

# Shetland Marine Planning Partnership Newsletter

Supporting clean, healthy, safe and productive seas in Shetland



Since completion of our Regional Marine Plan consultation, we have been awaiting an updated Marine Direction from Marine Scotland before we could progress to adoption. We are now pleased to announce the Shetland Marine Direction has been updated to reflect the change from NAFC Marine Centre UHI to UHI Shetland, which took place in August 2021. This occurred due to the merger of NAFC Marine Centre UHI, Shetland College UHI and Train Shetland to become UHI Shetland. The Direction gives UHI Shetland and the SIC powers to form a marine planning partnership to develop a marine plan which covers Shetland's inshore waters (out to 12nm). This means we can now ask Minsters to adopt the Shetland Islands Regional Marine Plan (SIRMP), and then move to the implementation stage. While we have been awaiting the updated Direction we have been working on a draft Implementation Plan which details how we will implement the SIRMP, monitor its impact, and continue to fill data gaps. This will be launched, hopefully in Autumn 2022, once the SIRMP is adopted.

This newsletter also contains information on a range of projects which have continued to be developed by, or in association with, the Shetland Marine Planning Partnership or UHI Shetland, relevant to marine planning. We hope you enjoy reading about these projects.

#### Rachel Shucksmith Marine Spatial Planning Manager Shetland UHI



Simon Pallant
Coastal Zone
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#### In this issue...

#### Marine Planning News-

- New staff member joins UHI Shetland
- Diverse Values project
- PhD success

#### **Reports and Publications-**

- Sullom Voe Area Masterplan
- Protected species ID guide
- Novel behaviour in killer whales observed

#### Shetland Community Wildlife Group



#### News-

- Successful mussel bed survey
- How drones are becoming an important tool in species and habitat surveys
- Visit from WDC's Northern Isles Shorewatch Steering Group.
- Upcoming events

#### **Invasive Non-native Species**

- INNS week round-up
- Focus species -Didemnum vexillum

#### **Native Species**

- Focus species- Flapper Skate
- Eggcase hunting
- Skatespotter project

#### **Projects of Interest...**

 Scottish pelagic fishers and scientists working together

#### **Marine Planning News**

#### New team member

Mika Schroder has joined the Marine Planning Team at Shetland UHI as a post-doc researcher on the Diverse Marine Values project.

Mika's background in environmental law and governance, with particular focus environmental justice. She has a keen interest in inclusive governance and processes for ensuring that diverse relationships, knowledges and perspectives can help shape decision-making in environmental governance.

Prior to joining the team in Shetland, Mika completed PhD at Strathclyde Uni, where she looked at whether and how local actor participation at international biodiversity negotiations enabled those processes to embrace and accommodate local perspectives.

When not working she can often be found outside climbing, running, swimming or cycling, often accompanied by her pup Kai.



Welcome Mika!

#### **Diverse Values Project is up and running**

Following a successful scoping trip existing governance can be adapted to in March, Dr Victoria Leslie from take better account of diverse values the University of Portsmouth, Dr in policy and management decisions. Peter Richardson from the Marine A particular focus is on creative arts-Conservation Society and Mika Schroder based approaches (often excluded from the University of the Highlands from marine policy contexts), including and Islands will begin their fieldwork filmed interviews, digital stories and in Shetland using filmed interviews to theatre, to help capture community elicit community-held marine values. It is one of the creative methods exchange. The filmed interviews will used on the Diverse Marine Values project, a collaboration between UHI Shetland, the University of Portsmouth and others. The project aims to Erika Hughes-will facilitate deliberative, determine how local communities across its three test sites, Shetland, Portsmouth and the Severn Estuary, value marine environments and how

voices and engender dialogue and contribute to a documentary film which along with the other creative outputs led by work package lead Dr community engagements later in the project. The project is funded by UKRI under the Sustainable Management of Marine Resources programme.





#### L'HI SHETLAND

#### **Congratulations Inne!**

Withouck successfully Inne has defended her PhD thesis titled 'The siting of renewable energy developments in a crowded marine space'. Her viva examiners Professor Tavis Potts, Director of the Centre for Energy Transition, University of Aberdeen, and Dr Rosalind Bryce Director of the Centre for Mountain Studies, Perth College UHI, commended Inne on a 'fantastic piece of work'.

Inne was funded via the Bryden Centre and supervised by Rachel Shucksmith and Beth Mouat of UHI Shetland, Paul Tett (SAMS) and John Doran (Letterkenny Institute).

Inne will be taking up a new appointment in Belgium in August and we wish her all the best for the future.





#### **Reports and Publications**

#### **Sullom Voe Harbour Area** Masterplan published

Sullom Voe Harbour Area Masterplan was adopted by Shetland Islands Council as non-statutory planning guidance in spring 2022. Having the status of adopted nonstatutory planning guidance means that it will be a material consideration in planning decisions that are taken by the Council's Planning Service for marine planning (aquaculture) and works licence applications.

Purpose of the Masterplan & Potential Development Zones- The Masterplan provides a clear picture of opportunities and constraints to guide future development within the Sullom Voe Harbour Area.

It identifies a number of 'Potential Development Zones' which could suit a range of uses including aquaculture, seaweed farming and renewable energy development. The Masterplan can be viewed on the Council's website here or by going to:

https://www.shetland.gov.uk/coastalmarine-planning/sullom-voe-harbour-areamasterplan/1

**Crown Estate Scotland - Pilot Leasing** Project- The Masterplan also forms a key part of the Council's and Crown Estate Scotland's local management pilot scheme for the Sullom Voe Harbour Area. It will be used to help guide a Council run local leasing round of sea bed assets for developments.

Work on the pilot and leasing rounds is being led by the Council's Assets, Commissioning and Procurement service and it is anticipated that the leasing round will go live soon.

Pre-Application Advice- If you are considering to apply for the future leasing round it is recommended that you first obtain pre-application advice from the Council's Coastal and Marine Planning Team to help support your application for a lease.

If you have any queries on the Masterplan or wish to discuss your development proposals then please contact:

marine.planning@shetland.gov.uk

#### New guide for swimmers, snorkellers and divers

We have recently launched a new A recent observation of killer whales guide aimed at wild swimmers, snorkellers and divers to help them identify and report marine species of high importance.

included as they are either rare, provide a vital habitat for other marine species or provide an important function such as storing carbon, stabilising sediments or maintaining water quality.

To be able to monitor and record these species we need to have accurate and up-to-date information on their distribution around Shetland. This information is used by the marine spatial planning team at UHI Shetland to create maps which are used by developers, policy makers and local decision makers.



#### U'HI SHETLAND



**GUIDE TO IDENTIFYING AND** REPORTING IMPORTANT MARINE LIFE IN SHETLAND

FOR SWIMMERS, SNORKELLERS AND **DIVERS** 

To download a copy of the guide and to find out more information scan the QR code to head to the Shetland Community WIldlife Group website.



#### Novel behaviour in killer whales reported in new publication

hunting a harbour seal, which sought refuge within the lines of a Shetland mussel farm, has been published in the latest issue (48.4) of Aquatic Mammals. All the species in the guide have been Emily Hague, a PhD researcher based at Heriot-Watt University, worked with one of Shetland's local commercial drone operators Nick McCaffrey to write up the novel observation, whilst UHI Shetland's Dr Rachel Shucksmith, provided insight into the mussel farm structures and observation, helping contextualise the encounter.

> The observation provides a unique and fascinating example of top marine apex predators 'living with' anthropogenic structures. Whilst our knowledge of marine mammal interactions with fin-fish aquaculture is perhaps more evolved (e.g. ADDs, seal scarers, competition for fish), to date little has been published on marine mammal interactions with shellfish aquaculture. The described interaction shows the 27s group of killer whales following the seal up and down the mussel farm lines, observing and spyhopping it, and then only actually capturing it when the seal left the safety of the mussel lines and headed into open water. This observation of the predator-prey behaviour incorporating man-made structures provides an opportunity to consider how marine mammals may be 'living with' human activities, and how the Anthropocene may be changing predator-prey landscapes (for example, more hiding places for prey, or more places for predators to search for prey). The full article is available open access at: <a href="https://doi.org/10.1578/">https://doi.org/10.1578/</a> AM.48.4.2022.380 Or email Emily Hague at elh2001@hw.ac.uk



#### **Invasive Non-native Species**

#### **INNS** week round-up

This May UHI Shetland and the Community Wildlife Group took part in Invasive Non-native Species Week, a national campaign to raise awareness of the issues invasive species can cause and of the work being done around the UK to research and prevent impacts from the spread of these species.

At UHI Shetland we organised public events in Burravoe and Scalloway showcasing the monitoring we do as part of Shetland's Biosecurity Plan. Community Wildlife Group members and the public came to see our monitoring panels and discovered the native and non-native fouling species living on the pontoons, including mussels, sponges and sea-squirts and the non-native bryozoan Schizoporella

The work at UHI Shetland was also featured on a video about Scottish monitoring of non-natives created by Marine Scotland.

As part of INNS week, we also featured daily blogs including some from guest writers at Shetland Amenity Trust and the Biosecurity for LIFE project, which can be found on the SCWG website.

#### www.shetlandcommunitywildlife.org/ inns-week/



#### Focus species -Didemnum vexillum Carpet Sea-squirt

species not yet found in Shetland, but other areas. it is useful to know about it to help stop Didemnum vexillum is now found in it getting here!

A type of colonial sea-squirt, it can and Wales, and recently arrived in form these long drippy structures which have led to it occasionally being called 'snotty...'. It has a leathery feel to touch, and ranges in colour from cream to orange with darker veins or channels.

It can carpet and overgrow other at seabed organisms and smother them, website here. but also extensively fouls man-made structures. This can cause issues especially if there are vulnerable or important species such as natural reefs made by maerl, mussels or oysters. It can also cause issues for aquaculture as it can overgrow equipment and stock.

This is why it's really important to make sure that gear and materials (including snorkeling or diving gear, or boats) are checked, cleaned using freshwater and dried, especially if people have been using gear elsewhere and returning

Didemnum vexillum is a non-native to Shetland, or visiting Shetland from

parts of mainland Scotland, England Norway. Trials have been attempted to keep it under control, but this is really hard as it can regrow and spread

really easily once it has been introduced. More information can be found Marine Scotland's





#### **Upcoming surveys**

This year the marine planning team at a technique called a rapid assessment UHI Shetland will be surveying a wider range of sites to monitor the extent of surveyors looking for a short-list of non-native species establishment. The target species, as well as our usual team first conducted a baseline nonnative survey starting in 2012, so it which grow on our monitoring panels. will be interesting to find out what has changed over the last 10 years. We use

#### **Download our INNS guide**

Download our INNS identification guide here or scan the QR code and help us monitor and limit the impact from INNS in Shetland.

We also have range of resources to help marine users minimise the spread

of INNS on the marine planning pages of the UHI Shetland website. scan the QR code or click here.



survey, which involves trained annual collection of fouling species

#### Get in touch

For more information on marine invasives and biosecurity or to send us your records, email Becky on

marineplan.shetland@uhi.ac.uk

**Becky Giesler** Marine Planning Officer **UHI Shetland** 



#### **Important Marine Species and Habitats**

#### **Focus species- Flapper Skate**

Flapper skate (*Dipturus intermedius*) are the largest skates in UK waters, reaching lengths of over 2m (6') and weights of over 100kg (222lbs). They prefer deep (100m+) muddy habitats where they eat prawns and other skates and small sharks.

They have been categorised as Critically Endangered by the IUCN and described as extinct in large parts of their range. However, they occur in significant numbers in Shetland and Orkney and off the west coast of Scotland and have recently begun to show signs of recovery throughout its range.

Flapper skate take over 10 years to reach sexual maturity and produce low numbers of offspring and therefore the population will be slow to recover from any impacts. Their eggs are large and have a tough outer coat which protects the embryo during development. Young emerge from the eggs after ~18months at around 25cm in length.

#### **Great Eggcase Hunt**

Many of the shark and skate species around Shetland produce eggcases each with a single embryo inside. Once the young have hatched, the eggcases wash up on beaches and can be found in the strandline.

Currently, we have very limited knowlede on the species present around Shetland but the distribution of eggcases is a great indicator of the species breeding around our coast.

Each species produces an eggcase with a slightly different design and by using the ID guide provided by the Shark Trust as part of their Great Eggcase Hunt you can identify and report the species you have found.

The Shark Trust and ourselves share data from this project so your records will not only be helping us further understand the species and distribution of sharks and skates around Shetland but also contribute to national conservation efforts.









## Discover Shetland's Sharks and Skates event

To find out more about these projects come along to the Ness Boating Club on Sun 31st July for our Discover Shetland's Sharks and Skates event. We will have an eggcase workshop to help you identify and report your eggcase finds, interactive displays, crafts and games.



#### Skatespotter

The Skatespotter Project lead by Jane Dodd from NatureScot in collaboration with Steven Benjamins, from the Scottish Association for Marine Science (SAMS) are using unique body markers on flapper skate to identified individuals from photographs, allowing them to gain new insights into these critically endangered fish.

Skatespotter have been building an online database of flapper skate photos submitted by charter skippers and anglers from areas around Argyll,



Shetland and Orkney.

They have noticed that so far Shetland skate are a bit more spotty than Argyll skate. Most Shetland skate have very symmetrical patterns of spots or whorls on the wings made up of small spots on a background of very small spots whereas Argyll skate usually have a simple symmetrical pattern of large spots on a plain background. On a couple of Shetland skate the spots have spread creating a complex pattern of lines and squiggles.



More information on the project and how to submit skate photos can be found on the Skatespotter website here or by scanning the QR code.







#### **Shetland Community Wildlife Group News**

#### Successful blue mussel bed survey

On a damp Wednesday afternoon, A mussel bed is characterised by having Becky and myself joined forces with a couple of Shetland CWG volunteers and headed to the beach. Our task was to carry out a mapping survey of an intertidal mussel bed on the historic records of a bed, but no data on the size or exact location, which is important if we want to monitor how these important habitats.

common along the shoreline growing on rocks in the intertidal zone, but in only a few places do they form beds.

such a high density of mussels growing together that they form their own structure, and provide an important habitat for other species such as crabs, periwinkles and limpets.

beach at Nesbister where we have The data collected shows the bed occupying an area about 35m long and stretches from 1m above the tide line down into the subtidal zone, big the bed is changing and to help protect enough to be recognised as a distinct habitat. The density of the mussels Blue mussels (Mytilus edulis) are fairly fades out around the edges of the bed, but in some places covers 100% of the area, with mussel shells forming a solid matrix.



#### Get in touch

We would love to hear from anyone who would like to get involved in the group or has ideas for projects or leaflets that would be beneficial. So please get in touch.

outlook.com



### Kate Allan

SCWG Coordinator

# shetlandcommunitywildlife@

# shetlandcommunitywildlife.org

Scan the QR code to go to the SCWG website

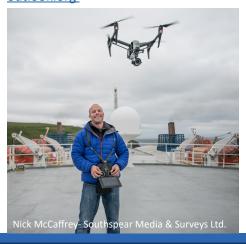
#### Using drones to survey species and habitats

Drones are becoming an increasingly important tool for marine researchers. As shown in the newly published article focusing on observations of novel killer whale behaviour by Emily Hague (pg 2), drones can be used to observe behaviour of large species such as cetaceans. Commercial drone operators Nick McCaffrey and Richard Shucksmith have been helping us on our porpoise survey project by providing drone footage for analysis. This is allowing us a rare insight into porpoise behaviour that cannot be observed from shore surveys.

We have also been utilising drones to help survey wider marine habitats such as seagrass beds, an important, yet now scarce, habitat in Shetland. By droning over historical records we are able to

map the extent of the bed and even calculate the density and condition.

If you are a drone pilot and would like to assist with our survey projects we would love to hear from you. Please shetlandcommunitywildlife@ email outlook.org



To get in touch please contact the Marine Planning Team at UHI Shetland Phone: 01595 772000 Website: www.shetland.uhi.ac.uk Email: marineplan.shetland@uhi.ac.uk

#### **Shetland Community Wildlife Group News**

#### **UHI Shetland play host to WDC Shorewatch Northern Isles Steering Group**

We were delighted to welcome the WDC Shorewatch northern isles steering group members to Shetland at the end of May. The Shetland Community Wildlife Group and UHI Shetland currently sit on the steering group as we work closely together to promote cetacean monitoring and recording in Shetland.

It was great to meet all the steering group members in person and it gave us an opportunity to show off some of Shetland's amazing scenery and wildlife.

We are looking forward to the next inperson meeting planned for Orkney next year.

More Information about Shorewatch can be found <u>here</u> or scan the QR code







#### **Upcoming Events**



Thurs 21st July 12pm-3pm

**Peerie Pollinators** find out why pollinators are so important with Shetland Amenity Trust Lerwick Flower Park

Sun 31st July

**Discover Shetland's Sharks and Skate** 

10.30am-1.30pm Ness Boating Club and Beach

Mon 8th Aug

**Magical Moths** with Shetland Amenity Trust Shetland Crofthouse Museum, Boddam

Fri 12th Aug

10am-2pm

10am-1pm

**Wonderful Woodlands** with Shetland Amenity Trust. Brae Community Woodland and Hall

Sun 21st Aug 1pm-4pm **Wildlife Drop-ins** meet nature experts around various locations in the South Mainland

Waders autumn migration at Pool of Virkie • Cetacean spotting at Scord Beach • Birdwatching from new Loch of Spiggie hide • Look for cetaceans and seabirds at Sumburgh Head • Investigate intertidal rock pools at Leebitton

To find out more scan the QR code to look at the event website www.shetlandcommunitywildlife.org











#### **Cunningsburgh Show**

We will be at the Cunningsburgh Show this year which is taking place on Wednesday 10th August. We will have lots of info on the new Shetland Islands Regional Marine Plan and the Shetland Community Wildlife Group. So pop along for a chat and find out how you can get involved in monitoring and recording species and habitats in Shetland.



#### **WDC** shorewatch visit

Emma Steel, the Northern Isles Shorewatch coordinater for Whale and Dolphin Conservation will be up in Shetland for a visit in August and will be out and about at the Shetland Shorewatch sites for lots of cetacean surveys. WDC shorewatch data is shared with the Shetland MPP and helps inform regional planning in the isles.

If you would like to get involved in the shorewatch programme email Emma on northernisles@shorewatch.org



#### **Projects of Interest**

## Scottish pelagic fishers and scientists working together...

Following a successful pilot scheme, Shetland UHI (SUHI) has secured funding for the continuation of its role in the Scottish Pelagic Industry Data Collection Programme. The pilot scheme was established in partnership with the Scottish Pelagic Fishermen's Association (SPFA), and the Marine Scotland directorate of the Scottish Government, under the wider EU PANDORA project. Between 2018 and 2021 the pilot scheme developed methods for sampling and data collection onboard Scottish pelagic fishing vessels, with vessel crews playing a key role. The aim was to supply high quality data to the International Council for the Exploration of the Sea (ICES), who carry out the stock assessments that inform fishery management. Seven pelagic fishing vessels initially took part, with numbers growing to almost all (20 of 21) of Scotland's pelagic fishing vessels voluntarily, participating including local Shetland boats and those on the mainland. In 2022, the pilot scheme transitioned to a fully established long-term programme, with data from samples collected by vessel crews



going toward stock assessment. The programme has commitment from the SPFA and Marine Scotland, and funding support from industry. This innovative collaboration is an excellent example of how industry and scientists can work together. To carry on the work started within the pilot scheme and to develop the pelagic workstream at SUHI, Dr Katie Brigden has taken up a new post as Pelagic Fisheries Scientist.

More information is available by email <a href="mailto:katie.brigden@uhi.ac.uk">katie.brigden@uhi.ac.uk</a> or <a href="mailto:online">online</a>



#### **Further Information**

This newsletter has been produced by UHI Shetland on behalf of the Shetland Marine Planning Partnership.

The development of the Shetland Islands Regional Marine Plan is supported by funding from Shetland Islands Council and Marine Scotland. If you would like to subscribe to this quarterly newsletter please contact us via email:

#### marineplan.shetland@uhi.ac.uk

The Shetland Islands Regional Marine Plan and more information on marine planning in Shetland can be found on the Marine Spatial Planning pages of the UHI Shetland website <a href="https://example.com/hetland/methods/">hetland/methods/</a>

Contact the Marine Spatial Planning Team on:

01595 772000

#### marineplan.shetland@uhi.ac.uk

For more information on SIC marine and coastal planning visit their website <a href="https://hee.gov/hee/">here</a> or contact them on:

01595 744293 marine.planning@shetland.gov.uk







