Brown Crab Fishery

The brown crab (*Cancer pagurus*) fishery operates year-round, utilising creels to catch crabs in inshore waters. Landings from this fishery consist of targeted brown crab catches as well as incidental catches within a mixed fishery alongside velvet crabs and lobsters. Regulatory measures, including licensing requirements and limitations on creel numbers, are in place to manage the fishery.

Analysis of landings data since 2000 reveals fluctuations in brown crab landings. These fluctuations include a low point of approximately 200 tonnes in 2002 and 2003, and a peak of 600 tonnes in 2014 (Figure 1). Subsequently, landings decreased to around 300 tonnes in 2016 before stabilising at approximately 320 tonnes in recent years. Similar trends are observed in fishing effort, although the magnitude of change varies. Notably, in 2014, while landings doubled compared to 2000 levels, the increase in effort is not proportional, resulting in an uplift in landings per unit effort (LPUE).

LPUE is a critical metric for fisheries management and has shown periods of stability, with an overall increase since 2000 from around 0.7 kg/creel to 1.28 kg/creel in 2024. However, there was a notable decline below 1 kg/creel in 2019, marking the first such decrease since 2012 (Figure 1). Although LPUE showed some improvement in 2020, it subsequently declined in 2021 (0.80 kg/creel) and 2022 (0.75 kg/creel), falling below the average of 0.87 kg/creel in 2022. LPUE increases in 2024 to 1.28 kg/creel as a result of an increase in landings and a decrease in effort compared to prior years.

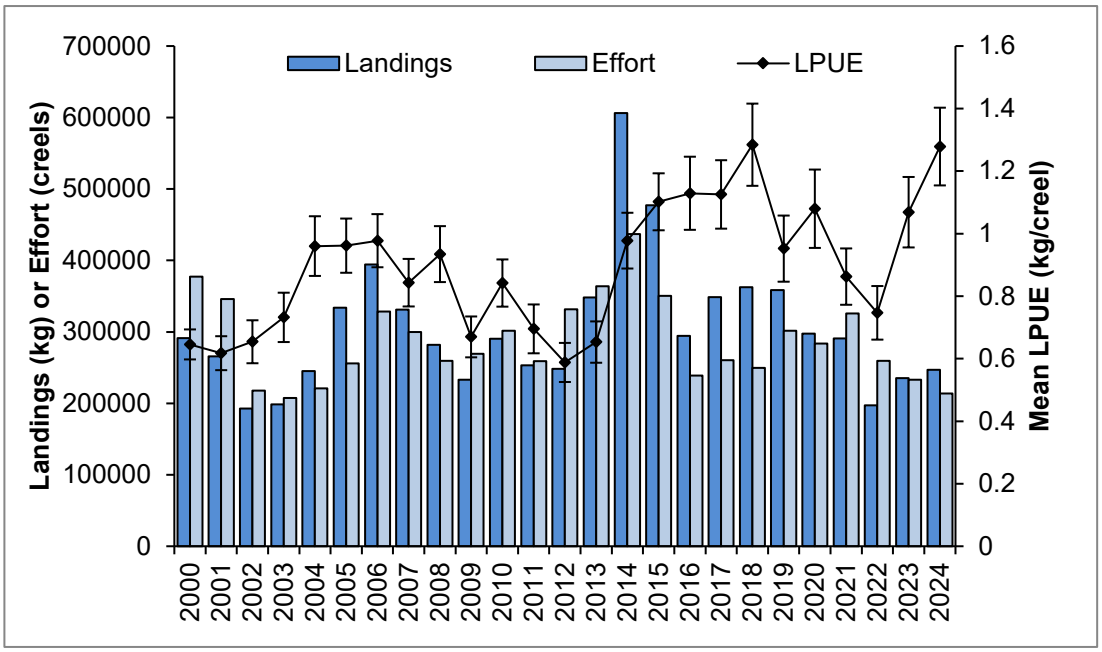

Figure 1 Total brown crab landings (kg), total numbers of creels and the average LPUE obtained from SSMO logbook data with 95% confidence intervals shown.

There is a strong geographical trend in brown crab LPUE, with the highest LPUE observed to the north and northwest of the Isles where most of the targeted fishery occurs (Figure 2 - 4) and is not observed to fluctuate annually. Lower LPUE is recorded in the south and east with this attributed to incidental bycatch in the velvet crab fishery.

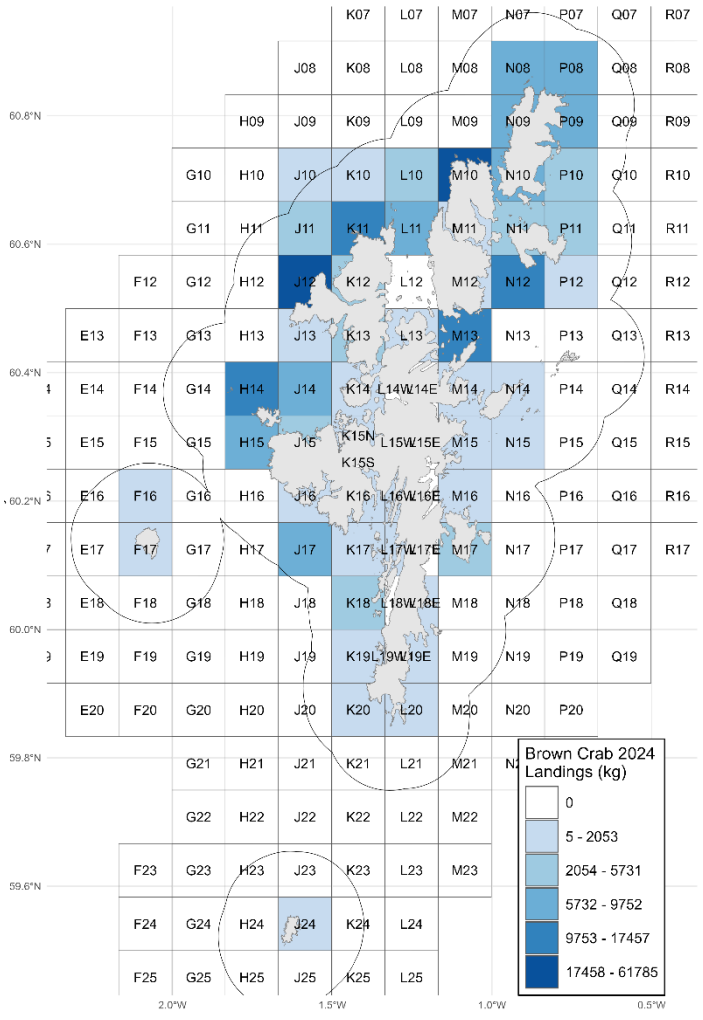

Figure 2 Geographic distribution of brown crab landings per SSMO statistical square in 2024.

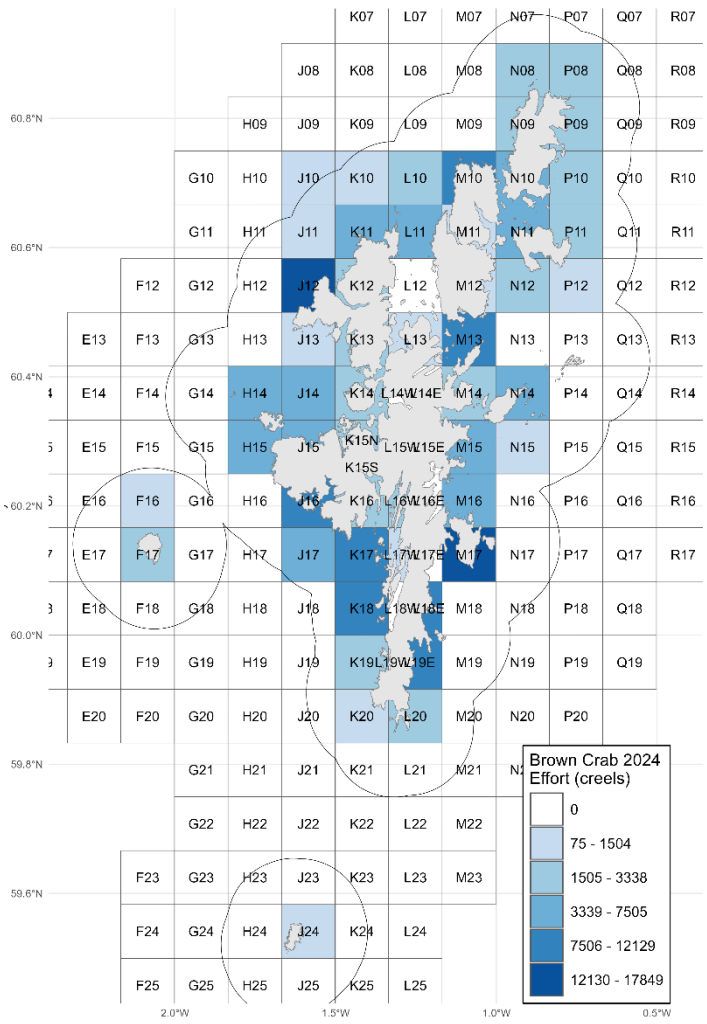

Figure 3 Geographic distribution of brown crab effort per SSMO statistical square in 2024.

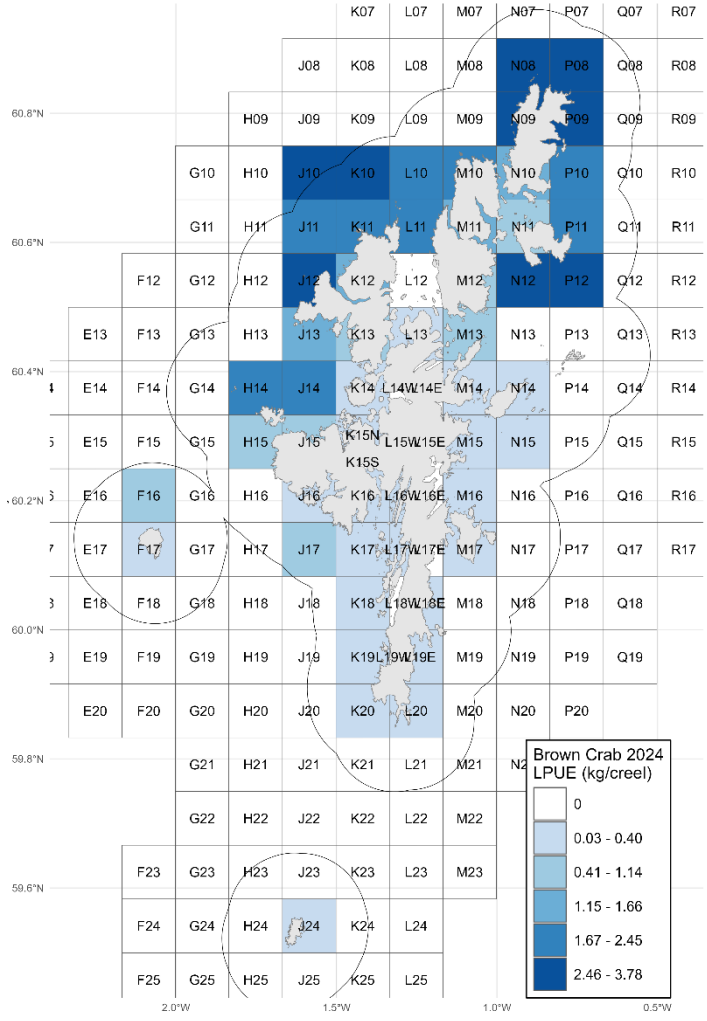

Figure 4 Geographic distribution of brown crab LPUE per SSMO statistical square in 2024.