et al., of which there were a number of points of concern. It was found during the study that relatively few seals were being recovered for necropsy; some seals were not being shot cleanly and some that were shot were lactating. All of these were potentially serious welfare issues. There was great concern that even those animals that were recovered, were often not picked up by the authorities. It was decided to write to Marine Scotland on behalf of the group to express concern about this matter.

During the discussion and the concern over the welfare issues which had come to light, it was decided to look other countries, in relation to whether they had a close season when seals were not to be shot.

4. Update from Marine Harvest

Some slides were shown from **MH** showing cumulative biomass loss of salmon over the years, and it was interesting to see that more fish were lost in 2016, than in previous years. Previously, it was seen that the main problem was being experienced at square cage sites, but now the two sites with the biggest problem had circular cages. The discussion identified that a hotspot could be down to the damage caused by a single seal. A point was made regarding whether it was acceptable/practical of having a potential threshold of fish being injured or killed, beyond which it would be allowed to resort to lethal methods. This was deemed to be an unacceptable proposal, because of the site specific nature of the issue.

Checking for ADDs functioning properly was also discussed within this context, and it was suggested that checking that they were working properly was not quite as easy as at once thought. It may be possible to hear them working, but more intensive scrutiny was required. It was felt that more help/engagement from the manufacturers was needed to help to address this issue. Further detail about noted below in Agenda item 7.

AO stated that previous research priorities have identified the need for forensic interrogation of problem sites. A hotspot could be defined either as a site where several seals have been shot or a site where a lot of damage had been done by seals, but where no shooting has taken place.

5. Update from FF/RSPCA

ER opened the discussion about the questionnaire, which would become a requirement in future editions of the RSPCA welfare standards. At present it was going through the testing phase, and it was still early days.

AD thought that the questionnaire was excellent, but felt that not all of the required site information may always be available, but it was a useful tool which may be used as part of further detailed

investigation. **IM** mentioned that it may be useful to initially concentrate on principle components analysis, as a practical way of looking at the information. AO posited that if the questionnaire was answered truthfully, would this not put the site into an immediate state of non-conformance with the standards?

ER said that we need this information, and that there was some merit in pursuing it, as it will help us to build up certain behavioural trends and patterns. AO stated that it would be useful to build up a picture of what was going right, as well as with what was going wrong. There was a discussion about the merits and demerits of various net systems.

IM said that the site at Sconser was using a fully enclosed anti-predator net and they also have new HDPE anti-predator nets ready to install. The question of by-catch is always prevalent in discussions about whether to use them. The group felt that it would be useful to know whether the licensing scheme had seen any effect on the number of seals being shot, as a result of anti-predator nets being deployed. Are there any realistic correlations to be harvested from the information that the scheme was accruing? It was felt that the licensing scheme should be required to record type and numbers of by-catch, if any, being caught.

AO questioned the practical sense of how a last resort could develop, and how to identify the seal doing the attacking. The question was asked as to whether the stomach contents of the seal might be useful in helping to identify the animals doing the attacking. **MJ** said that there were stories of seals working together – would this precipitate a multiple shooting? Does the way that the marksman is remunerated affect the number of seals that are shot?

6. Seal Trapping for translocation

SMRU have been developing a seal trap for Common seals. In order to trap live seals, a raft of legislation would have to be addressed. Other logistical issues would also need to be addressed, such as identifying the right seal, and also how many times do you allow the seal to return to the original site?

The group felt that this issue had to move forward. One producer was prepared to try it out with the help of SMRU. Also **AK** said that BDMLR had around 3000 volunteers who could also help if called upon to do so. To help maximise the potential efficacy of the method of trapping live animals, it could be placed at a site which has been experiencing problems with seal attacks.

It was proposed that a subgroup be established to move this issue forward. This would consist of SMRU, Alan Knight, Andy Ottaway, Marine Harvest and someone from the RSPCA Wildlife department/Animal Centre. It was felt that there should be a meeting in January 2017 to discuss matters in more detail.

7. ADD update

Caroline from **SNH** stated that they had done some crude modelling on ADD use which showed that in areas of heavy use, they could be barriers to the Harbour Porpoise.

Since the last meeting, a Masters project done at St Andrews showed that ADD usage had increased over time, and that the ADD signal could be detected for up to 30 km from the source. However, **SNH** were still not looking at having a blanket ban on ADDs, and had a meeting coming up at the end of the year with **SSPO**. It was felt that it would be useful for **SNH** to have a discussion with RSPCA in relation to their standards and the use of ADDs. Smarter technology needs to be looked at, rather than just leaving ADDs on all of the time. **JA** mentioned that some sites were reluctant to use ADDs because of the prohibition by **SNH**, but this was revealed to be not wholly true, as a statutory ban did not exist as such.

AD and **SB** had met with ADD manufacturers with a view to find out what they were doing/proposing to do to prove that their equipment was 'fit for purpose' and to try and understand their philosophy behind the maintenance packages that they were, or were not offering. The companies appeared to have different views about when to use their equipment.

Terecos recommended to turn on the equipment when a seal is viewed within the vicinity of a site, but gave no advice about site configuration; **Gaelforce** (who were, or had taken over Mohn Aqua, Terecos? and Airmar) also said that as soon as you see a seal in the vicinity, turn the equipment on. They are actively seeking feedback from the industry and agree that they should be providing a piece of equipment that could be used on a day to day basis to test the efficacy of the kit. **Ace Aquatec** provided a site configuration plan, and recommended a low noise rate when in use. Remote monitoring is available and they were/are replacing batteries with more efficient transducers. They are developing a sonar based system which will be triggered by the seal approaching the site. They were also trying an electrical netting system.

In the general discussion on how the companies demonstrate the efficacy of their equipment, it was concluded that just assuming that it was working properly was not sufficient. Some of them felt that having a day to day testing device would not be cost effective. Consensus amongst the group was that this was not good enough, because the assumption that the equipment was working when it actually was not working, could result in seals being shot.

The question was asked about the acoustic effect on the salmon of ADD equipment, but **SN** said that there was no evidence to show of any adverse effects on them from their use.

8. Future Work Plans

The mechanics of university funding was discussed. A number of principles were explored in relation to whether the charitable members of the group could facilitate/lead future research projects, as it may be the most efficient way to pursue such projects in terms of economics.

AO stated that some form of analysis of the data that Marine Scotland had accrued since the start of the licensing system should be a priority.

SN mentioned that computer modelling of nets could be a possibility, as could taste aversion in terms of impregnated nets.

Other useful pointers for future work were included in his accompanying paper submitted by **AO**. These included getting cameras onto sites which were having problems with seal attacks to try and find out what was actually happening.

MJ asked whether whether who presented at the last meeting could be deployed to analyse the seal shooting information.

SN mentioned that **UFAW** had a call-out at the moment, and that this may be a source of funding for a seal related project.

The meeting closed at approx 3.00 p.m. It was proposed that the next meeting would be in April 2017 and that the venue would be in Leith at Marine Scotland.

Action Points from the meeting

- 1. The chair (**SN**) on behalf of the Group to contact St Andrew's University to ascertain whether there is a sunset clause for the startle device. The fact that the equipment is not being used for the purpose for which it was designed is of great concern.
- **2. AO** to contact the venture capitalist to ascertain what their plans are with the startle device. To date, everything appears to come to nothing.
- **3. ER** to circulate the Questionnaire to the group after the RSPCA standards meeting in December.
- 4. SN to write to Marine Scotland to express the concern of the Group in relation to the non-recovery of seal carcase's after a shooting has taken place. Within the licence application, the Group also felt that the recording of by-catch should be a requirement where anti-predator nets were being deployed.
- **5. All** members to find out whether other countries have a close season, where seals are not shot.
- 6. JA to send RSPCA wildlife contacts to SN
- SNH to discuss the content of the RSPCA welfare standards in relation to the use of ADDs
- **8.** The sub-group to start to develop the live seal capture project.