# Sussex IFCA Inshore Fisheries and

# Sussex IFCA Shellfish Permit Catch Returns Data Summary 2022

The Sussex Inshore Fisheries and Conservation Authority's purpose is to develop sustainable inshore fisheries whilst providing appropriate protection for the marine environment and the fisheries resources it supports.

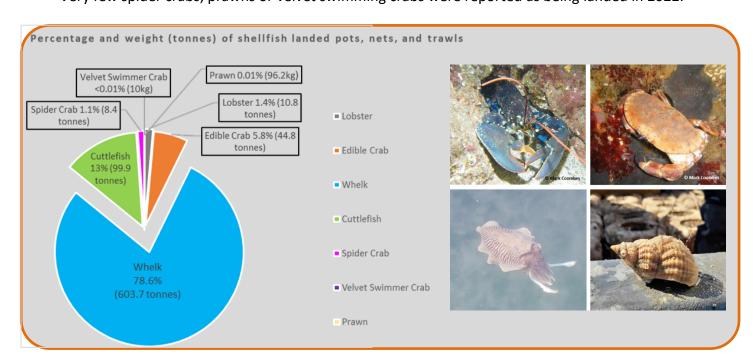
Conservation Authority In 2016, the Authority introduced a comprehensive suite of management measures for pot and trap shellfish fisheries under the Shellfish Permit Byelaw. The inshore controls built upon existing measures, such as minimum sizes, and introduced effort limitation, better selectivity for juvenile stock and protection of berried lobsters. The Byelaw effort and gear restrictions enable effective controls on the impacts of fishing activity on the District's shellfish populations and help achieve more productive and sustainable fisheries through improved stock management.

The Sussex IFCA Shellfish Permit Byelaw requires all permit holders to provide shellfish catch and fishing effort information to support inshore shellfish fisheries. This catch returns data is a vital part of shellfisheries' management and helps the IFCA to gather the evidence needed to make future management decisions. The Authority understands that permit data may also be of interest to permit holders, providing a better understanding of the fishery in the context of their own detailed knowledge. Trends such as the seasonality of different fisheries and catch rates might be of particular interest for future planning.

Catch data submitted will enable Sussex IFCA and others to better understand the seasonality of the shellfish fisheries and changes over longer time periods. The data will also help to understand the changes in catches and the status of stocks in response to the levels of fishing effort within the fisheries.

#### **Overview**

- Since October 2016 (the introduction of the Shellfish Permit Byelaw) to the end of December 2022, 53% of the total 322 permits were assigned to commercial fishermen, with 47% to recreational.
- 14% of these permits expired in 2021 and were not renewed during 2022 (8% recreational and 6% commercial).
- There were 65 active recreational permits and 93 active commercial permits during 2022, showing an increase in recreational permits from last year (62) and an increase in commercial permits (88).
- A total of 768 tonnes of shellfish was reported being landed on catch returns in 2022. 99.5% of landings were from pots, and 0.5% were from nets and trawls.
- The four main species landed were whelks (79%), cuttlefish (13%), edible crab (6%) and lobster (1%).
- Very few spider crabs, prawns or velvet swimming crabs were reported as being landed in 2022.



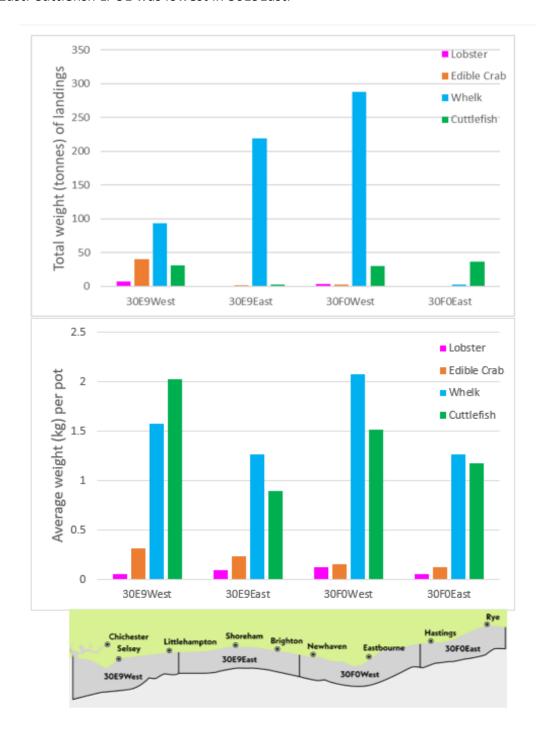
# **Spatial variation**

#### **Total landings**

- Lobster and edible crab landings were greatest in 30E9West, and whelk landings were greatest in 30F0West. Cuttlefish landings were greatest in 30F0East.
- Landings were lowest for lobster, whelk, and edible crab in 30F0East. Almost no (<0.15 tonnes) lobster
  or edible crab were landed in 30F0East. Landings for cuttlefish were lowest in 30E9East.</li>

### Landings per unit effort

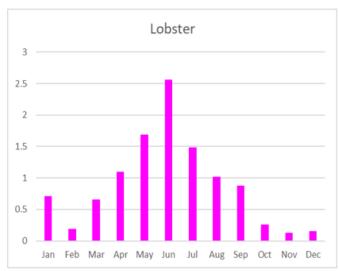
- The weight of each targeted species per pot, or landings per unit effort (LPUE), was calculated by dividing the total weight of each species by the number of pots hauled to target that species.
- Lobster and Whelk LPUE were greatest in 30F0West. Edible Crab and Cuttlefish LPUE were greatest in 30E9West.
- Lobster and Edible Crab LPUE were lowest in 30F0East. Whelk LPUE was lowest in 30E9East and 30F0East. Cuttlefish LPUE was lowest in 30E9East.

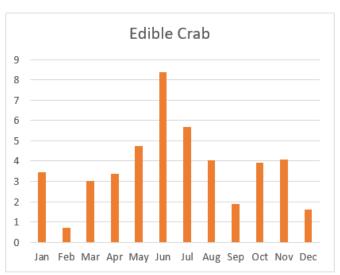


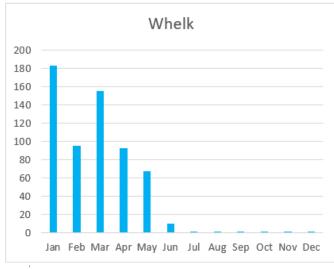
# Seasonality

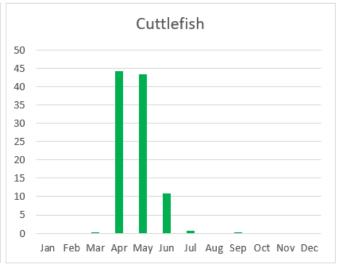
Total weight (tonnes) of landings

- Lobster landings were highest in June and lowest in the winter months.
- Edible crab landings were highest in June and lowest over winter.
- Whelk landings were highest during January, with 30% landed in January. Whelk landings decreased
  throughout the summer and were lowest in September, October, November, and December. The rise
  in sea temperatures causes the whelks to move to deeper, cooler waters.
- The cuttlefish season is primarily between April and June, coinciding with seasonal migrations into the shallower coastal waters to breed. 44% of cuttlefish landings were in April, and 43% in May.













# **Comparisons with previous years**

#### **Total landings**

- Lobster landings have gone up from 9 tonnes in 2021 to 10.8 tonnes in 2022.
- Edible crab landings have gone down from 179 tonnes in 2018, 158 tonnes in 2019, 66 tonnes in 2020,
   55 tonnes in 2021, to 45 tonnes in 2022.
- Whelk landings were highest in 2019 (1259 tonnes) than in 2018, 2020, 2021, and 2022.
- Cuttlefish landings were higher in 2020 (138 tonnes) than in 2018, 2019, 2021, and 2022.

#### Landings per unit effort

- Lobster LPUE decreased from 0.08 kg/pot in 2017 to 0.05 kg/pot in 2021. However, 2022 saw a slight increase in lobster LPUE at 0.07kg/pot.
- Edible crab LPUE in 2021 (0.29 kg/pot) was lower than in the previous five years; 2021 0.30 kg/pot, 2020 0.37kg/pot, 2019 0.44kg/pot, 2018 0.45 kg/pot and 2017 0.38 kg/pot.
- Whelk LPUE was lower in 2022 (1.63 kg/pot) than in the three previous years.
- Cuttlefish LPUE was lower in 2022 (1.45kg/pot) than in 2020 (2.76kg/pot) and 2021 (1.48kg/pot). However, the LPUE of 2022 was higher than in 2017, 2018, and 2019.

