

NWIFCA Annual Meeting

14 June 2013: 10.30 a.m.

**AGENDA
ITEM NO.
12**

SCIENCE REPORT

8TH MARCH – 24TH MAY 2013

GENERAL

SURVEY AND FISHERIES WORK

Solway Estuary

Science officers and IFCO Burdekin carried out a familiarisation inspection with IFCO Erik Thinnesen from Dubmill Point to Silloth. The historic mussel beds have been covered over with sand and there is little evidence of a 2013 settlement. The fieldwork was useful in informing discussion with Natural England over the EMS review work in the Solway as there was again no evidence of *Sabellaria alveolata* reef within the EMS. An extensive reef was however found at Dubmill Point (outside the EMS boundary).

Science officers returned on 26th April to survey this very healthy *Sabellaria alveolata* reef. Please see Annex A for further details.

Silloth Mussels

Cumbria SFC previously managed the size mussel fishery in the Silloth Channel through permitting dredges under Byelaw with restrictions on size of vessel and engine size, in consultation with Natural England. The fishery was considered ephemeral (ie intermittent and regularly destroyed by weather or tidal currents). It has never been closed and has always been self-regulating. Fishing is requested from the NWIFCA when significant numbers of mussels start appearing in shrimp nets and the industry consider there could be an economically viable stock present. Up to 13 permits have been issued in the past and boats generally landed up to 10 tonnes per day (when stocks permitted) for the live market.

Following interest from the industry to fish size mussel from a sub-tidal bed in the Silloth Channel, Solway Firth in autumn 2012, the Senior Scientist and crew of Solway Protector surveyed the area previously known to hold stocks of mussel from time to time using a small dredge.

There were 25 stations with a reasonable percentage of large (> 60mm) clean mussel that looked to hold a good meat yield. However, overall the abundance and distribution of the mussel was patchy and not thought to hold enough to support a commercial fishery. There was no undersize mussel (<45mm) in any of the hauls, possibly due to the size of the mesh. These results were passed on to the local industry and the decision was taken then that no further action was required because the fishery was unlikely to be viable.

Officers at the Whitehaven office have recently received a request to permit a dredge fishery of size mussel this year at Silloth. The situation has changed somewhat in relation to the Defra Review of Fisheries Management in EMS. This fishery is located entirely within the boundary of the Solway Firth Special Area of Conservation, and the sub-tidal boulder and cobble reef on which the mussels will settle has been identified as a Red Risk feature and is included in the proposed byelaw for protection of EMS features. As such, the Authority is required to carry out a Habitats Regulations Assessment with advice from Natural England before authorising harvesting by dredge of size mussel.

There are logistical problems with being able to carry out this survey work. There were concerns that the derrick on the stern of the Solway Protector was not safe for use with a small dredge, and hence during the annual slippage to affect the necessary maintenance, repairs and repainting, the derrick was removed from the vessel. The alternative is an underwater camera system but visibility is often poor in this area. Officers are approaching the industry to assess whether there is scope to work in partnership in carrying out the survey. Until such time as this can be resolved and a full survey to assess the stock has been carried out, an HRA cannot be completed.

Shore Crab Collection - Dubmill Point to Beckfoot Flats

IFCO Erik Thinnesen has drawn the Science Team's attention to the growing concerns of the shore crab fishery. There has been a longstanding shore crab fishery there, un-regulated except when Fishery Officers check to see if Brown Crab have been collected along with shore crab. Locals have been voicing their concerns now for a number of years about the growing number of gatherers coming over from the North East of England to gather this species.

At times there have been recordings of up to 50 people in an area from Dubmill Point to Beckfoot Flats for weeks at a time. Although this may not seem a great deal of people there are only a limited number of rocks to gather from. Local gatherers have historically waited till the crabs moult and go soft before harvesting and only take the larger ones. Any individuals with eggs are put back. They usually mark a rock with a lump of sand on top to signal that this rock has been harvested. Crabs are usually then sold / used as bait.

Unfortunately this is not the way the visiting gatherers work. They take everything: soft, hard, big, small, eggs or no eggs. There appears to be no concern that this might be causing local anxiety or worse a decline in numbers of shore crab.

IFCO Thinnesen considers that the latter is taking place. This year to date the shore crabs have failed to show in great numbers (they move to deeper water – up to 60m depths – during the winter). In other years they usually return to these beaches between March and July. It is possible that the weather has caused them to be late.

The locals have voiced concerns that this is an unregulated fishery. They would like to see an introduction of a permit to gather scheme, seasonal closure, bag limits, and a permit condition to return small and egg bearing crabs to their habitats. IFCO Thinnesen considers these concerns to be justified and reports that he has seen the amount of crabs the visitors take away with them, once witnessing a wheelie bin being pushed up the beach full of shore crabs. There is substantial money involved: 75p per crab is normal but at times this may increase to £1.50 per crab.

Cumbria SFC carried out a literature review of Shore Crab in 1992 due to concerns about the level of fishing. Recommendations were made at that time to carry out annual surveys for population and length / frequency and to consider setting a minimum landing size of 1.6cm (size at maturity according to the report produced).

IFCOs initially thought that the people from the North East of England harvesting shore crab in the North West were displaced by NEIFCA and Northumberland IFCA regulations. However, officers from both IFCA's report that they have no byelaw regulations for shore crab fishing. There are voluntary codes of conducts for each Estuary in the NE IFCA District.

NEIFCA, Northumberland IFCA and Southern IFCA all plan to assess the level of this activity in their districts and the impact it is having. This will also be required for on-going EMS so there may be scope for joint IFCA work which the IFCA Technical Advisory Group could be asked to develop.

Southern IFCA is proposing to introduce a byelaw to prohibit shore crab collection by hand in seagrass beds under the EMS review work. They have looked at regulation by other IFCA's and found that there is little management of crab tiling anywhere. Landowners have the legal right to

remove crab shelters from their land since fishermen require landowner permission to place crab tiles although this may not be enforced. There is a code of conduct for this activity in the River Teign and a Devon and Severn IFCA 2008 byelaw prohibiting collection of shore crab from stipulated areas.

In order to progress NWIFCA work on this issue the CEO has tasked IFCOs Moulton and Burdekin to collect quantitative data and engage with gatherers. The work will be overseen by the Senior Scientist.

Cumbria Shore Survey

Ms Leadbeater attended with Dr Jane Lancaster to learn the methods used on these long-standing surveys. It subsequently became known to officers that Dr Lancaster will be unable to continue with these surveys after 2013. This was discussed at TSB on 17th May as reported on under Agenda item 8.

Foulnaze Cockle Survey and Fishery Planning

A report on the most recent cockle survey on Foulnaze was delivered to the 19th April NWIFCA meeting. It was decided not to open the fishery in May in response to the consultation undertaken with fisher stakeholders. A further survey will be carried out on suitable tides in late June and a decision made on opening once the stock assessment has been carried out. Ideally the other cockle beds within the Ribble Estuary will be surveyed at the same time in order to assess the Ribble stock as a whole.

Morecambe Bay Cockle Beds

Officers receive regular reports from IFCOs on recruitment and spat settlement and will organise full stock assessment surveys as and when settlement is reported, which is usually from July onwards.

Morecambe Bay Mussel Beds

Heysham Flat

A walk over inspection was carried out on 29th April. An extensive mussel settlement has occurred over the skear, so there is the potential for a hand-gathered seed mussel fishery later in the year, subject to further survey and Habitats Regulations Assessment. As part of our partnership work with Cumbria Wildlife Trust Marine Graduates scheme, we will train them and they will assist science officers in carrying out a full survey of both mussel and *Sabellaria alveolata* on the skear.

The inspection showed that there has been an enormous change to the physical make-up of the area. There had previously been a relatively deep channel (Dallam Dyke) at the south-west end of the main skear with a tributary running round the southern edge. The smaller skears that extend like islands out to the south-west (Knott End skear, Little Out skear, Great Out skear and Bank Side skear) were covered in sand. Now the southern channel has sanded up, Dallam Dyke is only inches deep on low water and the vast sandbank on Knott End skear has washed off and revealed very clean cobble and pebble bare substrate. An outfall running over the beach from Heysham village and previously buried (although originally built on stancheons so in the past sand levels had been lower) has now been revealed and is actually causing an obstruction to anglers launching their boats (pers comm. local anglers). The *Sabellaria alveolata* on Heysham, Flat is flourishing and increasing its extent. This may be a result of the increased sand in the water column. Officers envisage a further battle between mussel spat and honeycomb worm this year and will endeavour to record developments.

Officers tracked the entire skear area on 23rd May to assist the mapping of MPA byelaw box as agreed at TSB.

Foulney mussels

A full survey of the outer skear where fishing has been focused was carried out on 25th April. Survey results and a full report on the management of the Foulney mussels is covered under a separate agenda item.

South America seed mussel

Due to logistical problems in accessing the South America bed using NWIFCA boats, officers took part in helicopter flights over the north Morecambe Bay mussel beds on suitable tides in April and May chartered by operators. Early indications are that there has been another good settlement on these beds and officers will endeavour to carry out fieldwork on foot to gain more data on the stock and to check for Chinese Mitten Crab. As occurs regularly there is an extensive aggregation of Common Starfish on the beds holding the greatest density of newly settled spat. These beds also consist of 2012 mussel which has persisted over winter. It is possible the starfish will wipe out the stock in these areas as has been recorded in the past.

Discussions and correspondence with the seed mussel dredge industry have taken place where the NWIFCA has proposed introducing a charge for the issuing of authorisations to dredge for seed this year as an interim measure until the Hybrid Fishery Order is granted, whereby a licence fee and a tonnage (of harvested seed mussel) will be levied. The fee proposed is in line with that proposed in the Order which is based on vessel length. Some more thought needs to be given to the charges for boats that may only transport the fished stock and not be used for fishing itself as was the case last year.

Dee Estuary

Hilbre Island *Sabellaria alveolata* reef inspection

Carried out on 29th May – verbal report to be given to Authority by Mr Lindop.

West Kirby Mussels Inspection

Carried out on 30th May – verbal report to be given to Authority by Mr Lindop.

PROJECT WORK

EUROPEAN MARINE SITES – REVIEW OF FISHERIES MANAGEMENT

Ms Leadbeater has been leading on this substantial area of work with support from other officers. It has involved a 'site specific' meeting with Natural England officers where issues around individual red risk sites, the proposed byelaw and buffer zones were discussed. All three Science officers and the Enforcement Director attended a 2 day training course in Newcastle on the carrying out of assessments of impacts of fisheries activities within EMS, with colleagues from the MMO, Northumberland and North Eastern IFCAs. It was encouraging to see that two of the NWIFCA's Habitats Regulations Assessments (South America seed mussel and Ribble (Foulnaze) cockle fisheries) were used as case studies, as many IFCAs have never carried out these kind of assessments before. Officers have also been involved in various conference calls with the national team.

This is on-going work over the next 3.5 years that we estimate is taking around 65% of one officer's work-time plus input from others when required. It has a significant effect on the work that the Science team are able to complete.

COCKLE TRANSPLANT STUDY

A verbal report was given to the April meeting and further details are given here.

All consents for the transplant study required from landowners had been obtained and the Habitats Regulations Assessment (HRA) completed. The monitoring plan had been agreed with the operators to be conducted by Matt Meadows under advice from the Science Team. This would include before, during and after transplant surveying of fished, relay and control areas, a very labour intensive task. The project was ready to go but the operators were seeking financial support in order to free them up from normal work to carry out the study. Officers had supported them in submitting a bid for funding to the Fisheries Challenge Fund administered by the MMO. All communications between operators and MMO had stressed the urgency of the funding decision in relation to the timing of the work and potential for cockle spat mortality. The application was due to go before the funding panel on 5th March. Information on the MMO website included a section advising interested parties that there would be no funding rounds in 2013/14. However, the detailed guidance was not updated accordingly and contradicted this highlighting that projects must complete by December 2013.

On 7th March the operators found out that the funding had been withdrawn. The explanation given by the MMO was that the pot of money left in the Fisheries Challenge Fund had been ring-fenced for the 2012-13 financial year and had to be spent by end of March and that they were not going to roll any over to next financial year. At a senior level the decision was made that if projects were only going to the panel at the beginning of March then this was not achievable. Obviously they had not thought about projects like the cockle transplant study where the majority of the physical work and use of machinery would have been completed by the end of March.

Officers and the operators were informed that there might be a possibility of bringing some projects through to EFF funding but the MMO had to have to look at whether projects would fit the funding criteria for this. There is a specific section on pilot projects. MMO advised that a separate application would have to be submitted but they would try to make it as easy as possible for applicants.

The way the decision was taken to withdraw the funding appears hasty and ill-considered. In light of this Matthew Meadows sent a letter to the Fisheries Minister clearly stating all the issues of concern. They received a letter back from Defra (copy available from Senior Scientist to Members' on request) which offered an apology but did not explain why the decision had been taken.

The operators have recently been contacted by the MMO with guidance and an application form for EFF funding, but no further offer of help in completing it. This funding stream requires match funding which will be difficult to find. The opportunity to exploit the dense spat settlement on the North Penfold bed has been lost and any permissions and consents were time limited and would need to be secured again. A further HRA would need to be conducted for any future work.

SUSTAINABLE FISHERIES REVIEW

Sustainability Studentship

A meeting is planned between Senior Scientist, Prof Frid and Sophia Kochalski to review the work to date and plan for the next stage.

Project Inshore

The Stage 2 draft report has been circulated to IFCA's and responses invited. There were a number of errors and queries that we have raised with the Project Inshore team in terms of their assessment of cockle and mussel fisheries management in the District and we are awaiting their response to our comments.

MORECAMBE BAY HYBRID FISHERY ORDER

The Morecambe Bay Fishery Order officer met with Defra officials on 9th April to progress our application. A second draft Statutory Instrument has been received and further discussion is on-going in order to finalise the Order wording and content.

A meeting has been arranged with the agent for Boughton Estate to discuss their specific issue. Natural England officers will also attend.

Officers met with representatives of MSFOMA (Menai Strait Fishery Order Management Association) on 16th May to discuss queries they had regarding the Order and its progress, and management of north Morecambe Bay seed mussel fishery. An invitation has been extended to other seed mussel dredge operators to meet with them should they so wish but to date there has been no indication that this is required. It is now necessary to draft an 'Allocation Procedure' based on track record for seed mussel dredge licences (as has been done for hand-gathering licences) which, when completed, will be circulated to Members for comment and approval before going out to operators for consultation.

WILDLIFE TRUST MARINE GRADUATES SCHEME

The 2012 – 13 group of Marine Graduates has now ended and we are just awaiting finalised reports from two of the placements — 'The Incidence of Pearling in the Blue Mussel' (a literature review) and the full *Sabellaria alveolata* survey report. Officers have recently devoted time to supervising and advising on the write-up of these two projects.

A meeting also took place to round off this year's graduate's work and to plan for the next intake who begin on June 10th. We will then begin training them again and carrying out cockle, mussel and *Sabellaria* surveys. There will also be the opportunity to invite some of the four new graduates to carry out further project work for the benefit of the NWIFCA.

The NWIFCA's partnership work with the Wildlife Trust Marine Graduate scheme has recently been strengthened as they are in the process of applying for further funding through the Heritage Lottery Fund for a joint Marine and Coastal Heritage Project, between Cumbria Wildlife Trust, The Wildlife Trust for Lancashire, Manchester and North Merseyside and North Western Inshore Fisheries Conservation Authority.

MEDIN

A metadata record for the mussel stock surveys conducted in the Solway between 1998 and 2009 has been uploaded to the MEDIN portal. Work continues to input records for other NWIFCA data sets but is low priority in comparison to other work streams.

RAZOR CLAM FISHERY DEVELOPMENT

An application made to the Cefas Fisheries Science Partnership fund by the NFFO in relation to this project has been successful and is currently out to tender (FSP 38 Sustainable Razor Clam Fishing). This small project will aid in understanding the operation of an electro-dredge and its use in fishing for Razor Clams. However, when discussed at the TSB meeting there was concern that this project would not provide the information required for the Authority to make an informed decision about the sustainability and management of such a fishery but that industry would expect positive outcomes from this work. There was also greater concern at the lack of communication of Cefas with the NWIFCA in the development of this project. Assurances have been sought to ensure that NWIFCA has a substantial input into the project and the type of data collected in the future. The Chairman has written a letter to Cefas highlighting these concerns and requesting an urgent meeting.

AUTHORISATIONS AND CONSULTATIONS

Barrow Long Sea Outfall – United Utilities repositioning of pipeline to avoid damage to seagrass beds

Nethertown Railway - Sea Defences

MEETINGS, WORKSHOPS AND COURSES ATTENDED

FLOWW in London

Shellfish Liaison Group Meeting

Solway Partnership Working Group

RSPB – Sandy HQ – Fisheries Training Session with CEO

RSPB – Lancaster

Morecambe Bay Partnership AGM

Wyre Borough Council – Rossall Sea Defence Strategy with local angling reps.

Towing training – two officers, one day

First Aid course – one officer, one day

National Grid North West Coast Connections Consultation

TSB Meeting – 17th May.

Irish Sea Maritime Forum – Annual Conference – 21st May

A science officer attended the annual meeting of the Irish Sea Maritime Forum in Glasgow, of which the NWIFCA is a member of the steering committee. The meeting involved representations from each administration with management responsibilities for the Irish Sea (except the Republic of Ireland, who gave apologies), giving an update on the progress and design of marine planning in their countries. There were also presentations on the Draft EU Directive on Marine Spatial Planning and outlining the future direction of the Forum. Key initiatives for the Forum over the next year are to appoint a Chair, form a working group related to Irish Sea implications of the draft MSP directive, continue to be a place for stakeholder collaboration in the Irish Sea, particularly over trans-boundary issues, and an access hub for collation of Irish Sea research and reports.

COMMUNICATIONS

Two meetings were held in the couple of weeks prior to the Annual Meeting - a verbal report will be given by the Communications Officer:

- A meeting was held with shrimp fishers in the Solway to discuss the implications of the EMS Exclusion Zones on their fishing.
- A meeting was held with Foulney Twist mussel fishing stakeholders to discuss future management options.

Science Officers
28th May 2013

Sabellaria alveolata mapping, Dubmill Point, 26/04/13

