European Commission

Monthly Highlights

No. 4 / 2023

EUMOFA
European Market Observatory for Fisheries and Aquaculture Products

EUMOFA will be present at **Seafood Expo Global** (SEG) in Barcelona and at the **European Maritime Day** (EMD) in Brest. Visit us at SEG Stand 4G700, Hall 4 and at EMD, where the following workshops will be held:
"***Farming in Water: Strategies to ensure social acceptance and meet demand for good fish through sustainable aquaculture***." 27 April 2023, 10:45 CET (SEG)
"***Blue Bioeconomy: latest trends and innovations***" 25 May 2023 at 14.30 - 15.45 CET (EMD)

In this issue

At the Electronic Recording and Reporting System (ERS) level, European smelt (1%) and meagre (1%) together accounted for 2% of total "other marine fish" first-sales value recorded in January 2023.

Over the 36-month observation period from February 2020-January 2023, the weighted average first-sales price of European smelt in Lithuania was 3,96 EUR/kg, more than 25 times higher than in Latvia (0,15 EUR/kg) and more than 5 times higher than in Estonia (0,74 EUR/kg)

During the period February 2020 –January 2023, the retail price of sardine was highest in France (6,49 EUR/kg), with a total of 10.261 tonnes sold.

Cod and haddock are the fish most often served in fish and chips, the traditional dish of the UK.

The state of the brown crab resource is of concern for many of the main stocks (northwest of Ireland, northeast and south UK, Scotland, North Sea, Bay of Biscay) and catches have decreased significantly in recent years.

On 21 February 2023, the European Commission presented a package of measures to improve the sustainability and resilience of the EU's fishery and aquaculture sector.

Contents

First sales in Europe
European smelt (Estonia, Lithuania, Latvia) and meagre (France, Portugal, Spain)

Extra-EU imports
Weekly average EU import prices of selected products from selected countries of origin

Consumption
Sardine in France, Portugal, and Spain

Case studies
Fisheries and aquaculture in the UK
Brown crab in the EU

Global Highlights

Macroeconomic context
Marine fuel, consumer prices and exchange rates

Find all data, information and more at:
www.eumofa.eu

@EU_MARE #EUMOFA

1. First sales in Europe

In **January 2023**, 12 EU Member States (MS), Norway and the United Kingdom reported first-sales data for 10 commodity groups[1]. First-sales data are based on sales notes and data collected from auction markets.

First-sales data analysed in this section, "*First sales in Europe*", are extracted from EUMOFA[2], as collected from national administrations.

1.1. January 2023 compared to January 2022

Increases in value and volume: First sales increased in Estonia, Germany, Latvia, Spain, Norway and the UK. Highest increases were recorded in Latvia and Germany. In Latvia it was due to herring and sprat, while mackerel and the shrimp *Crangon* spp. were behind the increases in Germany.

Decreases in value and volume: First sales decreased in Estonia and Portugal. This was due to decreased sales of sprat and herring in Estonia, while in Portugal the main species responsible were octopus and anchovy.

Table 1. **JANUARY OVERVIEW OF FIRST SALES FROM THE REPORTING COUNTRIES (volume in tonnes and value in million EUR) ***

	January 2021		January 2022		January 2023		Change from January 2022	
Country	**Volume**	**Value**	**Volume**	**Value**	**Volume**	**Value**	**Volume**	**Value**
Bulgaria	26	0,1	27	0,1	1	0,004	-96%	-94%
Cyprus	23	0,2	22	0,2	22	0,2	-2%	12%
Estonia	9.345	2,2	6.364	1,6	6.563	1,9	3%	19%
France	16.041	53,5	16.775	62,2	15.593	63,5	-7%	2%
Germany	4.153	3,4	5.489	4,6	6.146	8,3	12%	80%
Italy	5.139	20,6	4.815	21,4	4.536	20,5	-6%	-4%
Latvia	3.829	0,8	2.524	0,6	3.435	0,8	36%	46%
Lithuania	349	0,19	183	0,114	60	0,330	-67%	191%
Netherlands	6.798	14,2	8.034	18,7	11.126	16,7	38%	-11%
Portugal	4.138	15,0	5.608	23,3	4.762	20,9	-15%	-10%
Spain	24.291	83,3	23.605	94,5	24.446	99,9	4%	6%
Sweden	21.842	7,3	23.817	0,9	1.228	2,7	-95%	200%
Norway	271.865	218,8	204.762	216,1	272.341	253,7	33%	17%
United Kingdom	48.044	64,6	44.186	78,0	50.535	85,4	14%	9%

Possible discrepancies in % changes are due to rounding.
** Volumes are reported in net weight for EU Member States and the UK, and in live weight equivalent (LWE) for Norway. Prices are reported in EUR/kg (without VAT). For Norway, prices are reported in EUR/kg of live weight.*

The most recent weekly first-sales data **(up to week 16 of 2023)** are available via the EUMOFA website and can be accessed **here**.

The most recent monthly first-sales data **for February 2023** are available via the EUMOFA website and can be accessed **here**.

[1] Bivalves and other molluscs and aquatic invertebrates, other marine fish, crustaceans, flatfish, freshwater fish, groundfish, salmonids, small pelagics, tuna and tuna-like species and other marine fish.
[2] First-sales data updated on 25.03.2023.

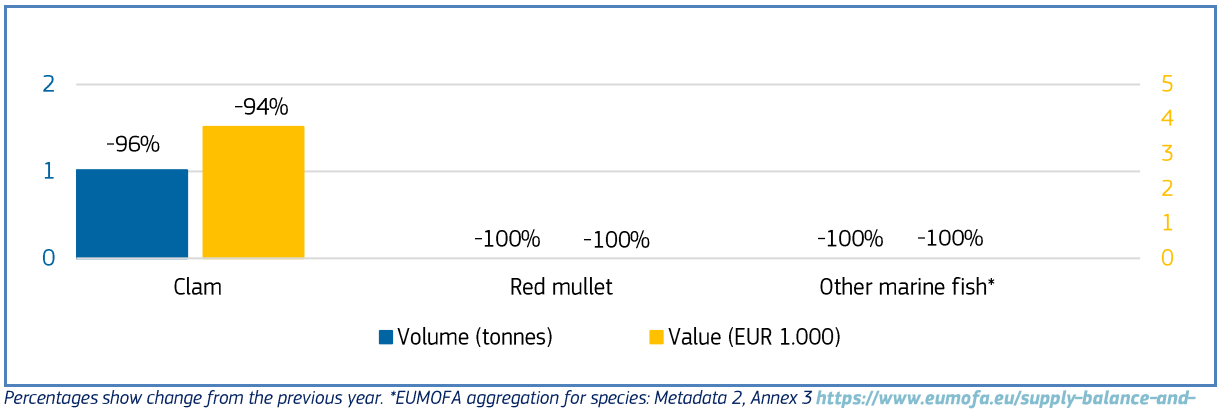
1.3. First sales in selected countries

First-sales data analysed in this section are extracted from EUMOFA[3].

Table 2. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN BULGARIA**

Bulgaria	First-sales value / trend %	First-sales volume / trend %	Main contributing species	Notes
Jan 2022 vs Jan 2023	EUR 3.777 -94%	1 tonne, -96%	Clam	Although red mullet and other marine fish decreased by 100% in first sales in January 2023 compared to January 2022, it has to be noted that decrease is not that high in absolute terms: 126 kg down for red mullet and 338 kg for other marine fish. Such decreases could be due to bad weather conditions, or lower fishery activities of small-scale fleet segment where these species are mainly by-catch species caught in gillnet fisheries.

Figure 1. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN BULGARIA, JANUARY 2023**



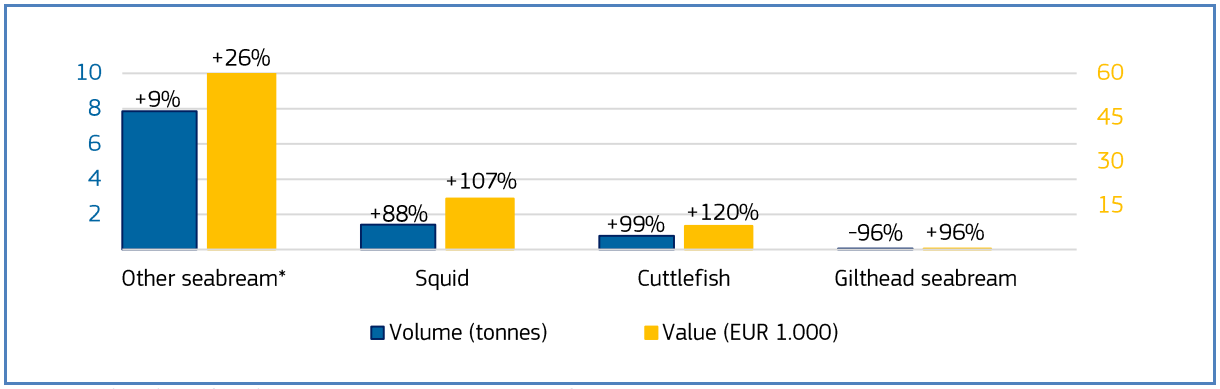
*Percentages show change from the previous year. *EUMOFA aggregation for species: Metadata 2, Annex 3 https://www.eumofa.eu/supply-balance-and-other-methodologies*

Table 3. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN CYPRUS**

Cyprus	First-sales value / trend %	First-sales volume / trend %	Main contributing species
Jan 2022 vs Jan 2023	EUR 0,2 million, +12%	22 tonnes, -2%	**Value**: Other seabream*, squid, cuttlefish. **Volume**: Gilthead seabream, picarel, hake.

[3] First-sales data updated on 19.03.2023.

Figure 2. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN CYPRUS, JANUARY 2023**

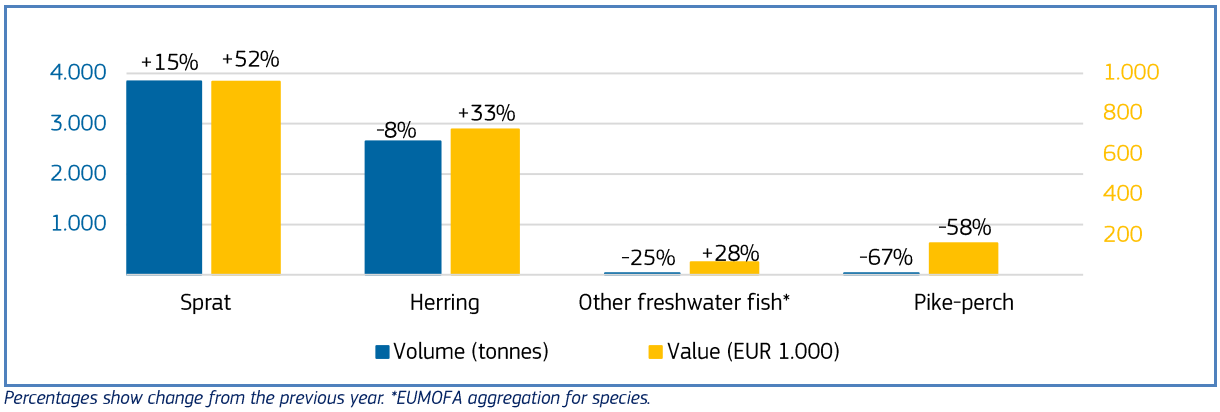


*Percentages show change from the previous year. *EUMOFA aggregation for species,*

Table 4. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN ESTONIA**

Estonia	First-sales value / trend %	First-sales volume / trend %	Main contributing species
Jan 2022 vs Jan 2023	EUR 1,9 million, +19%	6.563 tonnes, +3%	Sprat, herring, Other freshwater fish*, pike-perch.

Figure 3. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN ESTONIA, JANUARY 2023**

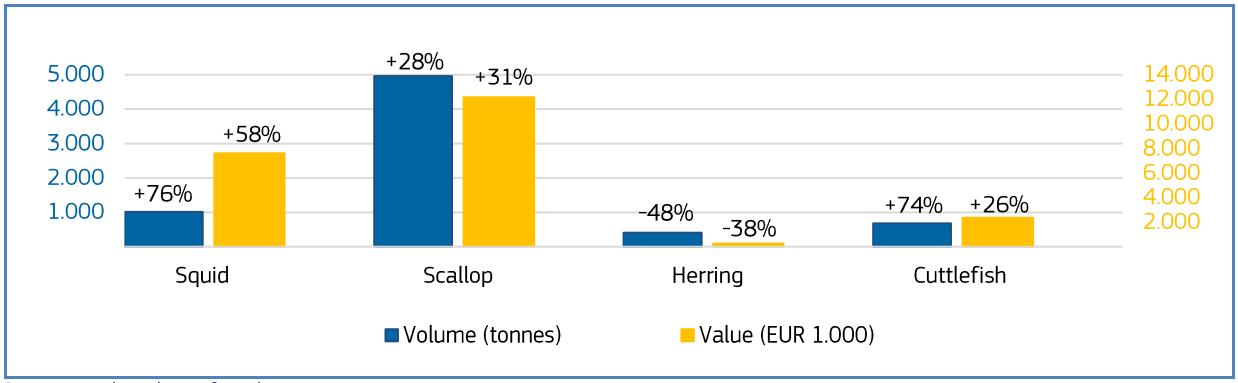


*Percentages show change from the previous year. *EUMOFA aggregation for species.*

Table 5. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN FRANCE**

France	First-sales value / trend %	First-sales volume / trend %	Main contributing species
Jan 2022 vs Jan 2023	EUR 63,5 million, +2%	15.593 tonnes, -7%	**Value**: Scallop, squid, cuttlefish. **Volume**: Herring, whiting, monk.

Figure 4. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN FRANCE, JANUARY 2023**

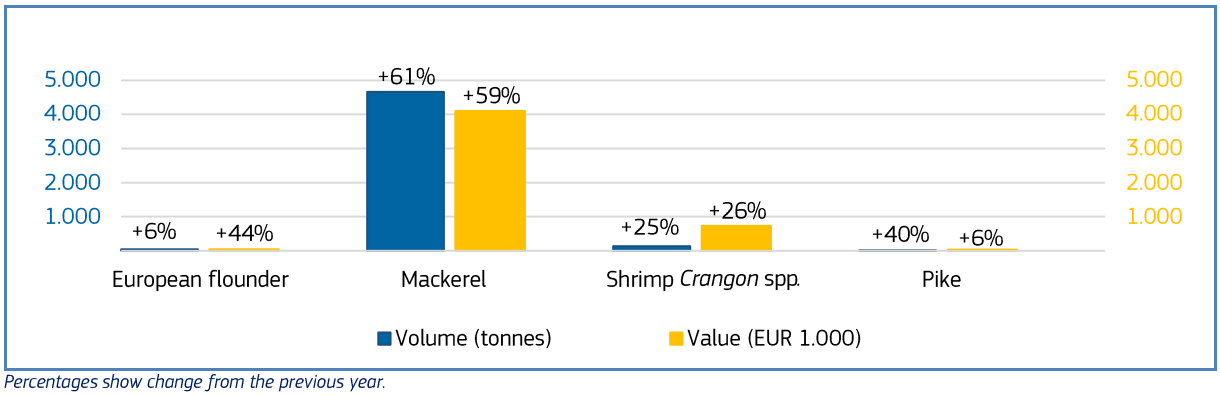


Percentages show change from the previous year.

Table 6. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN GERMANY**

Germany	First-sales value / trend %	First-sales volume / trend %	Main contributing species
Jan 2022 vs Jan 2023	EUR 8,3 million, +80%	6.146 tonnes, +12%	Mackerel, shrimp *Crangon* spp., European flounder, pike

Figure 5. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN GERMANY, JANUARY 2023**

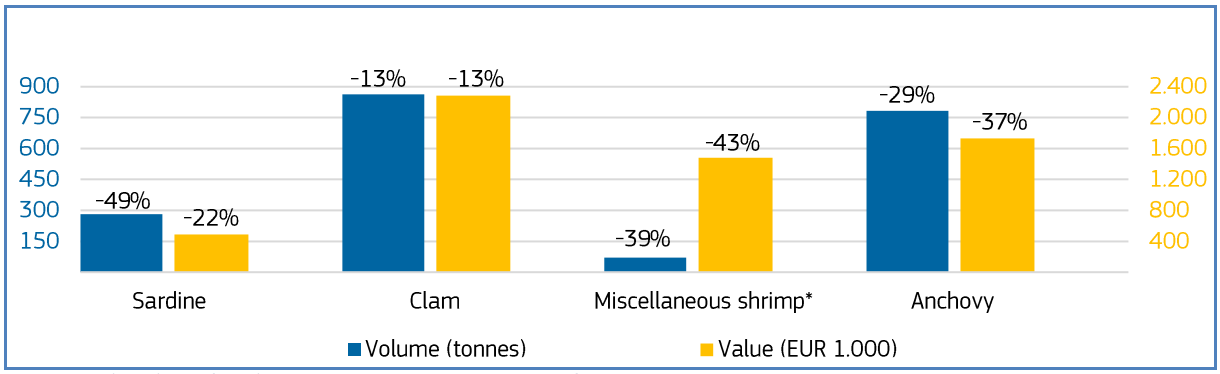


Percentages show change from the previous year.

Table 7. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN ITALY**

Italy	First-sales value / trend %	First-sales volume / trend %	Main contributing species
Jan 2022 vs Jan 2023	EUR 20,5 million, -4%	4.536 tonnes, -6%	Miscellaneous shrimps*, anchovy, clam, sardine.

Figure 6. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN ITALY, JANUARY 2023**

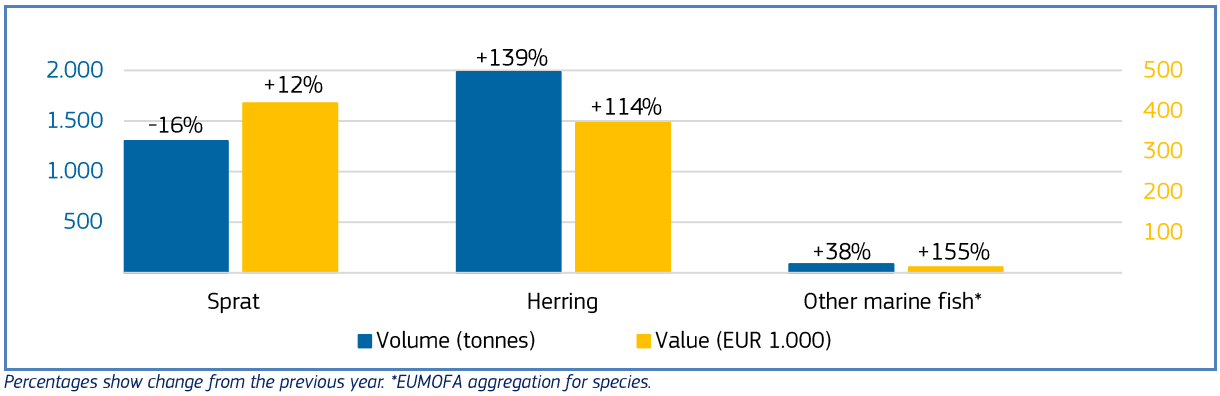


*Percentages show change from the previous year. *EUMOFA aggregation for species.*

Table 8. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN LATVIA**

Latvia	First-sales value / trend %	First-sales volume / trend %	Main contributing species	Note
Jan 2022 vs Jan 2023	EUR 0,8 million, +46%	3.435 tonnes, +36%	Herring, sprat, other marine fish*	First sales of **herring** registered a high increase in January 2023 compared to January 2022. The high discrepancy in supplies (+139%) is due to unusually windy weather in January 2022 which affected fishing activities. As a result, catches from the Latvian fleet and supply to the market in this period were lower than in January 2023 or 2021. A decrease of 10% in herring prices was also observed when comparing January 2023 with January 2022.

Figure 7. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN LATVIA, JANUARY 2023**



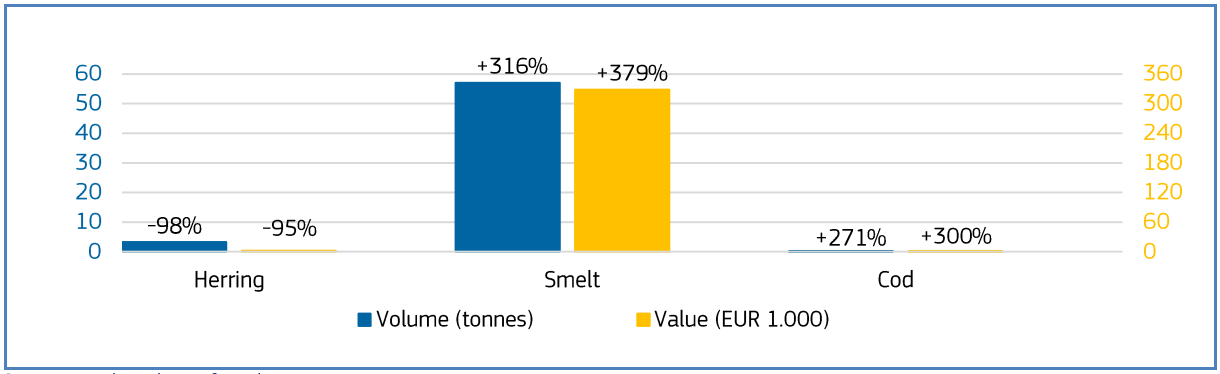
*Percentages show change from the previous year. *EUMOFA aggregation for species.*

Table 9. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN LITHUANIA**

Lithuania	First-sales value / trend %	First-sales volume / trend %	Main contributing species	Note
Jan 2022 vs Jan 2023	EUR 0,3 million, +191%	60 tonnes, -67%	**Value**: Smelt, cod. **Volume**: Herring.	First sales of **smelt** registered a high increase in January 2023 compared to January 2022. The main reason for the high discrepancy in supplies is the unusually windy weather in January 2022 which affected fishing activities. In Lithuania smelt is fished only in the coastal areas of the Baltic Sea. The fishery is seasonal and concentrated between November and March. In the winter period, when smelt is spawning,

				the stock comes closer to coastal areas. Water temperature and wind direction are determinant factors for fishing smelt. In January 2022 the water temperature was not as favourable as in January 2023 and smelt did not concentrate along the coastal areas, resulting in lower catches. Weather conditions, fishing capacity and resources enabled an increase in fishing effort thus increasing supply of the market in January 2023.

Figure 8. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN LITHUANIA, JANUARY 2023**

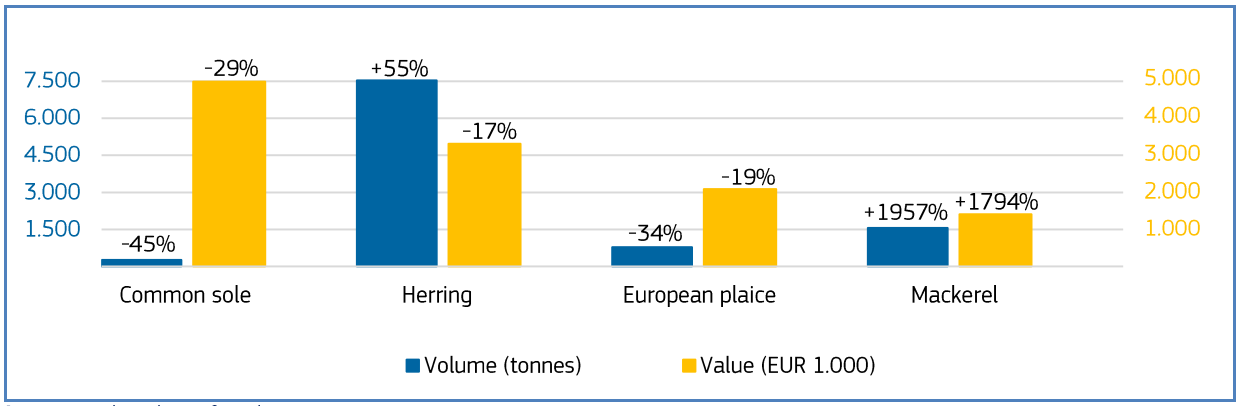


Percentages show change from the previous year.

Table 10. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN THE NETHERLANDS**

The Netherlands	First-sales value / trend %	First-sales volume / trend %	Main contributing species
Jan 2022 vs Jan 2023	EUR 16,7 million, -11%	11.126 tonnes, +38%	**Value**: Common sole, herring, European plaice. **Volume**: Herring, mackerel, squid.

Figure 9. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN THE NETHERLANDS, JANUARY 2023**

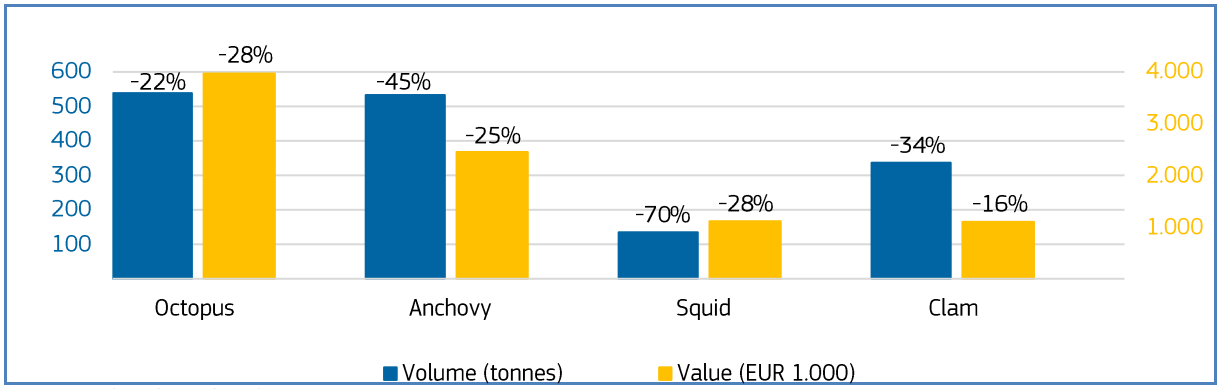


Percentages show change from the previous year.

Table 11. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN PORTUGAL**

Portugal	First-sales value / trend %	First-sales volume / trend %	Main contributing species
Jan 2022 vs Jan 2023	EUR 20,9 million, -10%	4.762 tonnes, -15%	Octopus, anchovy, squid, clam.

Figure 10. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN PORTUGAL, JANUARY 2023**

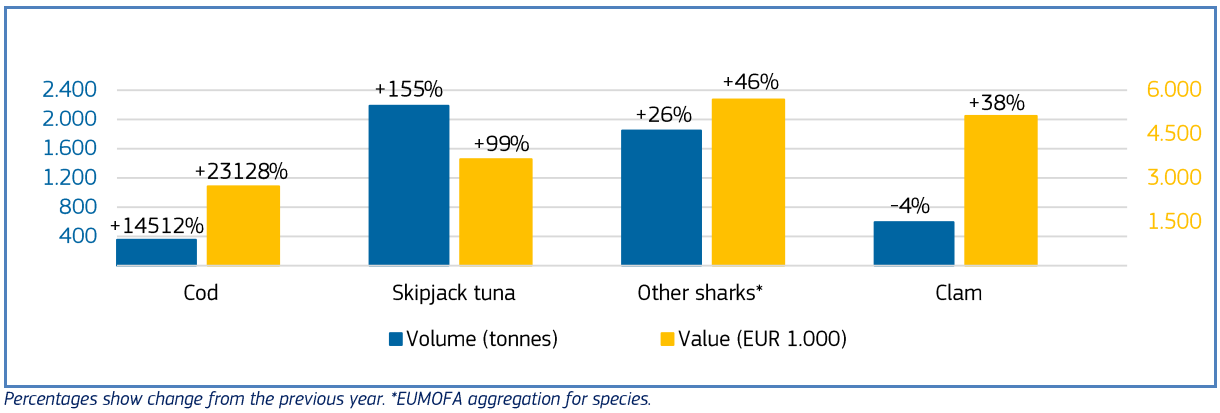


Percentages show change from the previous year.

Table 12. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN SPAIN**

Spain	First-sales value / trend in %	First-sales volume / trend %	Main contributing species	Notes
Jan 2022 vs Jan 2023	EUR 99,9 million, +6%	24.446 tonnes, +4%	Cod, skipjack tuna, other sharks*, clam.	**Cod** recorded significant increases in January 2023 compared to January 2022. Cod is caught by the Spanish fleet mainly in mixed fisheries in the Celtic Sea with other species for which non-zero catches are advised, particularly haddock. ICES recognized that the improved condition of haddock also had a positive effect on the status of cod, increasing its spawning stock biomass (SSB) to 1.053 tonnes by 2023. This fact partially explains the increase in the volume of cod landed in Spain. One of the main reasons for this sudden increase is the high volume of cod landings in the port of Cangas (NW Spain). This is the home port for some of the Spanish NAFO vessels and the landings of Atlantic cod there are not usually concentrated in March-April, June and September. The fishing season was a bit shorter in 2023 and landings were earlier than in previous years. The value of cod increased due to overall inflation affecting the food market.

Figure 11. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN SPAIN, JANUARY 2023**

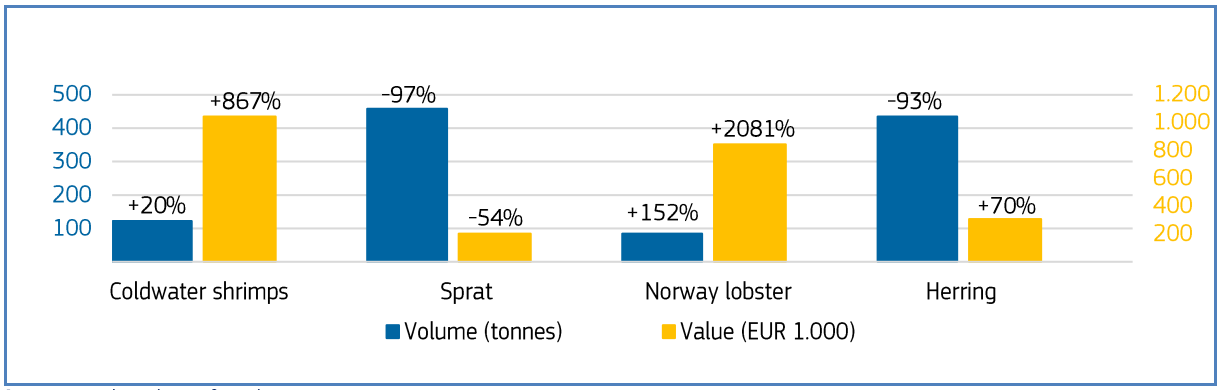


*Percentages show change from the previous year. *EUMOFA aggregation for species.*

Table 13. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN SWEDEN**

Sweden	First-sales value / trend in %	First-sales volume / trend in %	Main contributing species
Jan 2022 vs Jan 2023	EUR 2,7 million, +200%	1.228 tonnes, -95%	**Value**: Coldwater shrimps, Norway lobster, herring. **Volume**: Sprat, herring, mackerel.

Figure 12. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN SWEDEN, JANUARY 2023**

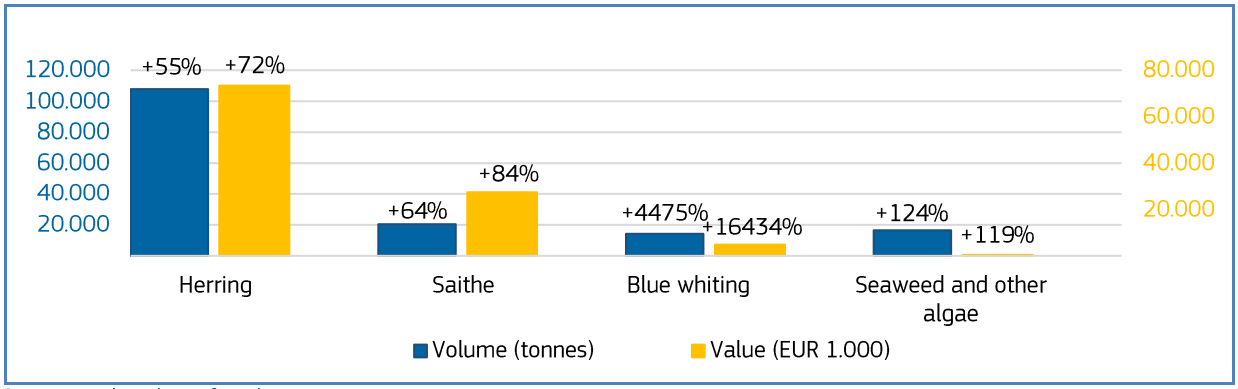


Percentages show change from the previous year.

Table 14. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN NORWAY**

Norway	First-sales value / trend %	First-sales volume[4]/ trend %	Main contributing species	Notes
Jan 2022 vs Jan 2023	EUR 253,7 million +17%	272.341 tonnes, +33%	Herring, saithe, blue whiting, seaweed and other algae.	First sales of **mackerel** registered a high increase in January 2023 compared to January 2022. Production in 2023 has gone back to more usual figures as in the same period in previous years, with around 1.350 tonnes in January 2021 and 1.600 tonnes in January 2020. January 2022 seems to be an exception. In the context of rather good stock status, this change in production is mostly due to very bad weather in the North Sea in January 2022.

Figure 13. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN NORWAY, JANUARY 2023**



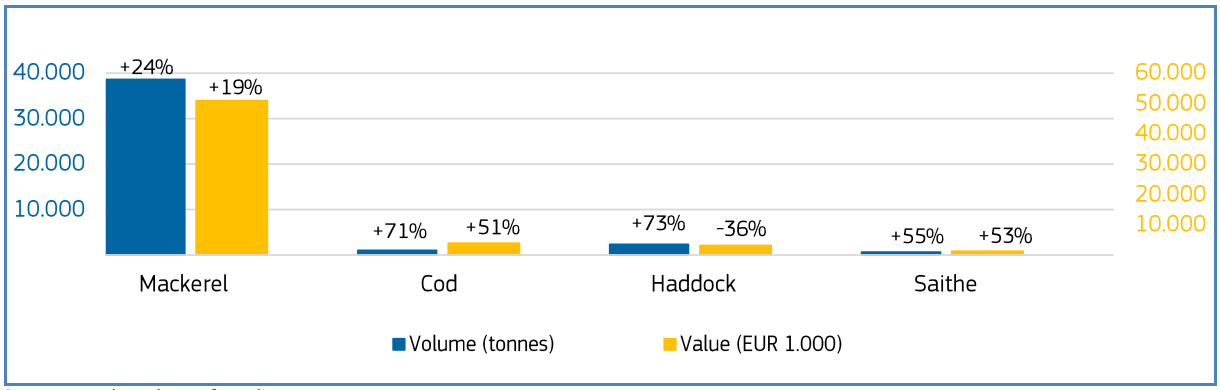
Percentages show change from the previous year.

[4] Volume reported in live weight equivalent (LWE)

Table 15. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN THE UNITED KINGDOM**

The United Kingdom	First-sales value / trend %	First-sales volume / trend %	Main contributing species
Jan 2022 vs Jan 2023	EUR 85,4 million, +9%	50.535 tonnes, +14%	Mackerel, cod, haddock, saithe.

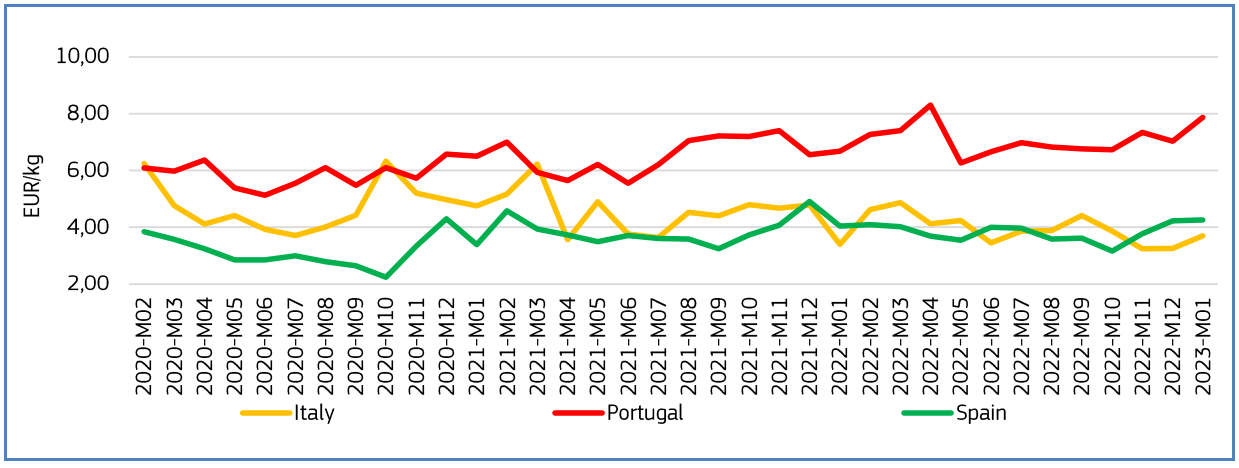
Figure 14. **FIRST SALES OF THE MAIN COMMERCIAL SPECIES IN THE UNITED KINGDOM, JANUARY 2023**



Percentages show change from the previous year.

1.4. Comparison of first sales prices of selected species in selected countries[5]

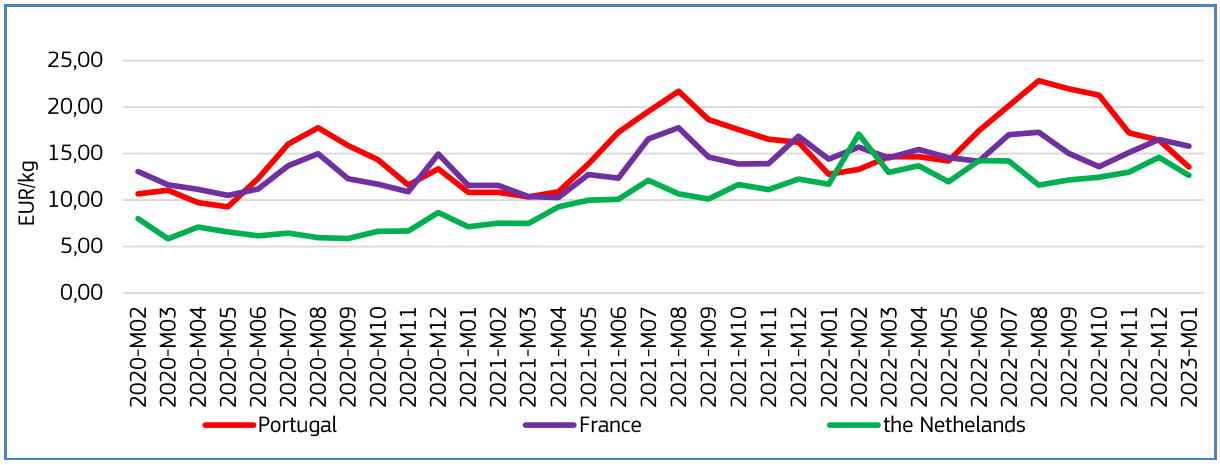
Figure 15. **FIRST SALES PRICES OF BLACKBELLY ROSEFISH IN ITALY, PORTUGAL, AND SPAIN**



EU first sales of **blackbelly rosefish** occur predominantly in **Italy**, **Portugal** and **Spain**. In January 2023, the average first-sales prices of blackbelly rosefish were 3,70 EUR/kg in Italy (up from December 2022 and from January 2022 by 14% and 9% respectively); 7,87 EUR/kg in Portugal (up from both the previous month and year by 12% and 18% respectively); and 4,25 EUR/kg in Spain (up from both December 2022 and January 2022 by 1% and 5% respectively). In January 2023, supply increased in Italy (+34%) and decreased in Portugal and Spain (–22%, and –17% respectively) relative to the previous year. Supply is seasonal in Italy, with volume at a stable high between May and June, but there were also elevated volumes in February and March in 2020 and 2021 respectively. In Spain supply seems to peak between August and October, while volumes sold in Portugal seem to peak between June and August. Between months 02/2020 to 01/2023, prices showed high fluctuations and decreased in Italy, despite recoveries in prices in months 10/2020 and 03/2021 when prices were 6, 33 EUR/Kg and 6,23 EUR/kg respectively. Prices increased in Portugal and Spain, with high fluctuations during the period analysed.

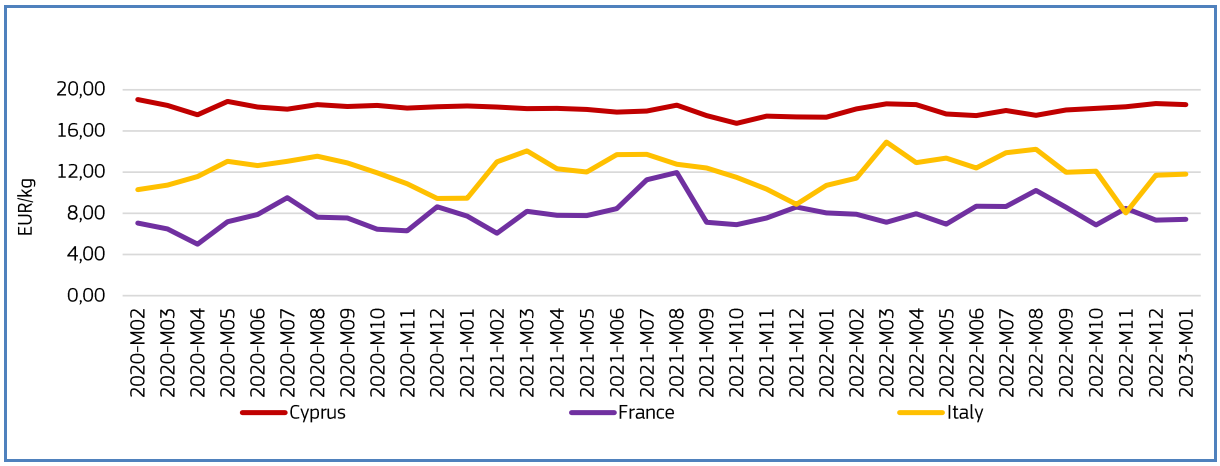
[5] First-sales data updated on 13.03.2023.

Figure 16. **FIRST SALES PRICES OF BRILL IN FRANCE, THE NETHERLANDS, AND PORTUGAL**



EU first sales of **brill** occur in several countries, including **France**, as well as **the Netherlands** and **Portugal**. In January 2023, the average first-sales prices of brill were 15,78 EUR/kg in France (down from the previous month by 4% and up from the previous year by 10%); 12,65 EUR/kg in the Netherlands (down from December 2022 by 13%, and up from January 2022 by 8%); and 13,55 EUR/kg in Portugal (down from the previous month by 18% and up from the previous year by 6%). In January 2023, relative to the previous year, supply decreased in the three markets France (-24%), the Netherlands (–26%) and in Portugal (-9%). Supply is seasonal, with peaks more often between March and June in France. In the Netherlands supply seems to peak in the period between January and March. Volumes sold in Portugal seem to peak in January and February. Between months 02/2020 and 01/2023, prices showed an increase in the three countries, with seasonal peaks in prices in Portugal in August, and high fluctuations in France and the Netherlands.

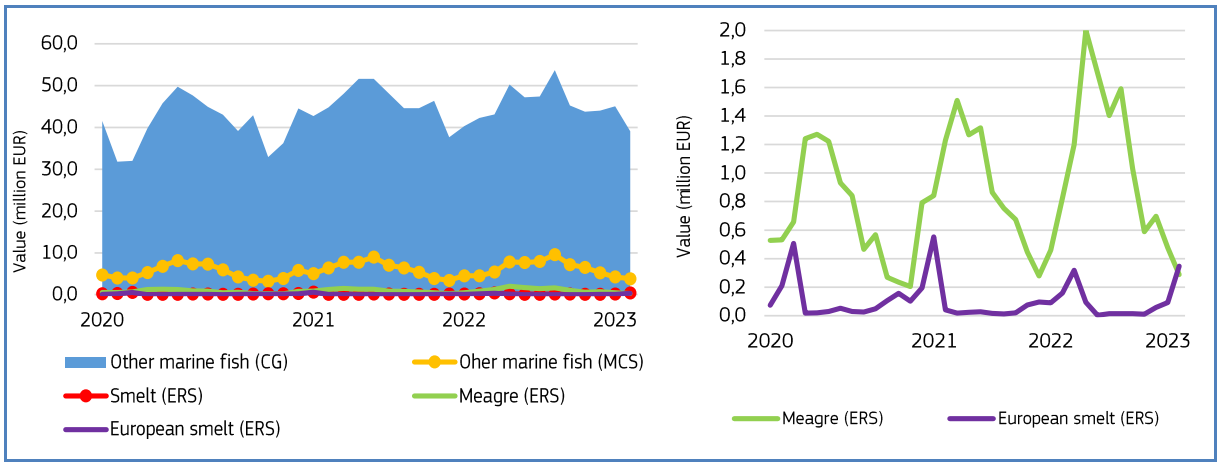
Figure 17. **FIRST SALES PRICES OF WHITE SEABREAM IN CYPRUS, FRANCE, AND ITALY**



EU first sales of **white seabream** occur in several countries, including **France**, as well as **Italy** and **Cyprus**. In January 2023, the average first-sales prices of white seabream were 11,80 EUR/kg in Italy (up from both the previous month and year by 1% and 10% respectively); 7,42 EUR/kg in France (up from the previous month by 1%, and down from the previous year by 8%); and 18,54 EUR/kg in Cyprus (down by 1% from December 2022 and up by 7% from January 2022). In January 2023, supply increased in the three markets analysed Italy (+21%), France (+84%) and Cyprus (+100%), relative to the previous year. Volumes sold in Cyprus seem to peak between October and December. In France they seem to peak in May and October. Supply in Italy peaks most often in March/April and between October and December. Between week 02/2020 and week 01/2023, prices showed a stable trend in Cyprus. Prices increased slightly in France showing high fluctuations in the period analysed reaching the price peak of 11,97 EUR/kg in August 2021. Prices increased in Italy with lowest prices between November and December.

1.5. Commodity group of the month: Other marine fish[6]

Figure 18. **FIRST SALES COMPARISON AT CG, MCS, AND ERS LEVELS FOR REPORTING COUNTRIES[7], FEBRUARY 2020 – JANUARY 2023**



In January 2023 the "**other marine fish**" commodity group (CG[8]) recorded the second highest first sales value and third highest first sales volume of the 10 CGs recorded. Across the reporting countries covered by the EUMOFA database, first sales of other marine fish reached a value of EUR 39,0 million and a volume of 8.768 tonnes, representing a 19% increase in value and 2% decrease in volume compared to January 2022. In the past 36 months, the highest first-sales value of other marine fish was recorded at EUR 53,7 million in August 2022, while the lowest was recorded at EUR 31,8 million in March 2020.

The "other marine fish" commodity group includes the following main commercial species (MCS): cusk-eel, dogfish, gurnard, John Dory, monkfish, picarel, ray, red mullet, scabbardfish, European seabass and other seabass, gilthead seabream and other seabreams, smelt, weever, other marine fish and other sharks[9].

At the Electronic Recording and Reporting System (ERS) level, European smelt (1%) and meagre (1%) together accounted for 2% of total "other marine fish" first-sales value recorded in January 2023.

[6] First-sales data updated on 24.03.2023.
[7] Norway and the UK excluded from the analyses.
[8] Annex 3: http://eumofa.eu/supply-balance-and-other-methodologies
[9] EUMOFA aggregation for species (Metadata 2, Annex 3: http://eumofa.eu/supply-balance-and-other-methodologies).

1.6. Focus on European smelt

Source: Scandinavian Fishing Year Book

European smelt (*Osmeus eperlanus*) is a member of the Osmeridae family. The species inhabits marine waters, estuaries and large lakes. It is a midwater species, rarely far from shore. It is primarily anadromous in the west and lacustrine in the east, shoaling at least during the spawning season. An essential part of its life is spent in the estuarine zone, with just short incursions in the littoral zone. It spawns in tributaries of lakes or along shallow shores of lakes and rivers on sand, gravel, stones and plant material, preferably in fast-flowing water. Smelt feeds on shrimps and small crustaceans. Larger individuals also feed on small fish[10].

European smelt is found in the North Atlantic: in the White Sea southward to the western coasts of France including the Baltic Sea, the southern North Sea and the British Isles. The Gironde estuary is the southern limit of its distribution. Landlocked populations live in the lakes of coastal areas of the North, Baltic, White and Barents Seas. In the north they can be found up to about 68° N in Scandinavia.

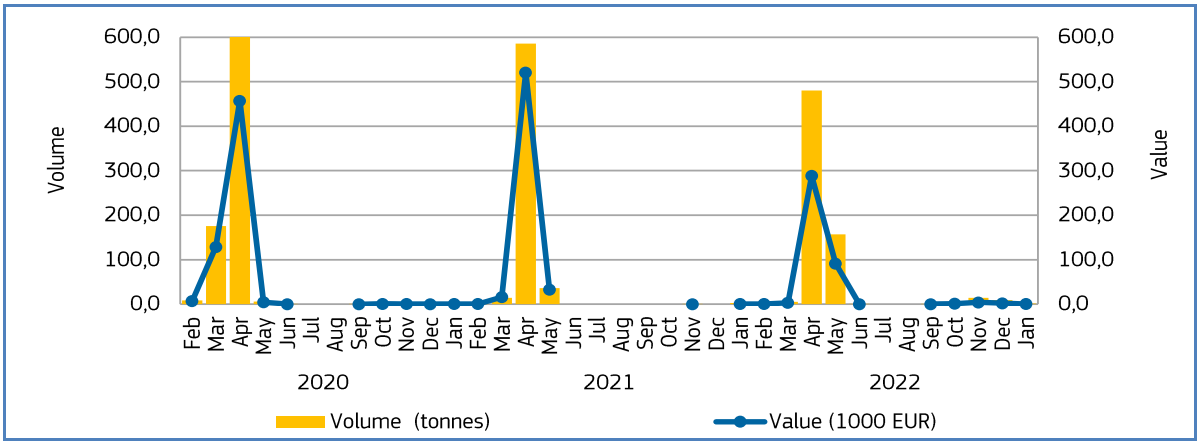
The EU has no specific regulation on European smelt[11]. Smelt is usually caught with inshore nets or by small-scale trawling[12] and it is used for food and non-food purposes (bait and fish oil)[13].

Selected countries

Table 16. **COMPARISON OF EUROPEAN SMELT FIRST SALES, MAIN PLACES OF SALE, AND CONTRIBUTION TO OVERALL SALES OF "OTHER MARINE FISH" IN SELECTED COUNTRIES**

European smelt		Changes in European smelt first sales Jan 2023 (%)		Contribution of European smelt to total "other marine fish" first sales in Jan 2023 (%)	Main places of sale in Jan-Jan 2023 in terms of first-sales value
		Compared to Jan 2022	Compared to Jan 2021		
Estonia	**Value**	+24%	-21%	50%	Lemmetsa, Tallinn, Roomassaare.
	Volume	-37%	-44%	43%	
Latvia	**Value**	+80%	-42%	57%	Kolka, Roja, Liepaja.
	Volume	-7%	-68%	39%	
Lithuania	**Value**	+379%	+210%	100%	Klaipėda, Sventoji, Palanga.
	Volume	+361%	+73%	100%	

Figure 19. **EUROPEAN SMELT: FIRST SALES IN ESTONIA, FEBRUARY 2020 – JANUARY 2023**



[10] https://www.fishbase.se/summary/osmerus-eperlanus.html
[11] https://www.eumofa.eu/documents/20178/120635/MH+6+2018_final.pdf
[12] https://britishseafishing.co.uk/smelt/
[13] https://www.fishbase.se/summary/osmerus-eperlanus.html

In **Estonia** from February 2020-January 2023, the first sales volume of European smelt peaked in April 2020, at 602 tonnes. Smelt fishery is seasonal with most first sales occurring in the spring. There were no smelt catches in the summer.

Figure 20. **FIRST SALES: COMPOSITION OF "OTHER MARINE FISH" (ERS LEVEL) IN ESTONIA, IN VALUE AND VOLUME, JANUARY 2022**

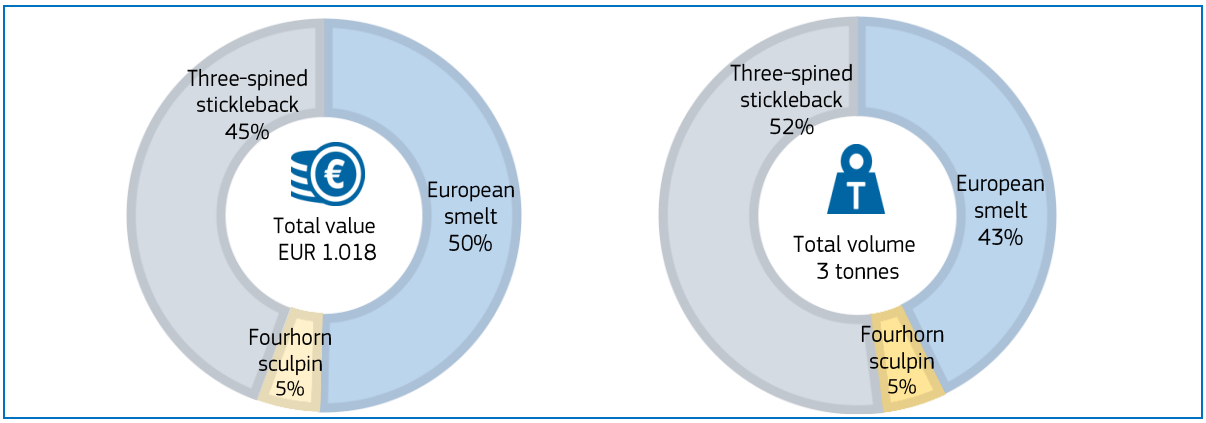
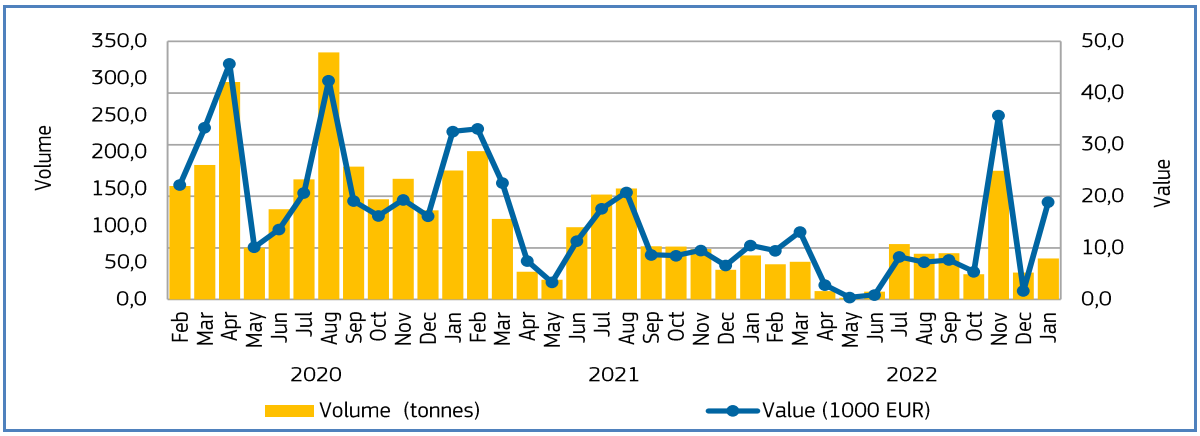


Figure 21. **EUROPEAN SMELT: FIRST SALES IN LATVIA, JANUARY 2023**



Over the past 36 months in **Latvia**, the highest first-sales value of European smelt were April 2020 at EUR 46.000 for 295 tonnes, while volume peaked in August 2020, when 335 tonnes were sold for approximately EUR 42.000. First sales value and volume were lowest in May 2022.

Figure 22. **FIRST SALES: COMPOSITION OF "OTHER MARINE FISH" (ERS LEVEL) IN LATVIA, IN VALUE AND VOLUME, JANUARY 2023**

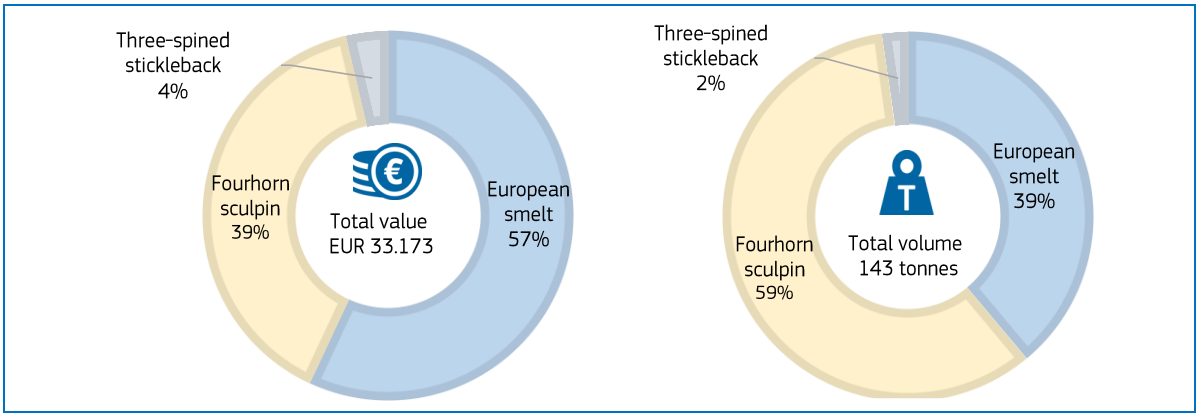
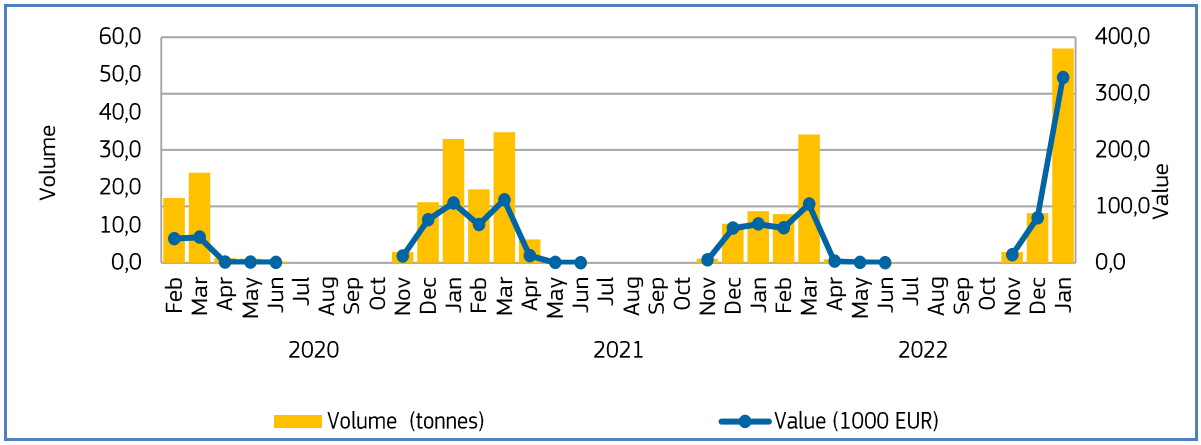
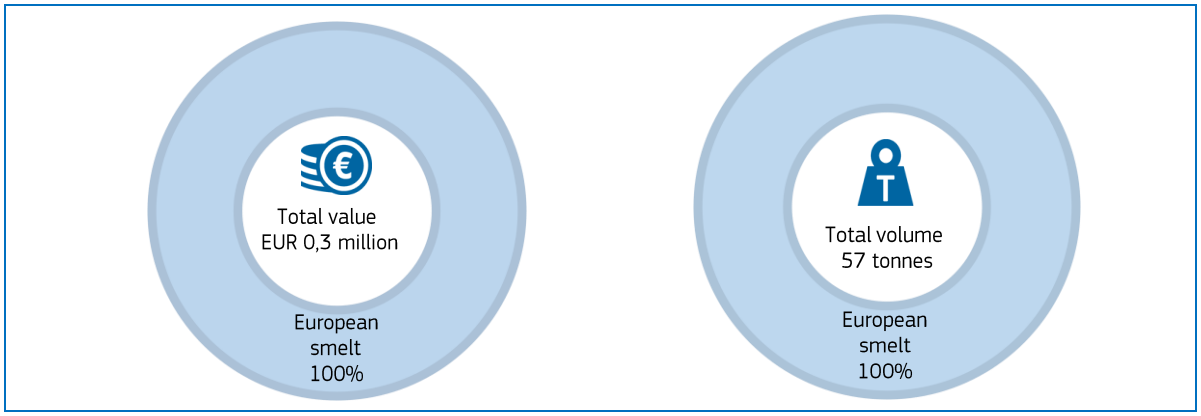


Figure 23. **EUROPEAN SMELT: FIRST SALES IN LITHUANIA, FEBRUARY 2020 – JANUARY 2023**



European smelt is a very popular fish species in **Lithuania**[14] with a dedicated annual smelt festival in Palanga in January[15]. Over the past 36 months (February 2020-January 2023), the highest first sales occurred in January 2023 when 57 tonnes were sold.

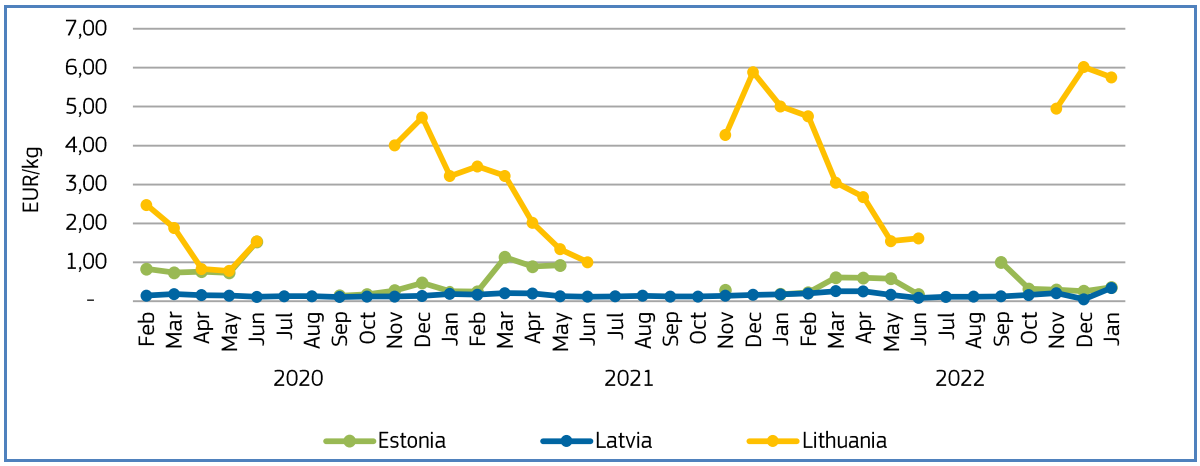
Figure 24. **FIRST SALES: COMPOSITION OF "OTHER MARINE FISH" (ERS LEVEL) IN LITHUANIA, IN VALUE AND VOLUME, JANUARY 2023**



[14] https://www.bastillepost.com/global/article/2677771-ap-photos-lithuanians-get-good-vibrations-fishing-for-smelt
[15] Svanberg, Ingvar & Bonow, Madeleine & Cios, Stanisław. (2016). Fishing for Smelt, Osmerus eperlanus (Linnaeus, 1758) A traditional food fish—possible cuisine in post-modern Sweden?. Slovak Ethnology/Slovenský národopis. 64.
https://www.academia.edu/26781314/Fishing_for_Smelt_Osmerus_eperlanus_Linnaeus_1758_A_traditional_food_fish_possible_cuisine_in_post_modern_Sweden

Price trend

Figure 25. **EUROPEAN SMELT: FIRST SALES PRICES IN SELECTED COUNTRIES, FEBRUARY 2020 – JANUARY 2023**



Over the 36-month observation period from February 2020-January 2023, the weighted average first-sales price of European smelt in **Lithuania** was 3,96 EUR/kg, 2575% higher than **Latvia** (0,15 EUR/kg) and 437% above that in Estonia (0,74 EUR/kg). The higher first sales price in Lithuania could be explained with consumer demand and preferences. Namely, the smelt supply does not satisfy the market demand enough, which determines the first sales price. The most of supply for the Lithuanian market comes from smelt stocks of the Gulf of Riga – stocks that are less valuable in Latvia and Estonia, countries with lower smelt consumption tradition compared to Lithuania.

In **Estonia** in January 2023, the average first-sales price of European smelt (0,36 EUR/kg) increased by 98% compared to January 2022 and by 41% compared with January 2021. Over the observation period, the average price ranged from 0,14 EUR/kg for 152 kg in September 2020 to 1,53 EUR/kg for 56 kg in June 2020.

In **Latvia** in January 2023, the average first-sales price of European smelt (0,34 EUR/kg) increased by 94% and by 82% compared to the same months in 2022 and 2021 respectively. During the period observed, the lowest average price (0,05 EUR/kg for 36 tonnes) was in December 2022, while the highest average price was recorded in January 2023 at 0,34 EUR/kg for 56 tonnes.

In **Lithuania** in January 2023, the average first-sales price of European smelt (5,75 EUR/kg) fell by 15% compared to January 2022 and increased by 79% compared to January 2021. During the period observed, the lowest average price of 0,77 EUR/kg for 1 tonne was in May 2020, while the highest average price was recorded in December 2022 at 6,02 EUR/kg for 13 tonnes.

1.7. Focus on meagre

Meagre (*Argyrosomus regius*) is a member of the Sciaenidae family. It prefers subtropical areas and can be found at a depth range of 15 m - 300 m. Adults are found inshore and in shelf waters, close to the bottom, as well as in surface and mid-waters, pursuing shoals of clupeids and mugilids. They congregate inshore to spawn during spring and summer. Juveniles and sub-adults enter estuaries and coastal lagoons. Both adults and juveniles are migratory moving along the shore or offshore-onshore in response to temperature changes. Meagre feeds on fish and swimming crustaceans[16].

Meagre can be found in the Eastern Atlantic from Norway to Gibraltar and Congo, including the Mediterranean and the Black Sea. It has also migrated to the Red Sea via the Suez Canal[17].

Based on a Commission Delegated Decision of the EU for the collection and management of biological, environmental, technical and socioeconomic data in the fisheries and aquaculture sectors, data on meagre should be collected in all areas of the Northeast Atlantic[18].

Meagre is harvested by fishing and from aquaculture[19]. Sometimes meagre is gutted and/or filleted soon after harvesting. Studies are being conducted into the best harvesting protocols to optimize the shelf life of the final product. Producers are trying to differentiate between meagre products: smaller fish (600 g to 1 kg) are sold whole or filleted, while bigger fish (1 kg to 3-5 kg) are sliced or filleted and smoked. The meat quality of meagre is considered very good, due to its very high content of polyunsaturated fatty acids.

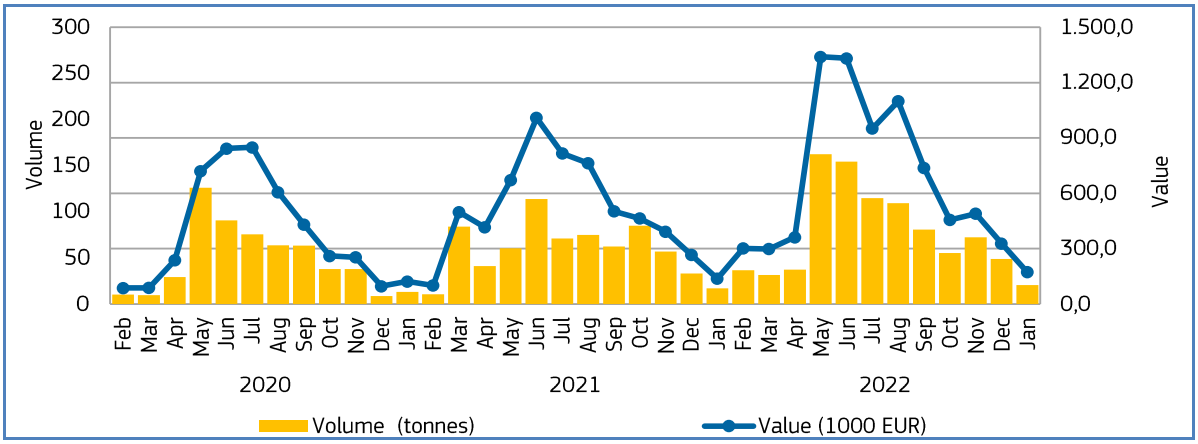
Selected countries

Table 17. **COMPARISON OF MEAGRE FIRST SALES, MAIN PLACES OF SALE, AND CONTRIBUTION TO OVERALL SALES OF OTHER MARINE FISH IN SELECTED COUNTRIES**

Meagre		Changes in meagre first sales Jan 2023 (%)		Contribution of meagre to total "other marine fish" first sales in Jan 2023(%)	Main places of sale in Jan-Jan 2023 in terms of first-sales value
		Compared to Jan 2022	Compared to Jan 2021		
France	**Value**	+26%	+42%	1,4%	La Cotinière, Royan, La Rochelle.
	Volume	+22%	+56%	0,8%	
Portugal	**Value**	-23%	+42%	1,1%	Sesimbra, Peniche, Viana do Castelo.
	Volume	-10%	+73%	0,7%	
Spain	**Value**	-16%	-21%	0,3%	Conil de la Frontera, Isla Cristina, Sanlucar De Barrameda.
	Volume	-21%	-40%	0,2%	

[16] https://www.fishbase.se/summary/418
[17] https://www.fishbase.se/summary/418
[18] Commission Delegated Decision (EU) 2021/1167: https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:32021D1167
[19] https://www.fao.org/fishery/en/culturedspecies/argyrosomus_regius/en

Figure 26. **MEAGRE: FIRST SALES IN FRANCE, FEBRUARY 2020 – JANUARY 2023**



In **France**, over the observed 36-month period (February 2020 to January 2023), the highest first-sales of meagre occurred in May 2022 when 162 tonnes were sold. Meagre fisheries have mostly occurred during the warmer period of the year when meagre aggregate[20] before spawning and when the fishing fleet was more active.

Figure 27. **FIRST SALES: COMPOSITION OF "OTHER MARINE FISH" (ERS LEVEL) IN FRANCE IN VALUE AND VOLUME, JANUARY 2023**

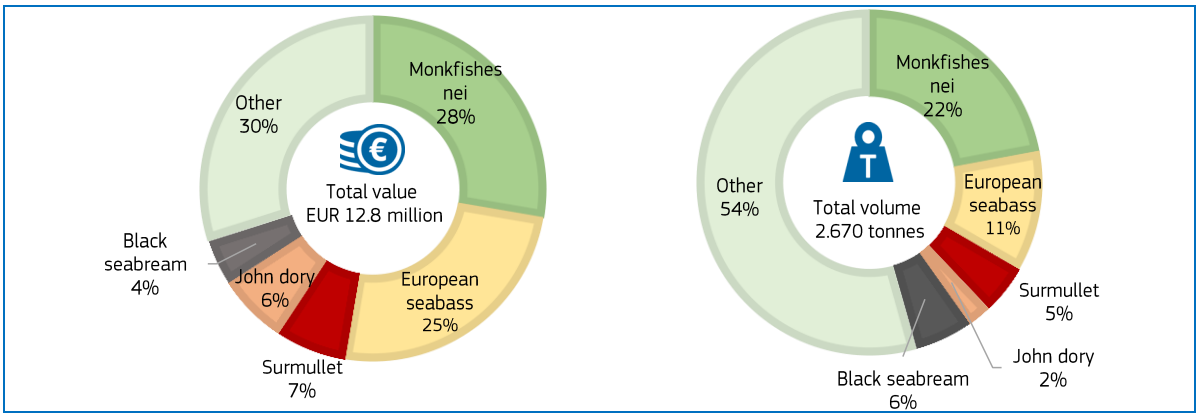
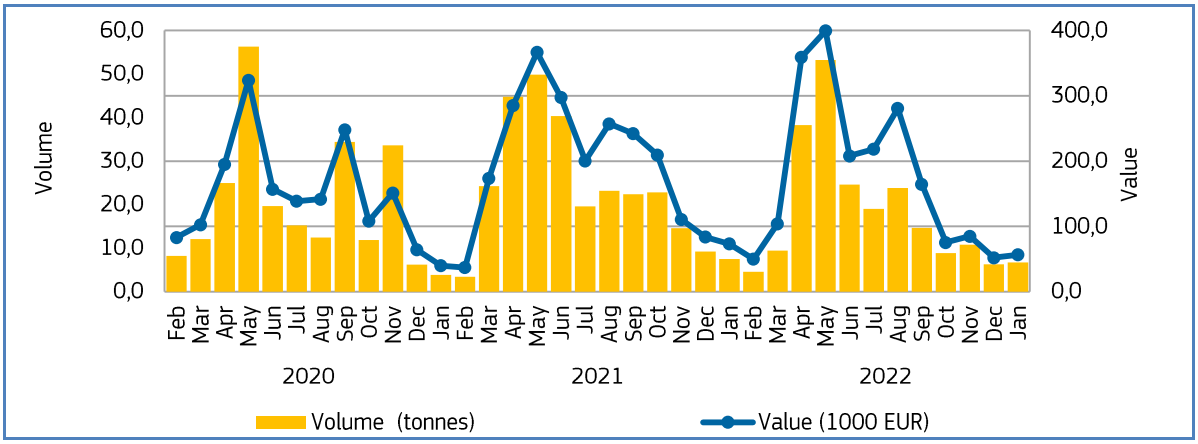


Figure 28. **MEAGRE: FIRST SALES IN PORTUGAL, FEBRUARY 2020 – JANUARY 2023**



[20] https://www.opalesurfcasting.net/IMG/pdf/publication-5370.pdf CNRS-Ifremer, Centre de recherche sur les Ecosystèmes marins et Aquacoles, BP 5, 17137 L'Houmeau – France § CNRS, Centre d'Etudes Biologiques de Chizé, 79360 Villiers-en-Bois, France

In **Portugal** from February 2020 to January 2023, the highest first sales volume of meagre were registered in May 2020, when 56 tonnes were sold. In general, first sales of meagre are usually higher in the warmer period of the year with peaks in April and May when the species migrates into estuarine areas for spawning and nursery grounds.

Figure 29. **FIRST SALES: COMPOSITION OF "OTHER MARINE FISH" (ERS LEVEL) IN PORTUGAL IN VALUE AND VOLUME, JANUARY 2023**

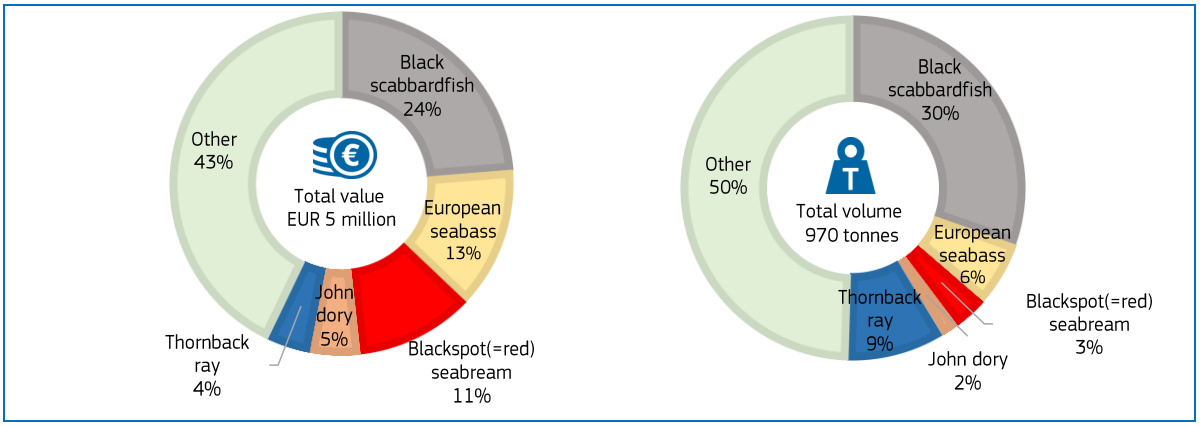
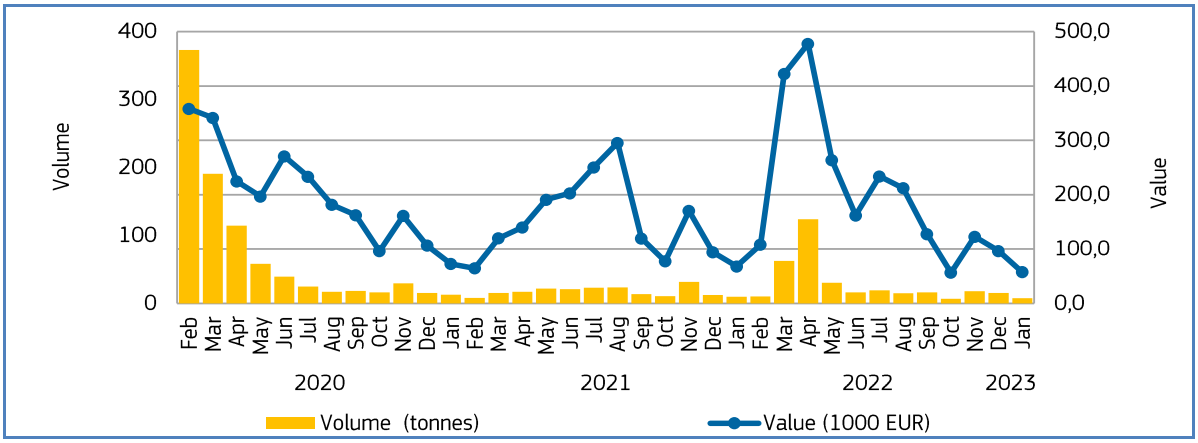
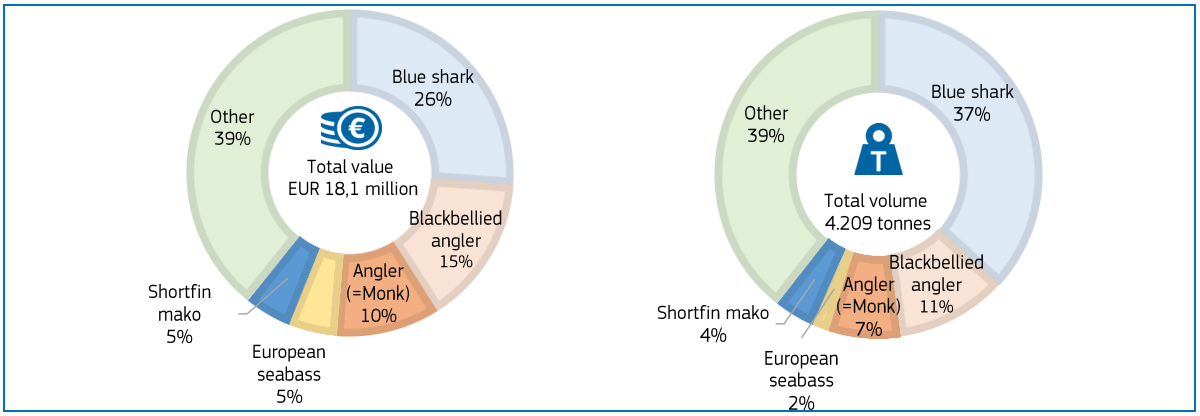


Figure 30. **MEAGRE: FIRST SALES IN SPAIN, FEBRUARY 2020 – JANUARY 2023**



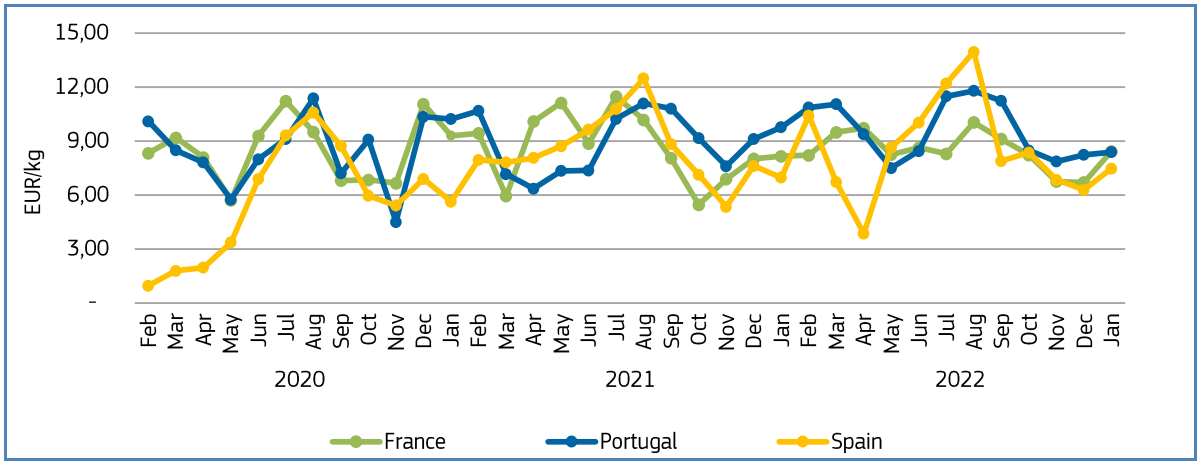
In **Spain**, over the 36-month observation period from February 2020 to January 2022, the highest first sales volume of meagre was registered in February 2020 when 373 tonnes were sold. When analysing reported first sales it was observed that sales of meagre in volume were highest in early 2020, while in the following period volume decreased and first sales price increased due to limited supply. The highest price was reached in summer 2022, which could be linked with the tourist season and demand for seafood products.

Figure 31. **FIRST SALES: COMPOSITION OF "OTHER MARINE FISH" (ERS LEVEL) IN SPAIN IN VALUE AND VOLUME, JANUARY 2023**



Price trend

Figure 32. **MEAGRE: FIRST-SALES PRICE IN SELECTED COUNTRIES* (FEBRUARY 2020 – JANUARY 2023)**



Over the 36-month observation period from February 2020 to January 2023, the weighted average first-sales price of meagre in **France** was 8,40 EUR/kg. This was 1% higher than in **Portugal** (8,29 EUR/kg), and 88% above that in **Spain** (4,47 EUR/kg). The price of meagre was unusually low in February-April 2020. This could be due to higher supply of this species in the market resulting in a decrease in price. Another reason for such a trend could be direct competition with aquaculture production.

In **France** in January 2023, the average first-sales price of meagre was 8,43 EUR/kg, 3% higher than in January 2022, and 9% down compared to January 2021. The lowest price in the past 36 months was registered in October 2021, at 5,46 EUR/kg for 85 tonnes, while the highest price of 11,47 EUR/kg for 71 tonnes was observed in July 2021.

In **Portugal** in January 2023, the average first-sales price of meagre was 8,39 EUR/kg, which was a 14% decrease compared to January 2022 and 18% lower compared to January 2021. The lowest price experienced in the 36-month observation period was registered in November 2020 at 4,51 EUR/kg for 34 tonnes, while the highest price of 11,80 EUR/kg for 24 tonnes was observed in August 2022.

In **Spain** in January 2023, the average first-sales price of meagre was 7,47 EUR/kg. This was 7% above January 2022 and 33% above January 2021. During the period observed, the lowest price was registered in February 2020 at 0,96 EUR/kg for 373 tonnes, while the highest price of 13,96 EUR/kg for 15 tonnes was observed in August 2022.

2. Extra-EU imports

The weekly extra-EU import prices (weighted average values per week, in EUR per kg) for nine different species are examined every month. The three most relevant species in terms of value and volume remain consistent: fresh whole Atlantic salmon from Norway, frozen Alaska pollock fillets from China, and frozen tropical shrimp (Penaeus spp.) from Ecuador. The other six species change each month: three are chosen from the commodity group of the month, and three are randomly selected. The commodity group for this month is "other marine fish", and the featured species are fresh or chilled monkfish from Norway, fresh or chilled European sea bass from Türkiye, and fresh or chilled gilt-head sea bream from Türkiye. The three randomly selected species this month are frozen crabs, even smoked, whether in shell or not from Norway, frozen cape hake from South Africa and fresh or chilled fillets of Nile perch from Uganda.

Data analysed in this section, "Extra-EU imports", are extracted from EUMOFA, as collected from the European Commission[21].

Table 18. **EVOLUTION OF WEEKLY PRICE AND VOLUME OF THE THREE MOST RELEVANT FISHERIES AND AQUACULTURE PRODUCTS IMPORTED INTO THE EU**

Extra-EU Imports		Week 07/2023	Preceding 4-week average	Week 07/2022	Notes
Fresh whole **Atlantic salmon** imported from **Norway** (*Salmo salar*, CN code 03021400)	**Price (EUR/kg)**	9,62	8,18 (+18%)	8,41 (+14%)	Between week 01/2023 and week 07/2023 prices showed an increasing trend, which was also the case for the past three years. Prices ranged from 4,32 EUR/kg (week 44/2020) to 11,28 EUR/kg (week 16/ 2022), the highest observed in the past three years.
	Volume (tonnes)	9.347	9.867 (–5%)	11.476 (–19%)	Supply is seasonal with peaks occurring most often in weeks 35/37, 40/42 and 49/50. In the period analysed volumes show high fluctuations from 5.672 tonnes (week 15/2022) to 19.530 tonnes (week 35/2022).
Frozen **Alaska pollock** fillets imported from **China** (*Theragra chalcogramma*, CN code 03047500)	**Price (EUR/kg)**	3,83	2,76(+39%)	3,09 (+24%)	Over the last three years prices showed an increasing trend reaching a peak of 4,03 EUR/kg in week 41/2022 followed by a decreasing trend, fluctuating greatly at the end of 2022 with a drop in prices to 1,04 EUR/kg in week 01/2023. The drop was probably related to fluctuations in supply in the same period. Prices became stable in the following week up to week 07/2023.[22]
	Volume (tonnes)	2.138	4.067 (–47%)	2.846 (–25%)	Weekly volumes show high fluctuations in the period analysed but do not seem to follow a clear seasonality. Volumes ranged between 587 tonnes (week 15/2020) to 9.133 tonnes (week 03/2023).
Frozen **tropical shrimp** imported from **Ecuador** (genus *Penaeus*, CN code 03061792)	**Price (EUR/kg)**	5,00	5,13 (–3%)	6,03 (–17%)	Weekly prices decreased in the first period analysed, reaching a minimum price of 4,27 EUR/kg (week 38/2020) followed by an increasing trend reaching a maximum price of 7,19 EUR/kg (week 41/2022). In the latest period analysed from week 42/2022 prices showed a downward trend until week 07/2023.
	Volume (tonnes)	2.602	1.755 (+48%)	1.458 (+78%)	Supply is seasonal with peaks occurring most often in the weeks 11/16, 31/33 and 45/46. In the period analysed volumes show high fluctuations, with a minimum of 939 tonnes (week 21/2020) and maximum 4.925 tonnes (week 38/2022).

[21] Last update: 13.03.2023

[22] The drop in prices in frozen Alaska pollock fillets imported from China between the end of 2022 and beginning of 2023 could be related to the Russian invasion of Ukraine as 95% of Alaska pollack imported from China comes from Russia. A second reason ot the price drop coule be linked to China stopping screening frozen meat and seafood for Covid-19 contamination from the beginning of 2023. https://thefishsite.com/articles/china-to-end-covid-19-tests-on-frozen-meat-and-seafood

Figure 33. **IMPORT PRICE OF FRESH AND WHOLE ATLANTIC SALMON FROM NORWAY, 2020 – 2023**

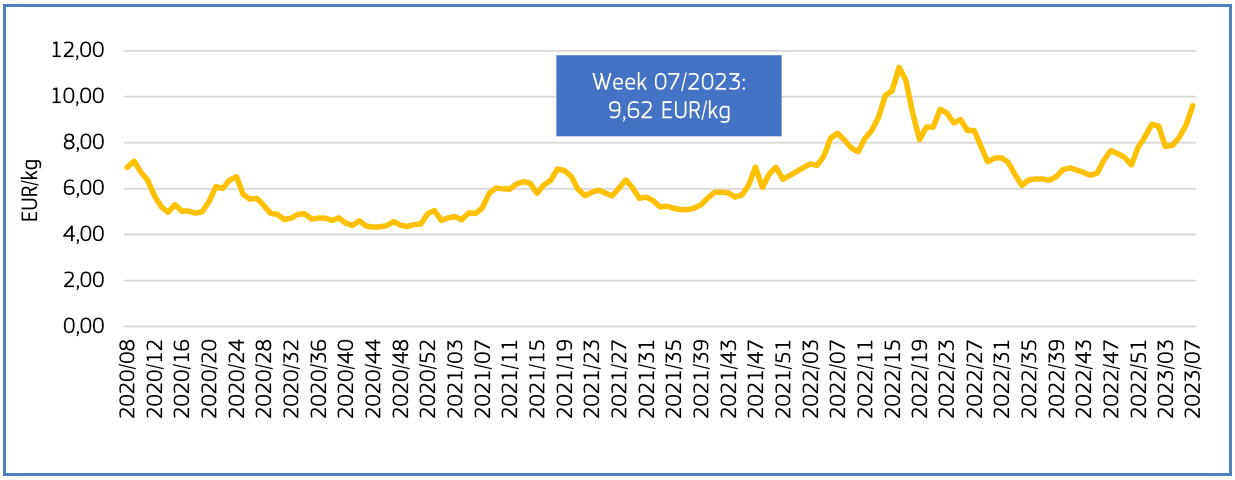


Figure 34. **IMPORT PRICE OF FROZEN ALASKA POLLOCK FILLETS FROM CHINA, 2020 – 2023**

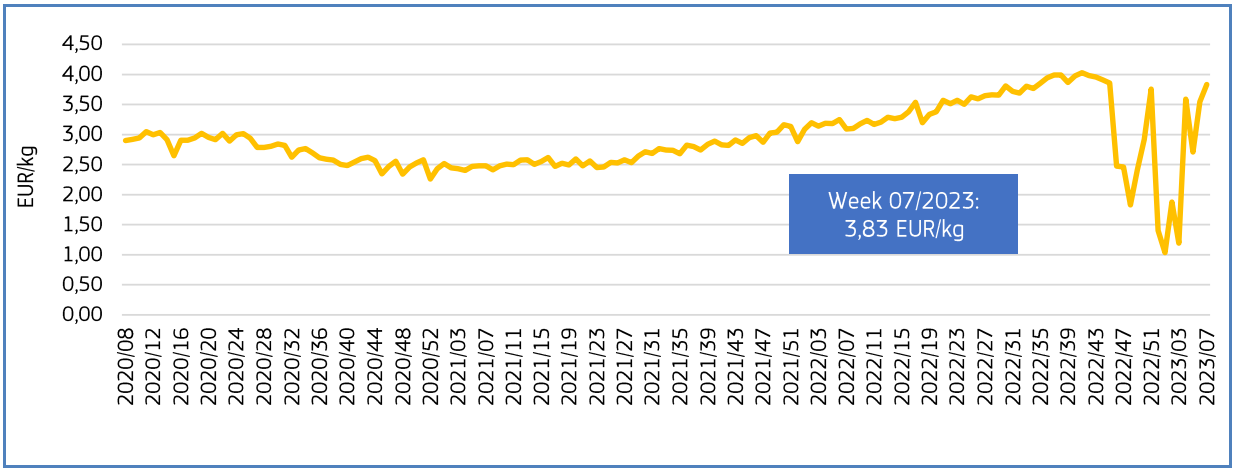


Figure 35. **IMPORT PRICE OF FROZEN TROPICAL SHRIMP FROM ECUADOR, 2020 – 2023**

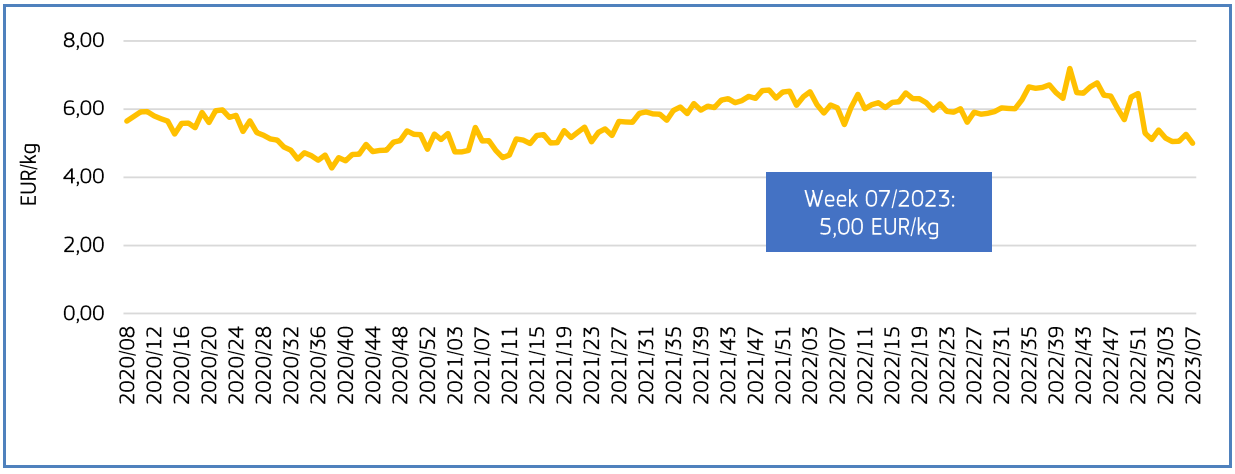


Table 19. **EVOLUTION OF WEEKLY PRICE AND VOLUME OF THIS MONTH'S THREE FEATURED COMMODITY PRODUCTS IMPORTED INTO THE EU**

Extra-EU Imports		Week 07/2023	Preceding 4-week average	Week 07/2022	Notes
Fresh or chilled **monkfish** from **Norway** (*Lophius* spp., CN code 03028950)	**Price (EUR/kg)**	10,02	10,03 (0%)	8,54 (+17%)	Between week 08/2020 and week 07/2023 prices showed an increasing trend. Prices fluctuated widely from 2,67 EUR/kg (week 13/2020) to 12,95 EUR/kg (week 51/2022). 70% of the weekly prices were lower than 8,00 EUR/kg.
	Volume (tonnes)	6	9 (–31%)	13 (–50%)	Supply is seasonal with peaks occurring most often between weeks 22/24, 33/37, 42/44 and 46/49. Volumes show high fluctuations ranging from 1 tonne (week 52/ 2020) to 56 tonnes (week 35/2021). 41% of the weekly supply was less than 20 tonnes.
Fresh or chilled **European seabass** from **Türkiye** (*Dicentrarchus labrax*, CN code 03028410)	**Price (EUR/kg)**	5,93	6,01 (-1%)	5,24 (+13%)	In the period analysed prices showed an increasing trend. Prices fluctuated from 3,88 EUR/kg (week 08 of 2020) to 6,66 EUR/kg (week 26 of 2022). 79% of the weekly prices were between 4,00 EUR/kg and 6,00 EUR/kg.
	Volume (tonnes)	291	303 (–4%)	391 (–25%)	Weekly volumes show high fluctuations in supply from 2020 to 2023, from 212 tonnes (week 23 of 2022) to 560 tonnes (week 27 of 2020). Between week 08/2020 and week 07/2023 volumes showed a decreasing trend. 64% of the weekly volumes were less than 400 tonnes.
Fresh or chilled **gilthead seabream** imported from **Türkiye** (*Sparus aurata*, CN code 03028530)	**Price (EUR/kg)**	4,81	4,75 (+1%)	4,21 (+14%)	Between week 08/2020 and week 07/2023 prices increased. Prices ranged from 3,40 EUR/kg (week 02/2021) to 5,44 EUR/kg (week 27/2022). 48% of the weekly prices were between 4,00 EUR/kg and 5,00 EUR/kg.
	Volume (tonnes)	572	581 (–2%)	771 (–26%)	Weekly volumes show high fluctuations along the period analysed but do not seem to follow a clear seasonality. Supply ranged from 330 tonnes (week 13/2020) to 969 tonnes (week 02/2022). 57% of the weekly volumes were more than 700 tonnes.

Figure 36. **IMPORT PRICE OF FRESH OR CHILLED MONKFISH FROM NORWAY, 2020 – 2023**

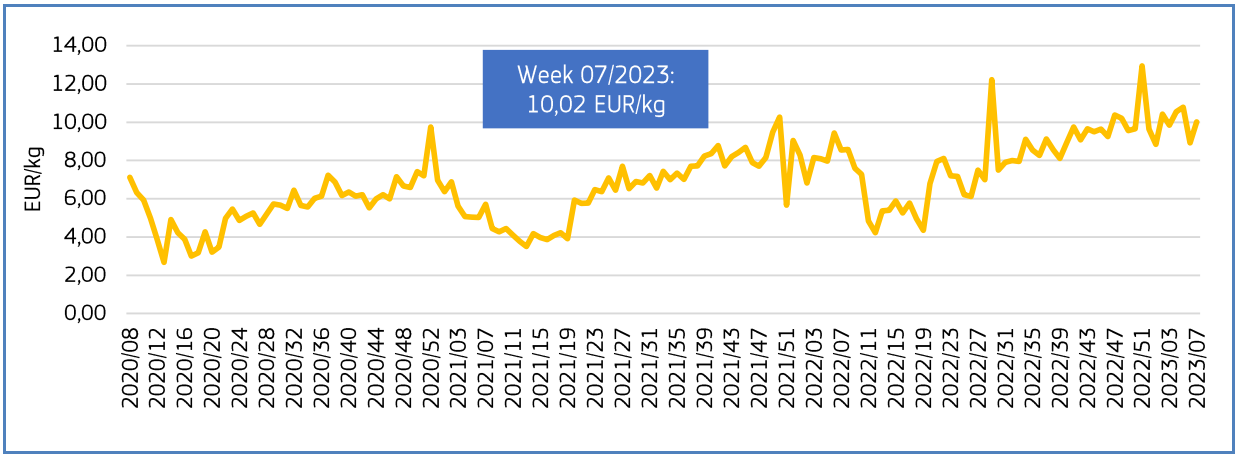


Figure 37. **IMPORT PRICE OF FRESH OR CHILLED EUROPEAN SEABASS FROM TÜRKIYE, 2020 – 2023**

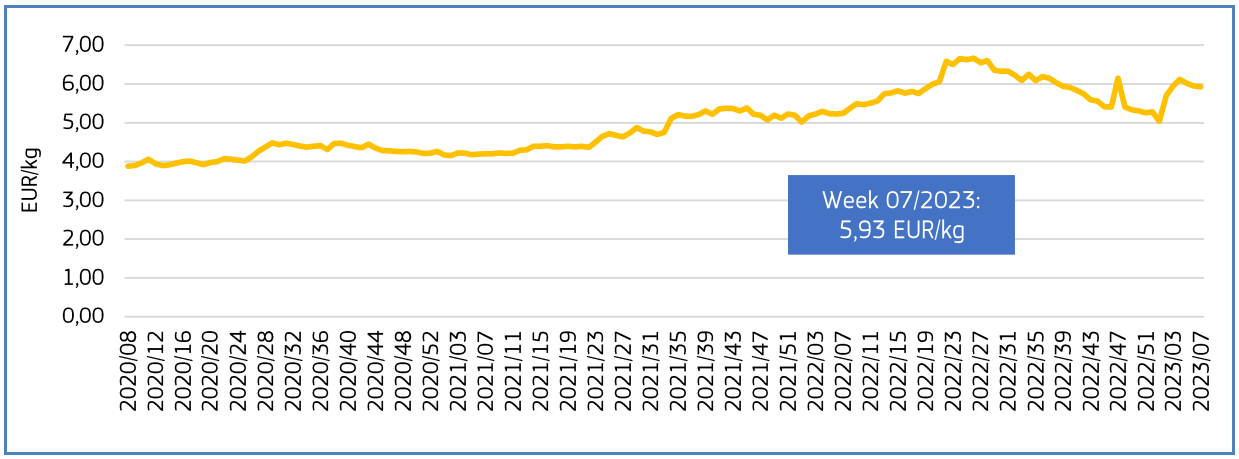
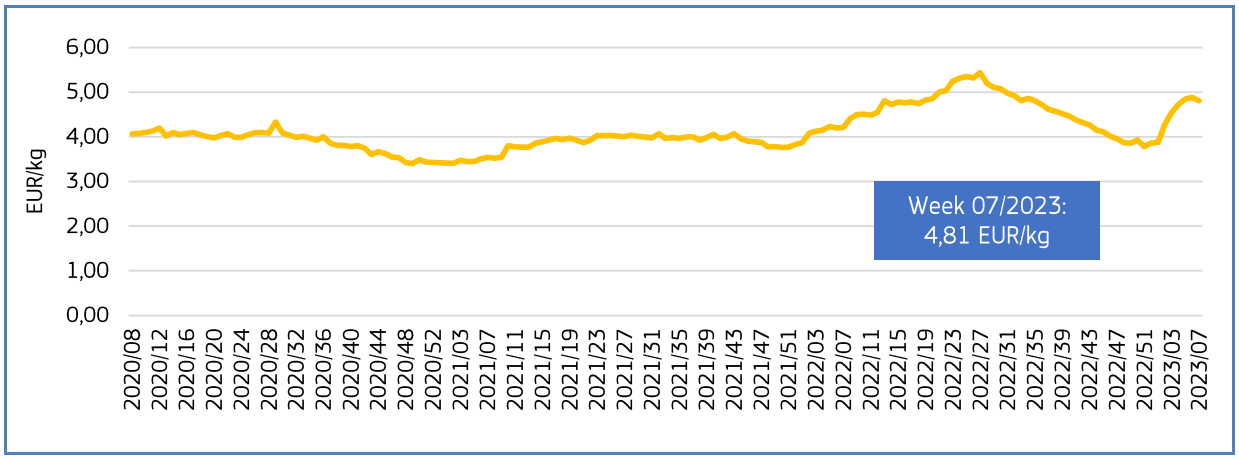


Figure 38. **IMPORT PRICE OF FRESH OR CHILLED GILTHEAD SEA BREAM FROM TÜRKIYE, 2020 – 2023**



Volume of fresh or chilled **monkfish** from **Norway** showed a downward trend between week 01/2023 and week 07/2023, while price increased. In this period, price ranged from 8,85 to 10,79 EUR/kg, with weekly supply from 5 to 15 tonnes.

Between week 01/2023 and week 07/2023, the price of fresh or chilled **European seabass** from **Türkiye** had an increasing trend. Price ranged from 5,04 to 6,12 EUR/kg, and supply fluctuated from 264 to 335 tonnes.

Between the first week of 2023 and week 07/2023 price of fresh or chilled **gilthead seabream** from **Türkiye** showed an increasing trend. Price ranged from 3,87 to 4,88 EUR/kg, and volume from 514 to 635 tonnes.

Table 20. **EVOLUTION OF WEEKLY PRICE AND VOLUME OF EU IMPORTS OF THREE OTHER FISHERIES AND AQUACULTURE PRODUCTS RELEVANT TO THE EU MARKET**

Extra-EU Imports		Week 07/2023	Preceding 4-week average	Week 07/2022	Notes
Frozen **crabs**, even smoked, whether in shell or not, incl. crabs in shell, cooked by steaming or by boiling in water from **Norway** (*Paralithodes camchaticus, Chionoecetes* spp. *and Callinectes sapidus*, CN code 03061410)	**Price (EUR/kg)**	15,48	45,45 (–66%)	75,63 (–80%)	Prices showed high fluctuations and an upward trend until week 27/2022 reaching a peak of 92,78 EUR/kg, followed by a downward trend to a minimum price of 11,55 EUR/kg (week 05/2023). 41% of the weekly prices were higher than 50,00 EUR/kg.
	Volume (tonnes)	16	7 (+125%)	1 (+1145%)	High fluctuations in supply where high peaks seem to occur most often between weeks 1/3, 4/7 and 44/47, varying from 0,005 tonnes (week 19/2020) to 36 tonnes (week 44/2022). 85% of the weekly supply was lower than 10 tonnes.
Frozen **Cape hake** from **South Africa** (*Merluccius capensis, Merluccius paradoxus* CN code 03036611)	**Price (EUR/kg)**	3,30	3,15 (+5%)	2,84 (+16%)	Between week 08/2020 and week 07/2023 prices showed slight fluctuations with prices ranging between 2,13 EUR/kg (week 40/2021) to 4,16 EUR/kg (week 14/2020). 68% of weekly prices were between 2,50 EUR/kg and 3,00 EUR/kg.
	Volume (tonnes)	550	446 (+23%)	819 (–33%)	High fluctuations in supply from 9 tonnes (week 44/2022) to 1.998 tonnes (week 41/2020). In the period analysed the highest peaks in supply seem to occur between weeks 38 and 48. 32% of the weekly supply was higher than 600 tonnes.
Fresh or chilled fillets of **Nile perch** from **Uganda** (*Lates niloticus* CN code 03043300)	**Price (EUR/kg)**	5,13	5,26 (–3%)	7,24 (–29%)	High fluctuation in prices that reached the peak of 8,33EUR/kg (week 16/2021), followed by a downward trend to the minimum price of 4,15 EUR/kg (week 45/2022). 51% of weekly prices were between 5,00 EUR/kg and 7,00 EUR/kg.
	Volume (tonnes)	89	76 (+17%)	71 (+24%)	From 2020 to 2023 weekly supply decreased fluctuating from 12 tonnes (week 15/2020) to 159 tonnes (week 23/2020). 48% of the weekly volumes were below 80 tonnes.

Figure 39. **IMPORT PRICE OF FROZEN CRABS FROM NORWAY, 2020 - 2023**

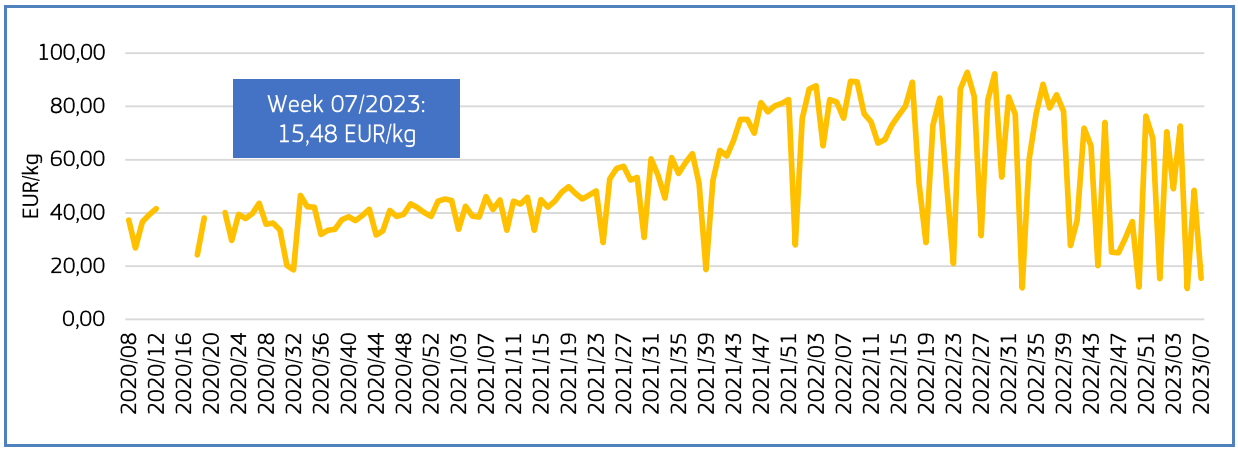


Figure 40. **IMPORT PRICE OF FROZEN CAPE HAKE FROM SOUTH AFRICA, 2020 - 2023**

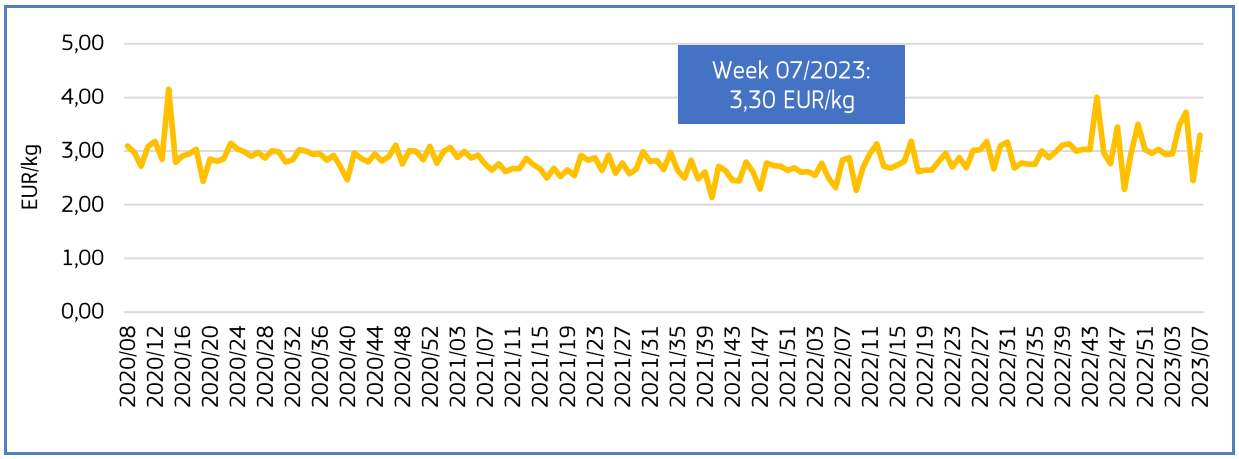
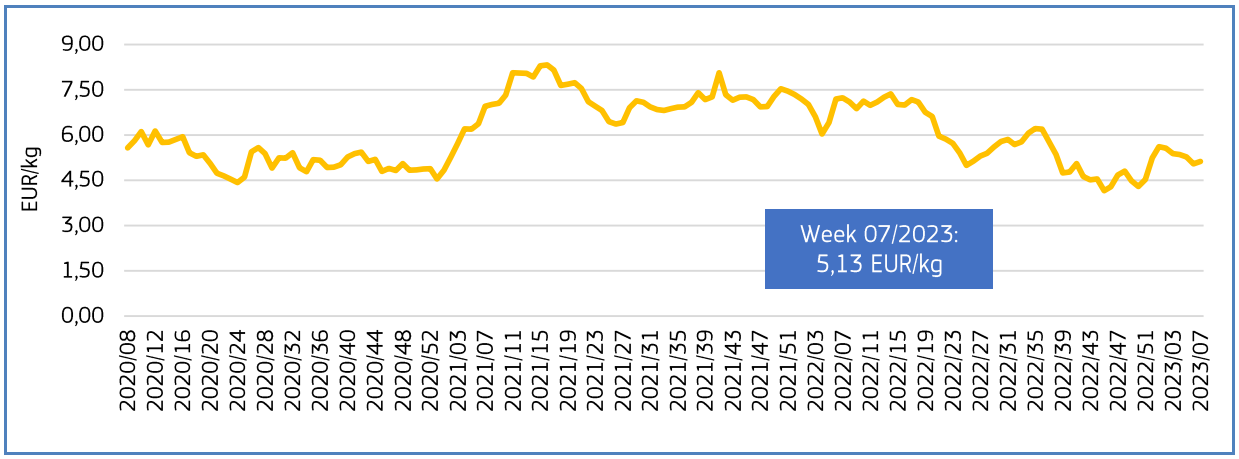


Figure 41. **IMPORT PRICE OF FRESH OR CHILLED FILLETS OF NILE PERCH FROM UGANDA, 2020 - 2023**



In 2023, both price and volume of frozen **crabs** from **Norway** showed high fluctuations. Price ranged from 11,55 EUR/kg to 72,67 EUR/kg and volume from 2 tonnes to 18 tonnes.

Between week 01/2023 and week 07/2023 price of frozen **cape hake** from **South Africa** increased. Price ranged from 2,45 EUR/kg to 3,73 EUR/kg and weekly supply showed high fluctuations from 62 tonnes to 1.199 tonnes.

Since the beginning of the year, price of fresh or chilled fillets of **Nile perch** from **Uganda** had a downward trend. Price ranged from 5,04 EUR/kg to 5,61 EUR/kg and supply fluctuated from 55 tonnes to 101 tonnes.

3. Consumption

3.1. HOUSEHOLD CONSUMPTION IN THE EU

Data analysed in this section, "*Consumption*", are extracted from EUMOFA, as collected from Europanel[23].

In January 2023 compared to January 2022, household consumption of fresh fisheries and aquaculture products declined in both volume and value in all Member States analysed.

The highest drop was observed in Denmark, with a 39% decrease in volume and 34% decrease in value. Dab, flounder and cod were the main species responsible for the decline, as the volume consumed of these species fell by 78%, 40% and 66% respectively, while their decrease in value was 74%, 47% and 60%. One possible explanation behind reduced cod consumption, according to EUMOFA experts, could be the reduction in supply from the main capture countries due to fewer catches and reduced exports. Moreover, cod prices have increased greatly and fewer products, especially fresh products, are available for consumers.

Table 21. **JANUARY OVERVIEW OF THE REPORTING COUNTRIES (volume in tonnes and value in million EUR)**

Country	Per capita consumption 2020* (live weight equivalent, LWE) kg/capita/year	January 2021		January 2022		December 2022		January 2023		Change from January 2022 to January 2023	
		Volume	Value	Volume	Value	Volume	Value	Volume	Value	Volume	Value
Denmark	35,17	1.195	18,59	1.139	18,66	814	17,36	700	12,26	39%	34%
France	32,56	17.891	224,01	15.338	196,60	23.634	317,96	13.419	193,35	13%	2%
Germany	12,81	8.231	113,06	6.182	89,15	6.747	105,31	5.516	83,79	11%	6%
Hungary	6,50	373	2,37	270	1,90	1.278	9,96	232	1,86	14%	2%
Ireland	21,22	1.028	16,04	957	15,17	1.115	20,80	837	14,76	13%	3%
Italy	29,99	26.954	295,59	25.014	283,66	35.743	457,80	17.504	221,71	30%	22%
Netherlands	20,70	2.659	44,17	2.695	46,08	3.398	73,49	2.057	38,86	24%	16%
Poland	13,33	3.855	26,71	3.449	26,60	10.169	83,13	2.852	25,01	17%	6%
Portugal	57,67	6.422	42,61	5.348	38,56	5.932	53,40	4.187	33,40	22%	13%
Spain	44,21	48.500	435,02	42.530	392,53	46.357	483,98	37.823	376,63	11%	4%
Sweden	23,99	930	11,96	621	8,87	820	13,00	448	6,94	28%	22%

Source: EUMOFA, based on Europanel (updated 23.03.2023).
**Data on per capita consumption of all fish and seafood products for all EU Member States can be found at:*
https://www.eumofa.eu/documents/20178/521182/EFM2022_EN.pdf/

Over the past three years, the average household consumption of fresh fisheries and aquaculture products in January has been below the annual average in both volume and value in most Member States, except for Germany, where there has been an increase in both volume and value of 7% and 1% respectively.

The most recent weekly consumption data (up to **week 14 of 2023**) are available on the EUMOFA website and can be accessed **here**.

[23] Last update: 23.03.2023.

3.2. Fresh sardine

Habitat: The species belongs to the Clupeidae family. Sardine is a subtropical, littoral species living in a depth range of 10m -100 m. They form schools, usually at depths of 25 m - 100 m by day, while they rise to 10 m - 35 m at night. The species mainly feeds on planktonic crustaceans, as well as on larger organisms. Sardine spawns in batches in the open sea or near the coast, producing 50.000-60.000 eggs[24].
Catch area: Northeast Atlantic: they are rare around Iceland, and they mainly spread from the North Sea, southward to Senegal. They also inhabit the Mediterranean, (they are common in the western part and in the Adriatic Sea but rare in the eastern part), the Sea of Marmara and the Black Sea.
Catching countries in the EU: Spain, France, Portugal, Italy[25].
Production method: Caught.
Main consumers in the EU: Spain, France, Portugal, Italy.
Presentation: Whole, filleted.
Preservation: Fresh, frozen, canned, salted, hot-cold-smoked.
Means of preparation: Cooked, grilled, baked.

3.2.1. Overview of household consumption in France, Portugal and Spain

Portugal, Spain and France are among the EU Member States with the highest per capita apparent consumption[26] of fisheries and aquaculture products. In 2020, per capita apparent consumption was highest in Portugal, 57,67 kg LWE[27], despite a 4% decrease from 2019. The second highest consumption was estimated for Spain, 44,21 kg LWE, while in fourth place was France with 32,56 kg LWE. These were 148%, 90% and 40% higher than the EU average (23,28 kg LWE) respectively.

In 2020, per capita apparent consumption of fisheries and aquaculture products in Ireland, the Netherlands, Poland, Germany and Hungary was below the EU average, with 21,22 kg LWE in Ireland, 20,70 kg LWE in the Netherlands, 13,33 kg LWE in Poland, 12,81 kg LWE in Germany and 6,50 kg LWE in Hungary respectively.

See more on per capita apparent consumption in the EU in Table 21.

We have covered **sardine** in previous *Monthly Highlights*:

First Sales: France 9/2018, 8/2017; Greece 8/2017, 3/2016, 7/2013; Italy 9/2018, 8/2017; France 6/2020; Portugal 5/2015, 2/2013; the UK 9/2018.

Consumption: France 4/2020, 1/2018; Greece 3/2015; Portugal 4/2020, 1/2018, 1/2016, 3/2015; Spain 4/2020, 1/2018, 1/2016, 3/2015; the UK 1/2016, 3/2015.

Extra-EU Imports: Morocco 1/2023, 5/2022, 5/2021, 4/2021, 11/2020, 5/2020, 3/2019, 9/2018, 1/2018; Thailand 1/2018.

Topic of the month: Species profile about sardine and sardine-type products 5/2021, Sardine market in the EU 7/2016

[24] https://www.fishbase.se/summary/sardina-pilchardus.html
[25] https://www.eumofa.eu/documents/20178/381576/MH4-20_EN.pdf
[26] "Apparent consumption" is calculated by using the supply balance sheet that provides an estimate of the supply of fisheries and aquaculture products available for human consumption at EU level. The calculation of the supply balance sheet is based on the equation: *Apparent consumption = [(total catches – industrial catches) + aquaculture + imports] – exports*. Catches targeted for fishmeal (industrial catches) are excluded. Non-food use products are also excluded from imports and exports. It is worth underlining that the methodologies for estimating apparent consumption at EU and Member State levels are different, the first based on data and estimates as described in the Methodological background, the latter also requiring the adjustment of abnormal trends due to the higher impact of stock changes.
[27] Live Weight Equivalent

During the period February 2020–January 2023, the retail price of sardine was highest in France (6,49 EUR/kg), with a total 10.261 tonnes sold. In Portugal there was considerable monthly variation in volume with the highest volume registered in June 2020 of 1.258 tonnes, and the minimum volume of 42 tonnes was registered in February 2022. Spain registered the highest sales, with a total of 167.672 tonnes within the three years, and an average price of 5,90 EUR/kg.

Figure 42. **PRICES OF FRESH SARDINE PURCHASED BY FRENCH, PORTUGUESE AND SPANISH HOUSEHOLDS**

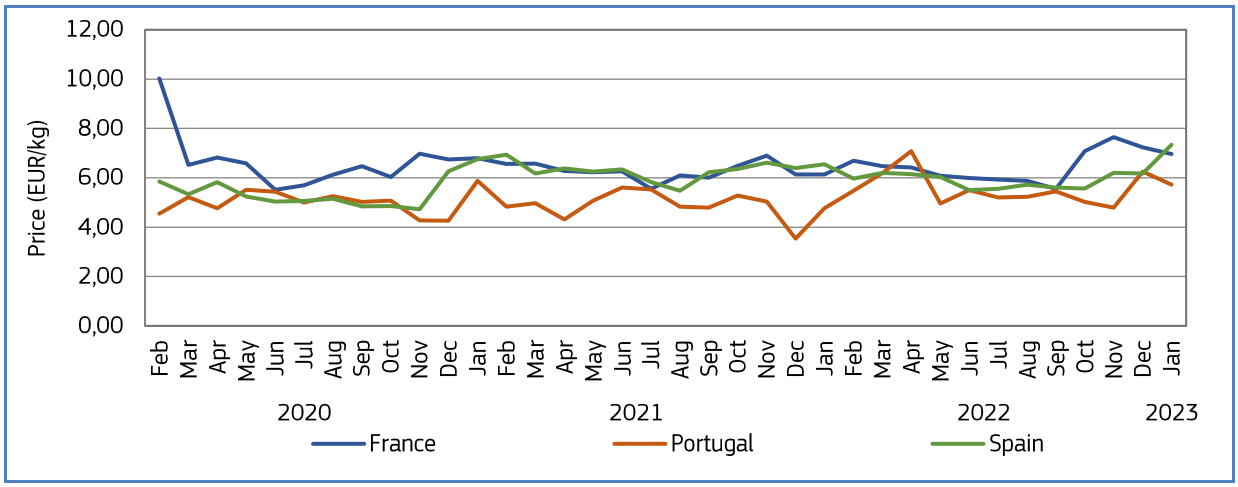
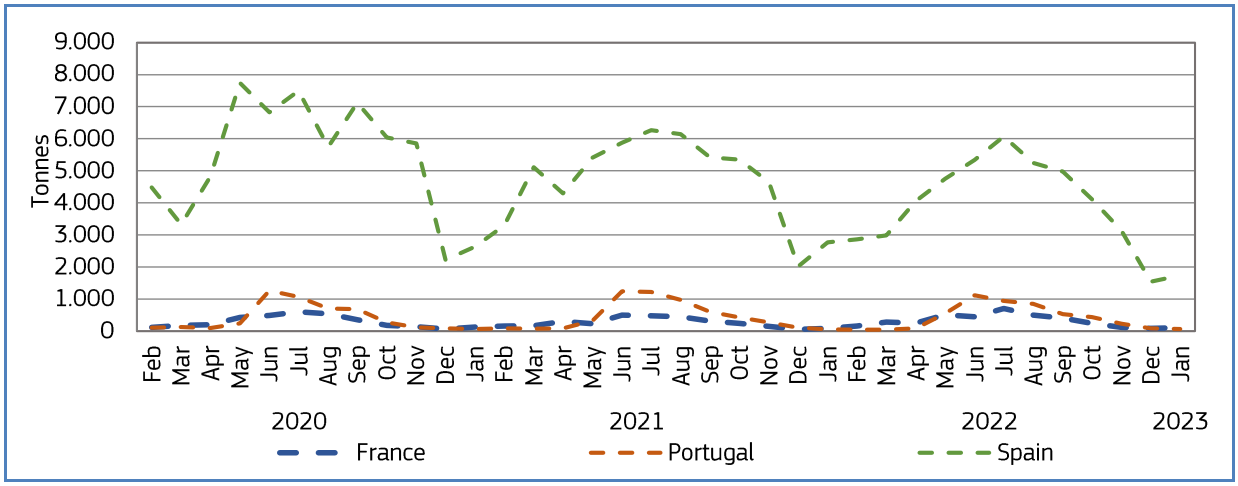


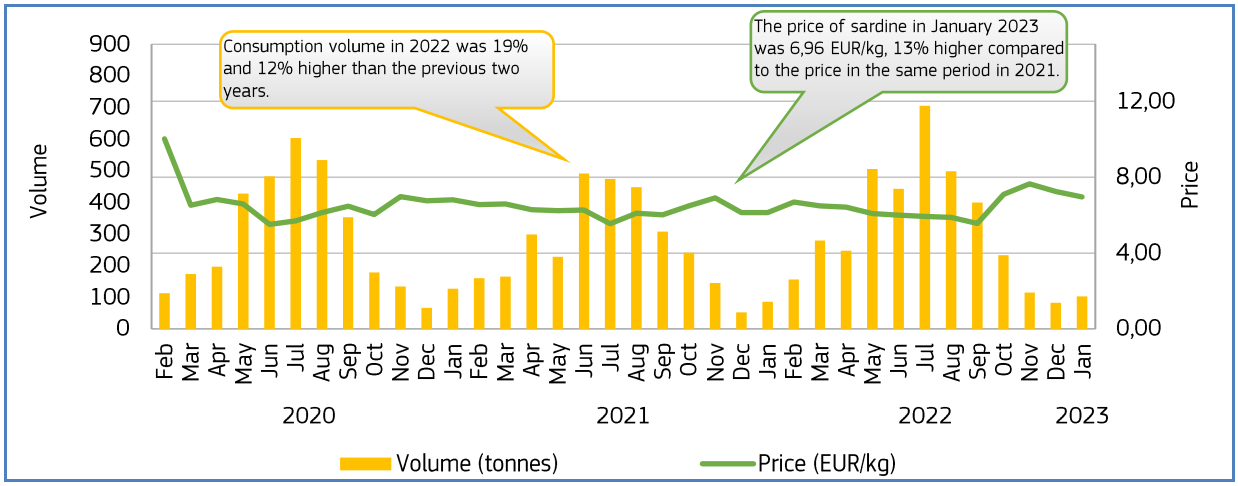
Figure 43. **HOUSEHOLD PURCHASES OF FRESH SARDINE IN FRANCE, PORTUGAL AND SPAIN**



3.2.2. Household consumption trends in France

Long-term trend (February 2020 to January 2023): Fluctuating prices and seasonality in volumes (peaks in June-July).
Yearly average price: 6,71 EUR/kg (2020), 6,32 EUR/kg (2021), 6,43 EUR/kg (2022).
Yearly consumption: 3.351 tonnes (2020), 3.140 tonnes (2021), 3.753 tonnes (2022).
Price: 6,96 EUR/kg (January 2023).
Consumption: 103 tonnes (January 2023).

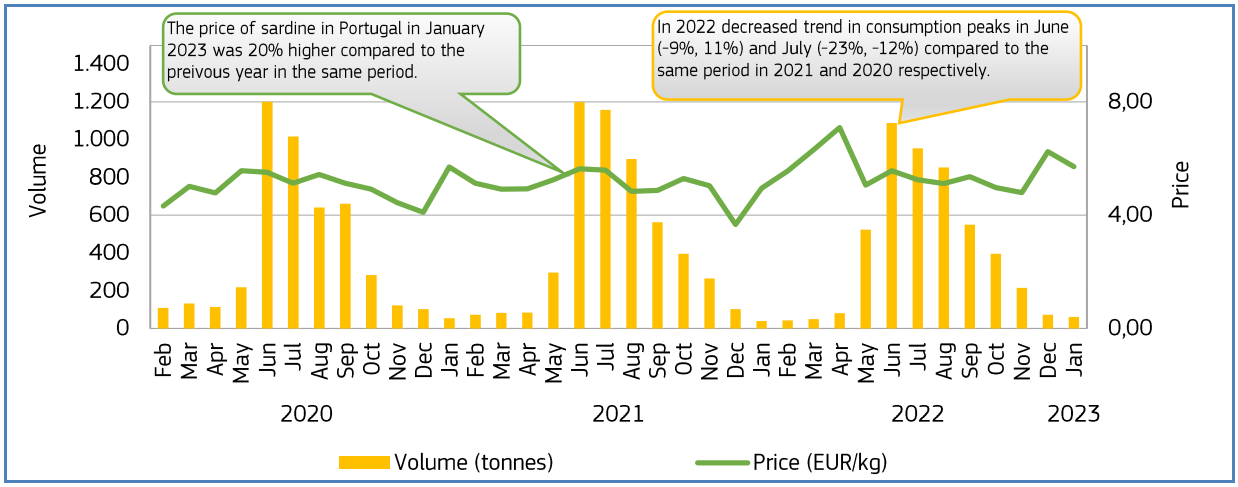
Figure 44. **RETAIL PRICE AND VOLUME OF FRESH SARDINE PURCHASED BY HOUSEHOLDS IN FRANCE, FEBRUARY 2020 – JANUARY 2023**



3.2.3. Household consumption trends in Portugal

Long-term trend (February 2020 to January 2023): Fluctuating prices and seasonality in volumes (peaks in June).
Yearly average price: 4,90 EUR/kg (2020), 4,98 EUR/kg (2021), 5,50 EUR/kg (2022).
Yearly consumption: 4.806 tonnes (2020), 5.447 tonnes (2021), 4.928 tonnes (2022).
Price: 5,72 EUR/kg (January 2023).
Consumption: 60 tonnes (January 2023).

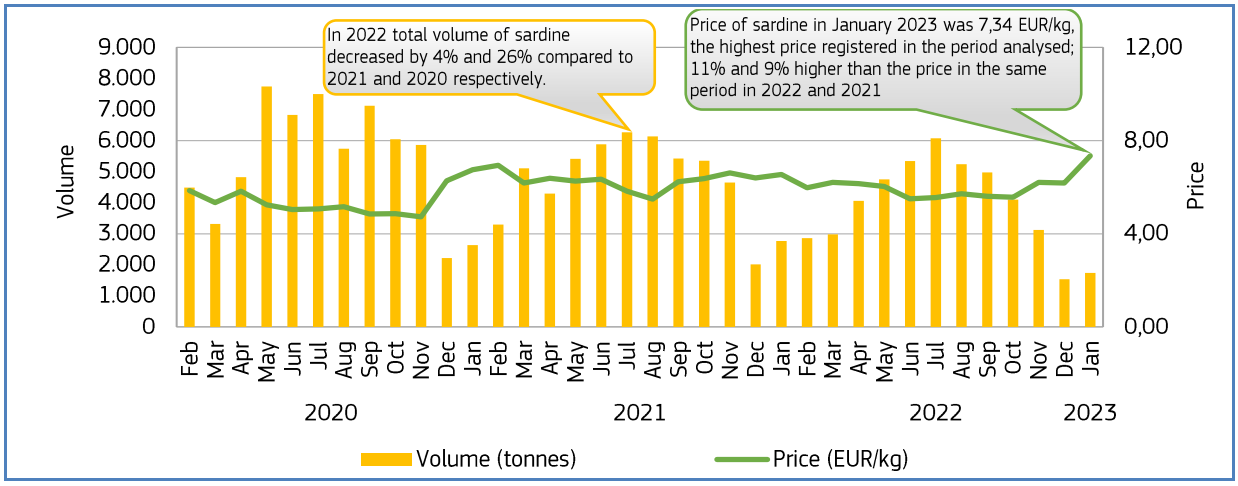
Figure 45. **RETAIL PRICE AND VOLUME OF FRESH SARDINE PURCHASED BY HOUSEHOLDS IN PORTUGAL, FEBRUARY 2020 – JANUARY 2023**



3.2.4. Household consumption trends in Spain

Long-term trend (February 2020 to January 2023): Fluctuating prices and seasonality in volumes (peaks in June).
Yearly average price: 5,32 EUR/kg (2020), 6,31 EUR/kg (2021), 5,94 EUR/kg (2022).
Yearly consumption: 64.201 tonnes (2020), 56.463 tonnes (2021), 47.808 tonnes (2022).
Price: 7,34 EUR/kg (January 2023).
Consumption: 1.737 tonnes (January 2023).

Figure 46. **RETAIL PRICE AND VOLUME OF FRESH SARDINE PURCHASED BY HOUSEHOLDS IN SPAIN, FEBRUARY 2020 – JANUARY 2023**



4. Case study: Fisheries and aquaculture in the UK

The United Kingdom (UK) comprises the island of Great Britain, which contains England, Wales and Scotland, as well as the northern part of the island of Ireland[28]. The UK only shares a border with the Irish Republic and is surrounded by the North Sea to the east, the Irish Sea to the west (southeast of Northern Ireland), the North Atlantic Ocean to the north, and the English Channel to the south.

The UK is a major producer of fishery and aquaculture products (FAPs), but due to differences in consumption habits and what is caught, the UK has been a net importer of FAPs since 1984[29].

Important main commercial species (MCS) caught in the UK are mackerel, herring, blue whiting and haddock, while Atlantic salmon is the main species farmed[30]. UK consumers prefer cod and haddock which are served in their fish and chips shops[31]. Most of the cod and haddock consumed come from the Icelandic, Norwegian and Barents Seas. Both cod and haddock are among the top ten exported MCS from the EU to the UK[32].

Source: CIA, the world factbook.

4.1 Fisheries and aquaculture in the UK

The UK has a long fishing history, both in its own waters and further afield, especially in Icelandic and Norwegian waters[29]. In the late 1900's several disputes over how close to Icelandic shores UK vessels could fish occurred, which led to the First (1958-1961), Second (1972-1973) and Third (1975-1976) Cod Wars. As a result of the wars Iceland expanded its exclusive fishing zone to 200 nautical miles, effectively ending British long-distance fishing[33].

In 1970, the European Economic Community (EEC) established the Common Fisheries Policy[34] (CFP) which allowed equal access to community waters by all community members after ten years[29].

Fishing and control of UK waters were a key part of the Brexit referendum with those supporting Brexit arguing that the UK would be able to take back control of its Exclusive Economic Zone (EEZ) and fishing quotas[29]. Under the EU-UK Trade and Cooperation Agreement (TCA), there is a five-year transition period, which started in January 2021[35]. During this transition, 25% of the EU's fishing quota in UK waters will be transferred to the UK. After this, there will be annual consultations on fishing opportunities.

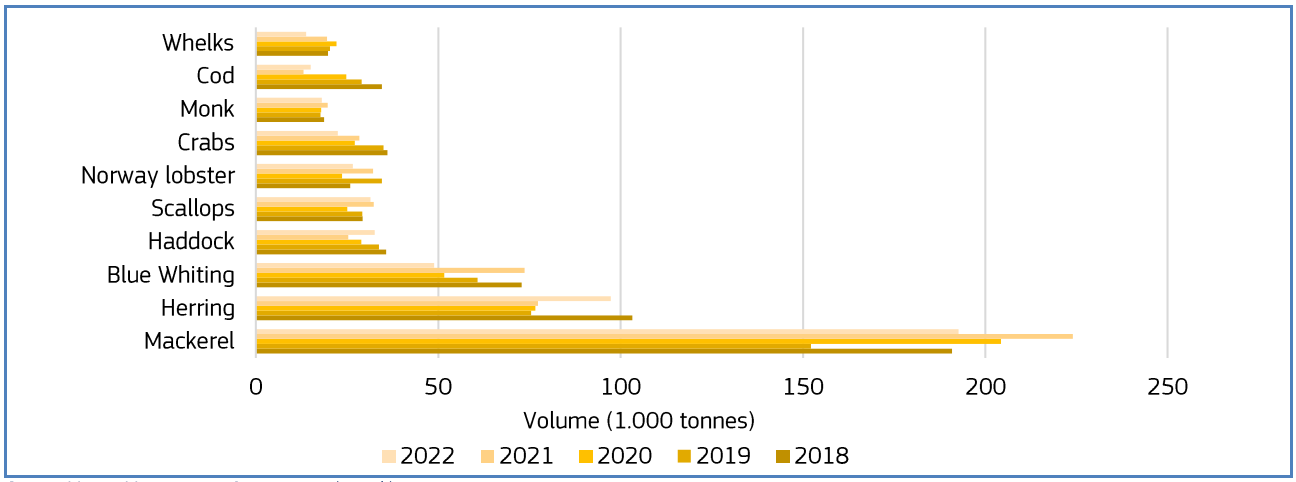
Fisheries production

In 2022, fisheries production in the UK amounted to 598.192 tonnes (LWE) at a value of EUR 1,1 billion[36]. Compared to 2021, this was an 8% decrease in terms of volume and a 0,4% decrease in terms of value. The decrease in volume was mainly related to reduced landings of mackerel (14%) and blue whiting (34%), and to a lesser extent crabs (21%), whelks (30%) and nephrops (17%). Apart from the overall reduction in landing volumes, the decreased value was related to lower prices of high-valued species such as lobster and other shellfish.

Mackerel (32%), herring (16%) and blue whiting (8%) made up most of the landed volume (57%) by UK vessels (into the UK and abroad, Figure 47), while mackerel (23%), nephrops (11%), herring (6%), crabs (6%) and cod (6%) accounted for most of the value (52%)[36]. Most of the UK fisheries took place in the northeast Atlantic (99%)[37].

[28] Barr, N.A., et al. (2023). *United Kingdom. Encyclopedia Britannica.* https://www.britannica.com/place/United-Kingdom
[29] United States Department of Agriculture (2021). *United Kingdom – Fish and seafood market update 2021.* https://www.fas.usda.gov/data/united-kingdom-united-kingdom-fish-and-seafood-market-update
[30] Marine Management Department and Food and Agriculture Organisation.
[31] UK Fisheries. *UK fish consumption.* UK Fisheries - UK fish consumption
[32] Eurostat-Comext. The dataset does not include export of the MCS other non-food use, other products, fish oil and fishmeal.
[33] The National Archives (2023). *The Cod Wars.* https://www.nationalarchives.gov.uk/cabinetpapers/themes/cod-wars.htm
[34] European Commission (2023). *Common fisheries policy (CFP).* https://oceans-and-fisheries.ec.europa.eu/policy/common-fisheries-policy-cfp_en
[35] European Commission (2023). *Relations with the United Kingdom.* https://commission.europa.eu/strategy-and-policy/relations-non-eu-countries/relations-united-kingdom_en
[36] Marine Management Organisation (2023). https://www.gov.uk/government/collections/monthly-uk-sea-fisheries-statistics
[37] FAO statistics.

Figure 47. **TOP 10 LANDED SPECIES INTO THE UK AND ABROAD BY UK VESSELS**



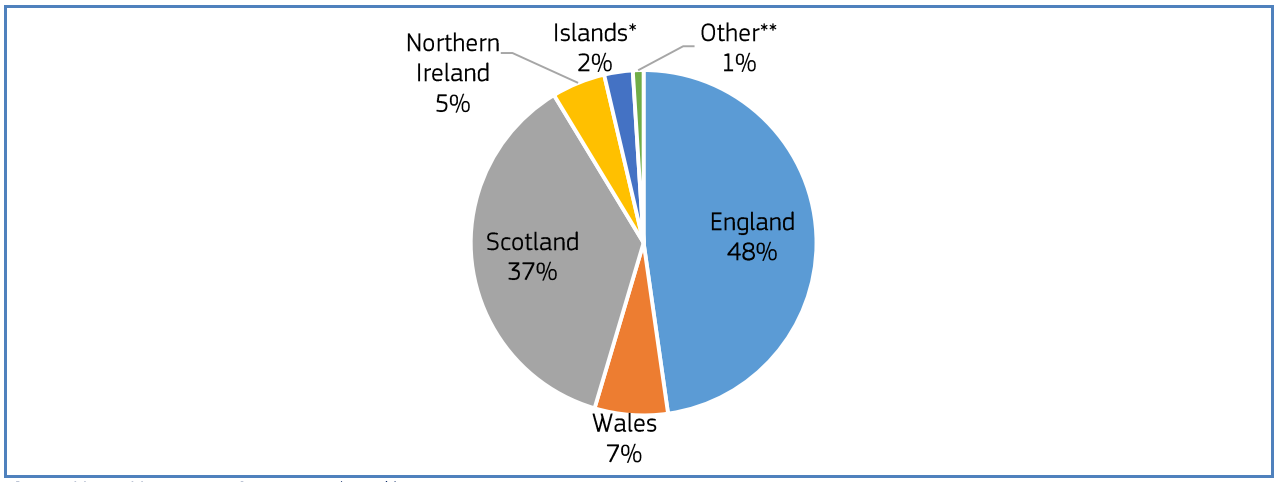
Source: Marine Management Organisation (gov.uk).

The UK's fishing fleet consisted of 5.783 vessels in 2021 (Figure 48), where the majority of vessels belonged to England (48%) and Scotland (37%)[38]. Most of the UK vessels were small to medium sized (10 m and under) (79%). Wales had the biggest share of small to medium sized vessels (93%), while Northern Ireland had the largest share (37%) of medium to large sized vessels (over 10m).

In 2021, the UK's fishing fleet employed 10.724 workers, of whom 8.806 were employed full-time and 1.918 part-time[38]. England had the highest share of full-time employees (85%) while Wales had the lowest share (68%). Compared to 2020, the size of the UK fishing fleet was reduced by 0,7% and the number of employed workers was reduced by 5%.

Common fishing gears are demersal trawl/seine, pots and traps, dredge, beam trawl, drift and fixed nets, and gears using hooks[38].

Figure 48. **THE UK FISHING FLEET BY COUNTRY ADMINISTRATION 2021**



Source: Marine Management Organisation (gov.uk).
**Islands include Guernsey, Jersey and the Isle of Man.*
***Vessels which were registered but not administered by a port, typically new vessels and vessels changing administrations.*

Aquaculture production

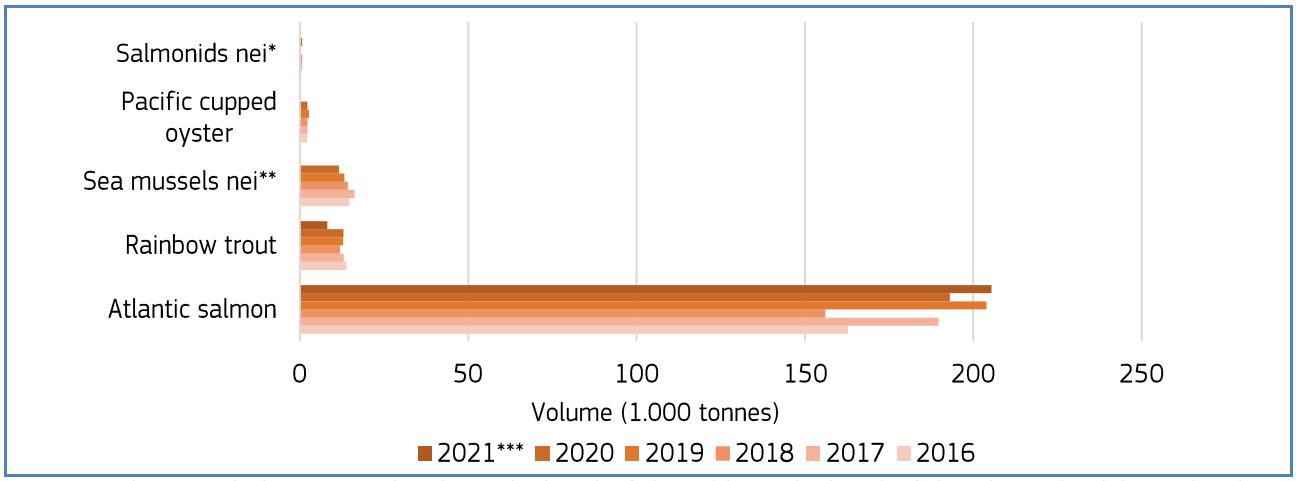
In 2020, aquaculture production in the UK amounted to 221.000 tonnes LWE at a value of EUR 1,4 million[37]. Compared to 2019, this was a 5% decrease in volume and a 4% decrease in value, and mainly related to lower production of Atlantic salmon.

Production of Atlantic salmon (>99%) and rainbow trout (58%) largely takes place in Scotland. Production volumes in 2021 were 205.393 tonnes and 8.156 tonnes respectively[39]. For Scottish production of Atlantic salmon and rainbow trout, this was an increase of 7% and 8% respectively, compared to the previous year. The Scottish aquaculture industry for Atlantic salmon and rainbow trout employed 1.932 workers in 2021, of whom 95% were full-time employees. The sex ratio of employees was 88% male and 12%

[38] Marine Management Organisation (2023). https://www.gov.uk/government/statistics/uk-sea-fisheries-annual-statistics-report-2021
[39] Marine Scotland Directorate (2023). https://www.gov.scot/publications/scottish-fish-farm-production-survey-2021/documents/

female. A higher ratio of females was employed within smolt production of Atlantic salmon (15%) and production of rainbow trout (14%). Compared to 2020, the number of employed workers was reduced by 6% overall but increased by 9% (12 employees) within the production of rainbow trout. However, despite the cutbacks, productivity per employee increased by 17% to produce Atlantic salmon.

Figure 49. **TOP 5 AQUACULTURE SPECIES PRODUCED IN THE UK**



*Source: FAO and Marine Scotland Directorate. *Salmonidae not elsewhere identified. **Mytilidae not elsewhere identified. ***Volumes only include Scottish production of Atlantic salmon and rainbow trout.*

4.2 International trade

As an independent trading nation, the UK now has over 70 trade agreements in place and include key trade partners such as the EU, Canada, Japan, Singapore, Switzerland, Iceland and Norway. However, the UK is still lacking trade agreements with other key trade partners such as the US. The UK concluded negotiations to join the UK and the Comprehensive and Progressive Agreement for Trans-Pacific Partnership (CPTPP) on 31 March that, once ratified, will secure access to 11 Asia-Pacific countries (Australia, Brunei Darussalam, Canada, Chile, Japan, Malaysia, Mexico, Peru, New Zealand, Singapore and Vietnam)[40].

The UK has been a net importer of FAPs since 1984[41]. However, the UK was a net exporter of FAPs to the EU in 2022, exporting 227.200 tonnes of FAPs at a value of EUR 1.4 billion and importing 115.549 tonnes of FAPs at a value of EUR 577 million[42].

Export

In 2022, the UK exported 316.970 tonnes of FAPs at a value of EUR 2,0 billion (Table 22)[42]. Compared to 2019, this was a 29% decrease in terms of volume and a 12% decrease in terms of value. On a global scale, the UK's exports of FAPs have decreased since 2019, going from 1,6% and 2,1% of global export volume and value (respectively) in 2019 to 1,2% and 1,6% in 2022.

Most exports from the UK in 2022 went to the EU (73%), the US (8%) and Nigeria (4%). Exports to EU MS mainly went to France (51%), the Netherlands (13%), and Spain (8%). Compared to 2019, export to the EU decreased by 3%, mainly related to reduced export of blue whiting (-100%), herring (-50%), mackerel (-22%) and other marine fish (-23%).

Salmon (28%), mackerel (18%) and other marine fish[43] (11%) made up most of the export volume (57%) from the UK in 2022, while salmon (41%), other marine fish (9%), and Norway lobster (7%) accounted for 57% of export value. Most salmon exports consisted of fresh Atlantic salmon (80%), while most mackerel exports were made up of frozen mackerel (95%). Most of the value for the MCS other marine fish came from unidentified[44] fish whole or in pieces (not minced, prepared or preserved) (34%), fresh unidentified fish (excl. edible fish offal) (28%) and fresh fillets of unidentified fish (18%).

[40] House of Commons Library (2023). *The Comprehensive and Progressive Agreement for Trans-Pacific Partnership (CPTPP).* https://commonslibrary.parliament.uk/research-briefings/cbp-9121/

[41] United States Department of Agriculture (2021). *United Kingdom – Fish and seafood market update 2021.* https://www.fas.usda.gov/data/united-kingdom-united-kingdom-fish-and-seafood-market-update

[42] Trade Data Monitor.

[43] This was an aggregation of 16 CN items, namely 030199 (unidentified live fish), 030249, 030289 (unidentified fresh fish, excl. edible offal), 030359, 030389 (unidentified frozen fish, excl. edible offal), 030449, 030459, 030489, 030499 (fresh and frozen fillets and other cuts of unidentified fish) 030539, 030549, 030554, 030559, 030569 (unidentified fish (incl. fillets) dried, salted or in brine, or smoked, excl. edible offal), 160419 (unidentified fish whole or in pieces, but not minced, prepared or preserved), and 160420 (unidentified prepared or preserved fish).

[44] Unidentified fish in the main commercial species „other marine fish" are marine species not included in other commodity groups (e.g. lumpfish, Norway pout, and sandeels). Other marine fish is part of commodity group 07 (other marine fish) which includes the species gilthead seabream, seabass, monk, sharks, ray, red mullet, gurnard, scabbardfish, cusk-eel, dogfish, pickarel, John Dory, smelt, ray's bream, weever, and marine species not included in other commodity groups. For more information, please consult the „Harmonisation" page of the EUMOFA website at the link https://www.eumofa.eu/harmonisation

Table 22. **TOTAL EXPORTS BY MAIN COMMERCIAL SPECIES FROM THE UK (volume in 1.000 tonnes, value in million EUR)**

	2018		2019		2020		2021		2022	
MCS	**Volume**	**Value**	**Volume**	**Value**	**Volume**	**Value**	**Volume**	**Value**	**Volume**	**Value**
Salmon	100	731	125	950	98	686	116	849	90	822
Mackerel	64	84	59	90	67	97	52	108	57	123
Other marine fish*	41	157	42	176	42	167	31	141	34	171
Other groundfish**	13	60	12	59	11	49	16	63	18	75
Herring	43	29	26	21	27	23	7	12	16	20
Norway lobster	13	123	14	129	10	89	12	123	12	146
Crab	17	113	17	117	12	68	11	79	11	90
Blue whiting	11	4	22	8	32	9	10	4	10	5
Trout	5	41	11	82	7	49	4	32	9	89
Other molluscs and aquatic invertebrates***	6	50	6	49	5	45	6	45	7	47
Other	131	645	112	600	103	516	64	409	53	415
Total	**443**	**2.035**	**446**	**2.281**	**416**	**1.798**	**329**	**1.863**	**317**	**2.003**

Source: EUMOFA elaboration of figures from Trade Data Monitor.
The MCS "other non-food use", "other products", "fish oil" and "fishmeal" are not included in the dataset.
**In 2022, the MCS other marine fish was an aggregation of 16 CN items and mainly consisted of unidentified fish whole or in pieces, but not minced, prepared or preserved (38%), fresh unidentified fish (17%), and frozen cuts of unidentified fish (17%). **In 2022, the MCS other groundfish was an aggregation of 8 CN items and mainly consisted of fresh unidentified groundfish (53%) and fresh fillets of unidentified groundfish (39%). ***In 2022, the MCS other molluscs and aquatic invertebrates was an aggregation of 6 CN items and mainly consisted of prepared or preserved unidentified molluscs (48%) and frozen unidentified molluscs incl. flours, meals and pellets of aquatic invertebrates other than crustaceans, fit for human consumption (33%).*

Import

In 2022, the UK imported 644.451 tonnes of FAPs at a value of EUR 4,3 billion (Table 23)[45]. Compared to 2019, this was a decrease in volume of 11% but an increase in value of 8%. On a global scale, the UK's imports of FAPs have decreased since 2019, going from 3,1% and 4,4% of global import volume and value (respectively) in 2019 to 2,7% and 3,8% in 2022.

Most imports of FAPs to the UK in 2022 came from the EU (18%), Norway (18%), China (10%), Iceland (6%) and Vietnam (6%). Imports from EU MS mainly came from Spain (19%), Germany (19%), Poland (15%) and Lithuania (9%). Compared to 2019, imports from the EU decreased by 20%, mainly related to reduced imports of salmon (-91%), other marine fish (-25%), other cephalopods (-94%) and miscellaneous tuna (-48%).

Salmon (16%), miscellaneous tuna[46] (15%), other marine fish[47] (13%) and cod (13%) made up most of the import volume (57%) to the UK in 2022, while salmon (21%), miscellaneous shrimp[48] (18%) and cod (15%) accounted for 54% of import value. Most salmon imports consisted of fresh Atlantic salmon (76%), while most cod imports were made up of frozen cod fillets (78%). Most of the value for the MCS miscellaneous tuna came from skipjack and bonito tuna whole or in pieces (93%), while frozen unidentified shrimps and prawns (53%), followed by prepared or preserved unidentified shrimps and prawns (30%), made up most of the value of the MCS miscellaneous shrimp.

[45] Trade Data Monitor.
[46] This was an aggregation of 4 CN items, namely 030441, 030481 (fresh and frozen unidentified tuna, excl. edible offal), 030487 (frozen fillets of skipjack or bonito tuna), and 160414 skipjack or bonito tuna whole or in pieces, not minced, prepared or preserved.
[47] This was an aggregation of 16 CN items, namely 030199 (unidentified live fish), 030249, 030289 (unidentified fresh fish, excl edible offal), 030359, 030389 (unidentified frozen fish, excl. edible offal), 030449, 030459, 030489, 030499 (fresh and frozen fillets and other cuts of unidentified fish) 030539, 030549, 030554, 030559, 030569 (unidentified fish (incl. fillets) dried, salted or in brine, or smoked, excl. edible offal), 160419 (unidentified fish whole or in pieces, but not minced, prepared or preserved), and 160420 (unidentified prepared or preserved fish).
[48] This was an aggregation of 5 CN items, namely 030617, 030636, 030695 (frozen, fresh or other unidentified shrimps and prawns), 160521 and 160529 (prepared or preserved unidentified shrimps and prawns, not in airtight containers/other).

Table 23. **TOTAL IMPORTS BY MAIN COMMERCIAL SPECIES TO THE UK (volume in 1.000 tonnes, value in million EUR)**

	2018		2019		2020		2021		2022	
MCS	**Volume**	**Value**	**Volume**	**Value**	**Volume**	**Value**	**Volume**	**Value**	**Volume**	**Value**
Salmon	86	660	100	752	90	627	132	906	102	915
Miscellaneous tuna*	107	483	106	474	101	430	97	407	99	456
Other marine fish**	96	377	101	414	107	455	91	424	85	437
Cod	89	468	98	595	90	534	77	452	81	635
Miscellaneous shrimps***	77	700	76	706	75	661	83	717	77	775
Haddock	50	180	51	205	47	177	63	229	54	274
Alaska pollock	33	77	34	99	34	101	19	56	25	101
Miscellaneous small pelagics****	14	42	18	48	18	53	13	39	18	54
Freshwater catfish	13	42	15	54	14	43	14	42	15	59
Other cephalopods*****	10	45	28	57	8	39	10	50	13	73
Other	104	553	100	537	87	449	71	410	74	491
Total	**678**	**3.626**	**726**	**3.942**	**671**	**3.570**	**669**	**3.732**	**644**	**4.268**

Source: EUMOFA elaboration of figures from Trade Data Monitor.
The MCS other non-food use, other products, fish oil and fishmeal are not included in the dataset.
**In 2022, the MCS miscellaneous tuna was an aggregation of 4 CN items and mainly consisted of skipjack and bonito tuna whole or in pieces (93%). **In 2022, the MCS other marine fish was an aggregation of 16 CN items and mainly consisted of fresh unidentified fish whole or in pieces, but not minced, prepared or preserved (38%), unidentified preserved or prepared fish (30%), and frozen unidentified fish (12%). ***In 2022, the MCS miscellaneous shrimps were an aggregation of 5 CN items and mainly consisted of frozen unidentified shrimps and prawns (53%) and unidentified prepared or preserved shrimps and prawns (30%). ****In 2022, the MCS miscellaneous small pelagics was an aggregation of 3 CN items and mainly consisted of unidentified sardines, sardinella and brisling or sprats whole or in pieces (95%). *****In 2022, the MCS other cephalopods was an aggregation of 4 CN items and mainly consisted of frozen unidentified cuttlefish and squid (63%) and prepared or preserved unidentified cuttlefish and squid (34%).*

4.4 Trade flows in the EU

Key features of the TCA (EU-UK Trade and Cooperation Agreement):

- No tariffs or quotas on trade in goods provided rules of origin are met. There are increased non-tariff barriers as well as measures on customs and trade facilitation to ease these.
- The agreement is overseen by a EU-UK Partnership Council supported by other Specialised Committees.
- Both parties have the right to take counter-measures including imposition of tariffs, subject to arbitration, where they believe divergences are distorting trade.
- Both parties are required to have an effective system of subsidy control with independent oversight.
- 25 % of the value of the EU landings from UK waters will be progressively transferred to the UK over a period of five years.
- A new security partnership provides data for sharing a policing and judicial co-operation, but with reduced access to EU databases.
- Continued UK participation in some EU programmes: Horizon Europe (research), Euratom Research and Training, ITER fusion and Copernicus (satellite system).
- The TCA will be reviewed every five years.

While the TCA grants tariff free access on traded goods, non-tariff barriers (e.g., expensive administrative duties) have become an obstacle that has impacted trade of FAPs in both directions. The effect of non-tariff barriers is more substantial for the UK, as UK exports of FAPs to the EU constitute most of the value of total UK exports (72% in 2022[49]), while exports of FAPs from the EU to the UK represent a smaller fraction of the value of total EU exports (13% in 2022[50]).

[49] Trade Data Monitor.
[50] Eurostat-Comext. The dataset does not include export of the MCS other non-food use, other products, fish oil and fishmeal.

EU exports to the UK

In 2022, the EU exported 127.325 tonnes of FAPs at a value of EUR 722 million to the UK (Table 24). Compared to 2019, this was a decrease of 57% in terms of volume and 53% in terms of value. Export of FAPs to the UK accounted for 10% of the volume and 13% of the value of total extra-EU exports of FAPs in 2022.

The most important MCSs exported to the UK from the EU in terms of volume in 2022 were other marine fish (22%), cod (9%), surimi (9%), mackerel (8%) and skipjack tuna (8%), while other marine fish (17%), salmon (13%), cod (11%) and miscellaneous shrimp (9%) made up half of the value of exported FAPs from the EU.

In 2022, frozen fillets of unidentified fish (74%) and prepared or preserved other cuts of unidentified fish (16%) made up most of the value of the MCS other marine fish, while prepared or preserved unidentified shrimp made up 87% of the MCS miscellaneous shrimp. Cod was mainly exported as frozen fillets (47%) and prepared or preserved other cuts (36%) and all surimi was exported prepared or preserved to the UK. Exports of mackerel to the UK were mainly prepared or preserved fillets (87%), followed by fresh whole mackerel (13%), while most exports of skipjack tuna were prepared or preserved other cuts (87%) and prepared or preserved fillets (13%).

Table 24. **TOTAL EXPORTS BY MCS FROM EU MS TO THE UK (volume in 1.000 tonnes, value in million EUR)**

	2018		2019		2020		2021		2022	
MCS	**Volume**	**Value**	**Volume**	**Value**	**Volume**	**Value**	**Volume**	**Value**	**Volume**	**Value**
Other marine fish*	43	174	43	183	45	199	38	150	28	123
Cod	27	143	27	171	18	109	14	76	12	81
Surimi	5	12	9	26	10	28	11	34	11	38
Mackerel	21	49	29	70	16	53	15	46	11	44
Skipjack tuna	5	25	6	37	8	45	13	57	10	46
Salmon	82	583	74	493	70	426	9	82	8	92
Miscellaneous shrimp**	13	118	9	87	11	88	7	60	8	68
Haddock	19	59	19	56	16	48	5	13	4	15
Herring	9	15	7	14	7	16	6	15	4	12
Sprat	1	1	2	2	2	2	1	1	3	2
Other	73	405	72	382	62	336	45	216	29	200
Total	**299**	**1.584**	**296**	**1.521**	**266**	**1.349**	**164**	**751**	**127**	**722**

Source: EUMOFA elaboration of figures from Eurostat-Comext.
The MCS other non-food use, other products, fish oil and fishmeal are not included in the dataset.
**In 2022, the MCS other marine fish mainly consisted of frozen fillets of unidentified fish (79%) and prepared or preserved other cuts of unidentified fish (16%).*
***In 2022, the MCS miscellaneous shrimp mainly consisted of prepared or preserved unidentified shrimp (90%).*

EU imports from the UK

In 2022, the EU imported 277.496 tonnes of FAPs at a value of EUR 1,4 billion from the UK (Table 25). Compared to 2019, this was a decrease in import volume and value of 24% and 23% respectively. Import of FAPs to the EU from the UK accounted for 5% of total volume and value of extra-EU imports of FAPs in 2022[51].

Salmon (29%), mackerel (19%) and blue whiting (10%) accounted for most of the import volume of FAPs from the UK to the EU in 2022. Most of the import value came from the MCSs salmon (35%), Norway lobster (10%) and scallop (6%).

In 2022, salmon imports from the UK to the EU were mainly as fresh whole salmon (89%), followed by smoked salmon (4%) and fresh salmon fillets (4%). Mackerel was imported frozen whole (70%) and fresh whole (28%), while blue whiting imports consisted of fresh whole (74%) and frozen whole (26%). Most of the value of the MCS Norway lobster came from frozen whole lobster (60%), while the remainder was made up of fresh whole lobster (40%). Scallop imports were made up of fresh whole scallop (58%) and frozen whole scallop (42%).

[51] Eurostat-Comext. The dataset does not include import of the MCS other non-food use, other products, fish oil and fishmeal.

Table 25. **TOTAL IMPORTS BY MCS TO EU MS FROM THE UK (volume in 1.000 tonnes, value in million EUR)**

	2018		2019		2020		2021		2022	
MCS	**Volume**	**Value**	**Volume**	**Value**	**Volume**	**Value**	**Volume**	**Value**	**Volume**	**Value**
Salmon	55	433	70	509	72	485	78	559	54	478
Mackerel	59	76	58	93	46	74	56	81	53	80
Blue whiting	14	3	9	2	11	3	48	13	29	9
Herring	34	37	27	29	27	32	16	11	25	23
Crab	13	78	14	81	12	63	14	79	12	77
Other marine fish*	21	77	18	79	17	72	12	50	12	54
Norway lobster	10	98	11	104	9	79	14	128	11	132
Monk	6	51	6	50	7	47	8	59	7	58
Scallop	7	96	8	98	7	83	7	92	6	88
Other groundfish**	6	35	4	28	3	21	5	33	5	38
Other	141	703	141	713	128	621	74	342	63	338
Total	**366**	**1.687**	**366**	**1.787**	**339**	**1.579**	**331**	**1.445**	**277**	**1.375**

Source: EUMOFA elaboration of figures from Eurostat-Comext.
The MCS other non-food use, other products, fish oil and fishmeal are not included in the dataset.
**In 2022, the MCS other marine fish mainly consisted of frozen fillets of unidentified fish (79%) and fresh whole unidentified fish (14%). **In 2022, the MCS other groundfish mainly consisted fresh fillets of unidentified groundfish (89%).*

4.5 Consumption

Fish and chips is the undisputed national dish of the UK and is a cultural and culinary symbol of the country, largely recognised worldwide as British[52]. Cod and haddock are the fish most often served in this traditional dish.

In 2020, total consumption of FAPs in the UK (both in and out of home) was approx. 163 grammes per person per week[53]. Compared to 2019, this was a 1% increase. This reveals that people in the UK consume slightly more than one portion (140 g) of FAPs per person per week, which is just above half of the recommended amount by health professionals. FAPs consumed in the UK in 2019 were purchased through retail (66%), foodservice (31%) and fishmongers (3%)[53]. Despite disruptions due to Covid-19 and changes within the respective sectors, the overall ratio remained largely the same by the end of 2021.

Consumption of FAPs in the UK has declined since 2007 and is mainly driven by a fall in retail purchases[53]. When Covid-19 arrived in early 2020, retail seafood consumption had declined by 10% over the past ten years. The pandemic caused people to stockpile food, and sales of frozen and ambient FAPs doubled for a few weeks at the beginning of the pandemic. Both frozen and ambient FAPs performed strongly throughout 2020. Sale of FAPs remained strong well into 2021 but showed clear signs of returning to pre-pandemic levels by the end of the year, which meant that sales of frozen and ambient FAPs declined, while sales fresh FAPs increased again.

[52] UK Fisheries. *UK fish consumption.* UK Fisheries - UK fish consumption
[53] Seafish (2022). *Seafood consumption (2022 update).* https://www.seafish.org/document/?id=96643a00-bf15-4f14-982a-c769a2a01ee3

5. Case study – brown crab in the EU

Brown crab is an important crustacean species for fishing fleets operating around the British Islands. Brown crab is mostly marketed live but also cooked and chilled, France being the main consumption market in the EU. In 2020, EU-27 catches of brown crab reached 12.980 tonnes, Ireland and France being the main landing countries. These catches were complemented by significant imports from the UK and to a lesser extent from Norway. A share of the EU supply is exported, mostly to China, mostly as frozen products. EU landings have been strongly decreasing in the past years due to decreasing resource in the main fishing grounds, leading to higher prices on the market.

5.1 Biology resource and exploitation

Biology

The brown crab (*Cancer pagurus*), known as both brown crab and edible crab, is a benthic crustacean species which lives on a wide range of seafloors: sand, gravel and rock, at depths from 6 m to 100 m (usually between 6 m and 40 m)[54].

Its geographic distribution is the eastern Atlantic, from northern Morocco extending along the Atlantic coast of Europe, to the British Isles and northern Norway (about 70º N). There have also been reports of brown crab being observed at the north coast of the Mediterranean, although these are mostly old reports and no current official data records catches in this area[55].

Brown crabs have a heavy, oval shaped body and can easily be identified by their "piecrust" edge and black tipped pincers[56]. The carapace (the hard upper shell of a crustacean) can reach a maximum length of 20 cm and a maximum width of 30 cm, but the common width is under 24 cm[57].

Brown crabs grow by moulting, a process by which they crawl out of their exoskeletons, allowing the body to take up water and increase in size before the new shell hardens. The water absorbed is later replaced by tissue, constituting the actual growth. Moulting takes place in the warm season. The brown crabs shed their exoskeletons less frequently they grow older.

Mating takes place in late autumn and early winter shortly after the female has moulted. Females carry eggs under their abdomen (buried) for 5 to 9 months, releasing the larva in late spring or early summer. While the females are buried, they do not feed and dig pits which they reside in. Fishing actives are therefore unlikely to catch buried females or affect larval supply[58], even if some bycatch from bottom trawling might still occur. When the crabs reach juvenile stage in the late summer/early autumn they settle in intertidal zones[59] where they remain for roughly 3 years until the carapace grows to a width of 6-7 cm, after which they move to subtidal areas[60]. Sexual maturity is reached after about 10 years, and on average a brown crab has a lifespan of 30 years[61].

Brown crabs are omnivores, scavengers and active predators. Their main diet consists of shells and bristle worms, but they also eat smaller crustaceans. Their omnivorous diet contributes to keeping the seafloor free from organic debris.

Resource, exploitation, and management in the EU

The main catch period is from June to November. Brown crab is usually caught with baited traps, called pots, but may also be as bycatch in trawl and gillnet fisheries[62]. Commercial crab fishing is usually done with day boats or vivier vessels. The latter are used for more offshore fishing and contain water tanks to hold live crab[63]. After being caught, crabs may be nicked, meaning fracturing the apodemes (attachment site for muscles) to immobilize the claws to prevent cannibalism and fighting during storage[64]. This is especially common for catches done by vivier vessels.

[54] http://www.fao.org/fishery/species/2627/en
[55] Ibidem.
[56] Neal, K.J. & Wilson, E. 2008. *Cancer pagurus* Edible crab. In Tyler-Walters H. and Hiscock K. (eds) Marine Life Information Network: Biology and Sensitivity Key Information Reviews, [on-line]. Plymouth: Marine Biological Association of the United Kingdom. [cited 11-02-2021]. Available from: https://www.marlin.ac.uk/species/detail/1179
[57] http://www.fao.org/fishery/species/2627/en
[58] https://www.marlin.ac.uk/species/detail/1179
[59] An area which is above water level at low tide and under water at high tide.
[60] An area which is below the intertidal zone (see previous footnote), and is continuously covered by water.
[61] https://www.mcsuk.org/downloads/seachampions/205-2012_Crab%20Festival_F.pdf
[62] http://www.fao.org/fishery/species/2627/en
[63] https://fishingnews.co.uk/features/carvela-new-stromness-vivier-crabber-proving-its-fishing-credentials-west-of-orkney/
[64] https://www.sciencedirect.com/science/article/abs/pii/S0022201112002182

Commercial fishers primarily use pots which have a low impact on the environment and are very selective, limiting the bycatch of other species[65]. However, they can easily get lost and contribute to ghost fishing.

Brown crab fishery is not managed by quotas or a total allowable catch (TAC). However, crab fisheries are managed by means of different measures at EU, national and regional levels. EU Regulation 2019/1241 sets the minimum conservation reference size (MCRS) at 140 mm measured as the maximum width of the carapace measured perpendicular to the antero-posterior midline of the carapace[66]. A few geographical exceptions are noted for the MCRS ranging from 70 mm[67]. For brown crabs caught in pots or creels, a maximum of 1% by weight of the total catch may consist of detached claws. For brown crabs caught with any other fishing gear, a maximum of 75 kg of detached crab claws may be landed[68]. In some MS, national or regional management measures are also implemented. In France for example, fishing effort is limited through a limited number of fishing licenses and a limited number of pots per vessel. In Ireland a significant share of the landings (20-30%) is used as bait in whelk fishing pots[69]. In Ireland, a brown crab fishery improvement project (FIP) has been created to increase transparency and sustainability in the sector[70].

The state of the brown crab resource is of concern for many of the main stocks (Northwest of Ireland, Northeast and South UK, Scotland, North Sea, Bay of Biscay) and catches have decreased significantly in the past years. Research is ongoing to collect information on the reasons behind this decrease. This could be linked to the increase of the water temperature or diseases, but these remain assumptions at this stage[71].

5.2 Production

Catches

Global production of brown crab amounted to 49.762 tonnes in 2020. The leading producer by volume was the UK, accounting for 60% of global catches, followed by the EU 27 (27%) and Norway (12%). The main EU countries in terms of catch volumes were Ireland and to a lesser extent France, together accounting for 86% of total EU catches.

Between 2011 and 2020, global catches of brown crab species decreased (14%). Specifically, catches have decreased in the EU (30%), and in Norway (18%) whereas the decreasing trend was less significant in the UK (3%). The decrease in catches by the EU fleet can be partly explained by the strong drop in Q2 2020 because of market disruption caused by the Covid-19 crisis.

Table 26. **TOTAL WORLD CATCHES OF BROWN CRAB (volume in tonnes)**

Country	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
UK	24.457	25.763	27.273	28.778	32.063	28.986	33.761	32.410	32.018	31.004
EU-27	15.086	14.677	13.639	13.618	14.551	13.206	13.411	12.496	13.627	12.980
Norway	5.773	5.319	4.981	5.241	4.629	4.743	4.926	4.924	5.850	5.343
Isle of Man	459	554	495	453	519	477	534	967	629	435
Total	**45.775**	**46.313**	**46.388**	**48.090**	**51.762**	**47.412**	**52.632**	**50.797**	**52.124**	**49.762**

Source: FAO.

Landings in the EU

Unfortunately, confidentiality rules do not allow disclosure of landing details for all MS. Specifically, landing data from the main landing country (Ireland) are missing for 2018 and 2020. In the table below, landing volumes in Ireland in 2018 and 2020 are estimated based on STECF data on economic performance of the EU fleet[72] providing the landings attributable to the Irish fleet. These estimates should thus be treated with caution.

[65] https://thefishsite.com/articles/brown-crab-a-guide-to-handling-and-quality
[66] https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:32019R1241&from=EN
[67] In ICES divisions 6a and 7a a minimum conservation reference size of total length of 70 mm and a carapace length of 20 mm shall apply. In an area in ICES divisions 4b and 4c limited by a point at 53°28′22″ N, 0°09′24″ E, on the coast of England, a straight line joining this point with 53°28′22″ N, 0°22′24″ E, the 6-mile boundary of the United Kingdom, and a straight line connecting a point at 51°54′06″ N, 1°30′30″ E, with a point on the coast of England at 51°55′48″ N, 1°17′00″ E, a minimum conservation reference size of 115 mm shall apply.
[68] https://eur-lex.europa.eu/legal-content/EN/TXT/PDF/?uri=CELEX:32019R1241&from=EN
[69] Draft_minutes_FGCrab_30-11-2022.pdf (marketac.eu)
[70] http://irishbrowncrabfip.ie/
[71] Ibidem.
[72] Source: https://stecf.jrc.ec.europa.eu/dd/fleet

In 2020, it is estimated that total landings of brown crab species in the EU-27 amounted to 9.864 tonnes. The fact that the volume of brown crab caught by the EU fleet is higher than the volume landed in the EU suggests that a share of EU catches could be landed in third countries closer to brown crab fishing grounds (specifically in the UK).

In 2020, Ireland was estimated to be the main landing country, accounting for 65% of the total EU landing volumes, followed by France (25%). Other relevant landing countries were the Netherlands (4%) and Denmark (3%).

From 2011 to 2020, EU-27 landings of brown crab species decreased by 32% in volume, because of the significant decrease in landings in France (-64%) and the Netherlands (-81%). However in the meantime, landings in Ireland were estimated to have experienced a 21% increase.

Table 27. **LANDINGS OF BROWN CRAB IN THE EU (volume in tonnes)[73]**

COUNTRY	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
Ireland	5.314	6.075	5.745	5.782	6.304	7.686	6.713	7.931*	7.301	6.406*
France	6.683	6.178	5.797	5.822	4.196	4.155	3.943	3.293	2.959	2.436
Netherlands	2.194	977	711	1.314	2.715	522	1.269	2.521	540	421
Denmark	83	99	72	84	259	353	233*	313	267	327
Others	314	299	269	234	321	255	349	252	280	274
Total	**14.589**	**13.627**	**12.594**	**13.237**	**13.795**	**12.970**	**12.507**	**14.310**	**11.348**	**9.864**

*Source: Eurostat. *Estimates based on STECF data on the EU fleet economic performance.*

5.3 Brown crab: first sales in the EU

Most of the brown crab from targeted fisheries is sold via contracts and therefore not reported in first sales data due to confidentiality issues. However, bycatch of brown crab may be sold at auction and is registered as first sales data. Brown crab is mostly landed and sold alive.

Brown crab first sale data is available for all the main EU landing countries except for Ireland. In 2021, brown crab first sales in reporting countries amounted to 2.344 tonnes at a value of almost EUR 10 million and an average price of 4,16 EUR/kg. Among the reporting countries, France accounted for most first-sale volumes (48%), followed by Denmark (24%) and the Netherlands (17%). Brown crab first sale volumes in the UK amounted to 13.998 tonnes in 2021.

In 2020, first-sale volumes decreased in France and Denmark, which could be linked to disruption related to the Covid-19 crisis which affected fisheries activities and seafood markets. However, crab fisheries are mostly active in summer, so the impacts of lockdowns have been relatively limited[74]. Moreover, first-sales in France continued to decrease in 2021 and 2022, showing that brown crab fisheries are currently facing a more structural decreasing trend due to crab resource issues. In the meantime, crab first sales volumes in the UK experienced a comparable drop in 2020 compared to 2019 (-19%), rebounded in 2021 (+12%) but decreased again in 2022 (-14%). This decreasing trend in volume caused a significant increase in first-sale prices in the reporting countries.

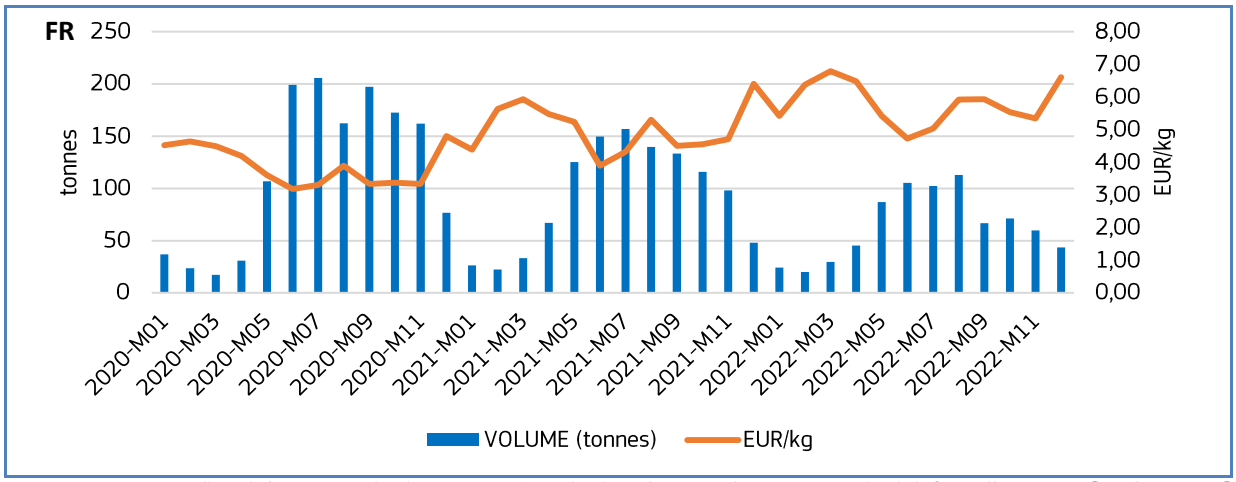
In all main reporting countries, first sale data show a high seasonality, with the majority of first sales occurring between May and November. In the UK, sales volumes peak in October each year. Over the 2020-2022 period, monthly French first-sales volumes peaked at 206 tonnes in July 2020. The variation in first sale prices always seems to be correlated to first sale volumes, with peaking prices each year (in February-March) when volumes are at their lowest levels, and low prices in summer and autumn during the high-volume season.

Prices recorded in France between January 2020 and December 2022 (4,47 EUR/kg on average) were higher than prices recorded in the Netherlands (2,56 EUR/kg) and in the UK (2,84 EUR/kg).

In 2021, the most important places of sale for brown crab in volume terms were Roscoff in France, Grimsby and Bridlington in the UK, and IJmuiden/Velsen in the Netherlands.

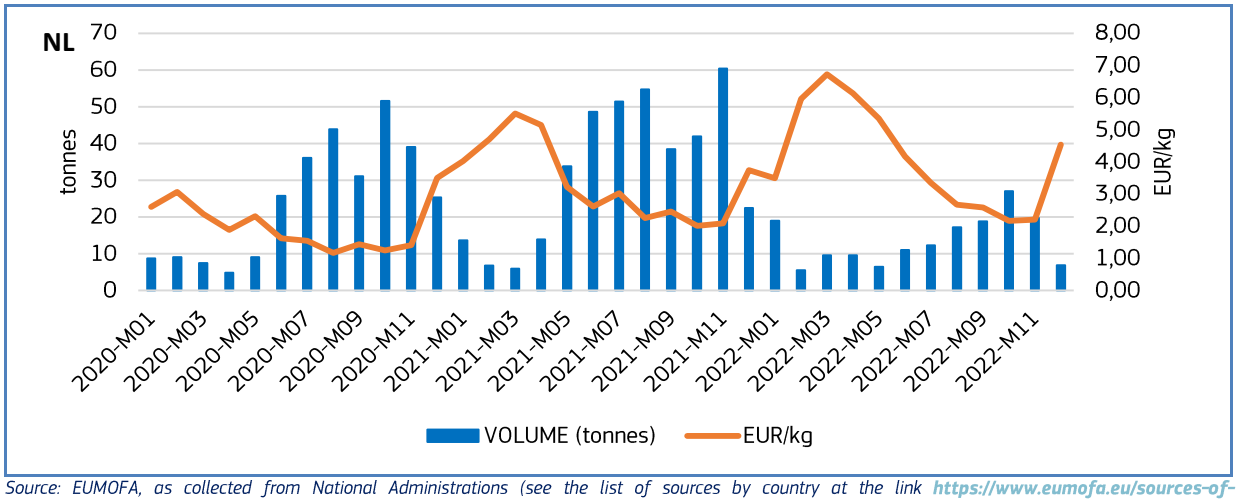
[73] Totals do not correspond exactly to actual sums because of roundings.
[74] Source: https://www.eumofa.eu/documents/20178/432372/Brown+crab+study.pdf/3f26df01-a965-488d-a85b-8f528d44cf5e?t=1626765702609

Figure 50. **FIRST SALES: BROWN CRAB IN FRANCE**



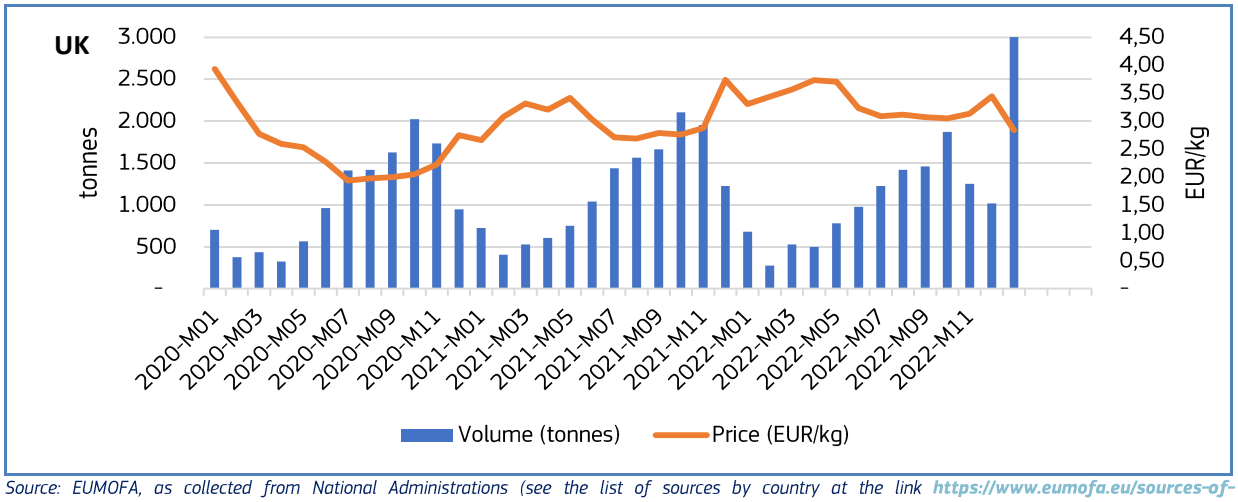
Source: EUMOFA, as collected from National Administrations (see the list of sources by country at the link https://www.eumofa.eu/sources-of-data#firstSaleTab).

Figure 51. **FIRST SALES: BROWN CRAB IN THE NETHERLANDS**



Source: EUMOFA, as collected from National Administrations (see the list of sources by country at the link https://www.eumofa.eu/sources-of-data#firstSaleTab).

Figure 52. **FIRST SALES: BROWN CRAB IN THE UNITED KINGDOM**



Source: EUMOFA, as collected from National Administrations (see the list of sources by country at the link https://www.eumofa.eu/sources-of-data#firstSaleTab).

5.4 International trade

EU trade flows and supply

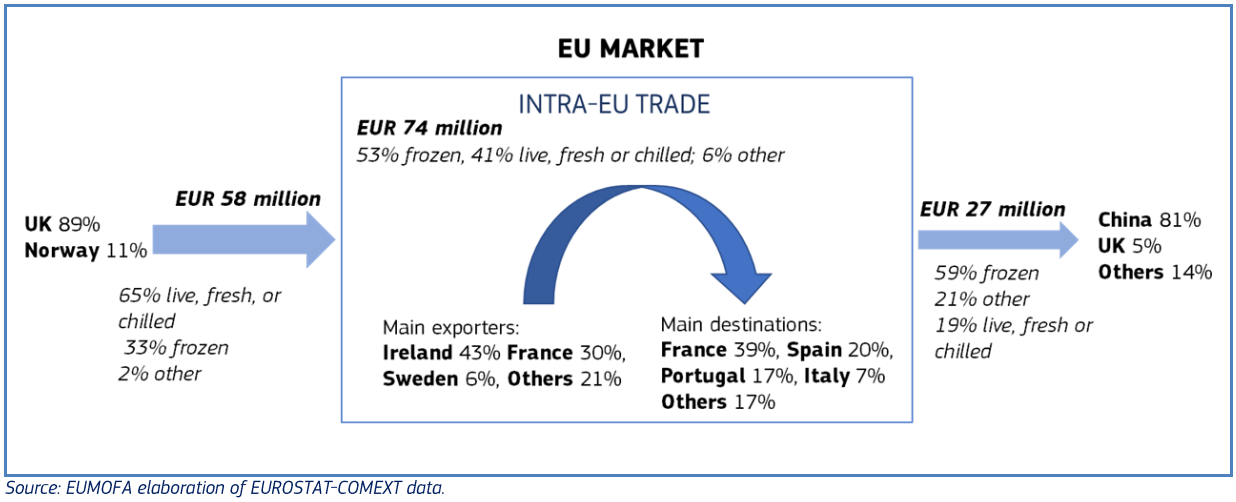
In the Combined nomenclature[75] used for registering EU import-export data, brown crab was specifically reported as live, fresh or chilled, frozen (cooked or not), and dried, salted, smoked or in brine[76].

In 2021, the EU-27 trade deficit for brown crab products amounted to EUR 31 million. In the same year, the EU-27 imported 11.233 tonnes of brown crab at a value of EUR 58 million, mostly live, fresh or chilled (65% of the imports value). The major provider of brown crab to the EU market was the UK, accounting for 89% of the extra-EU import value, followed by Norway (11%). France received 74% of the brown crab extra-EU imports value, being the main entry point for brown crab in the EU market.

In the same year, EU exports to third countries amounted to 2.926 tonnes at a value of EUR 27 million. Frozen crab accounted for 59% of the total extra-EU export value whereas live, fresh or chilled crabs and crabs dried, salted, smoked or in brine accounted for 19% and 21% of the total export value respectively. The main destination in value terms was China, accounting for 82% of the total extra-EU export value, followed by the UK (5%).

In 2021, intra-EU exports amounted to 10.362 tonnes of brown crab products at a value of EUR 74 million. The intra-EU trade was dominated by live, fresh or chilled crab products, which accounted for 58% of the trade value, followed by frozen crabs (38%) and crab dried, salted, smoked or in brine (3%). The main exporting countries within the EU were Ireland (43% of the intra-EU export value) and France (30%), followed by Sweden (6%) and Denmark (5%). It should be noted that a share of these intra-EU flows might be landings in other MS than the vessel's flag. France (39% of the total intra-EU export value), Spain (20%) and Portugal (17%) were the main destinations for the intra-EU exports.

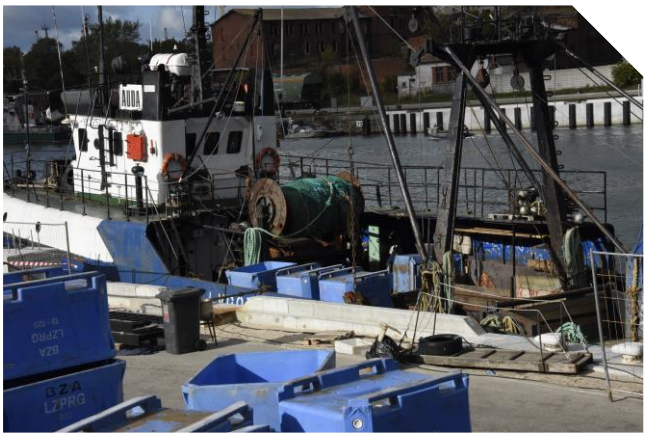
Figure 53. **THE BROWN CRAB EU-TRADE MARKET IN 2021, IN VALUE**



Source: EUMOFA elaboration of EUROSTAT-COMEXT data.

[75] The Combined Nomenclaure (CN) is the EU's eight-digit coding system, comprising the Harmonised System (HS) codes with further EU subdisions. It serves the EU's common customs tariff and provides statistics for trade within the EU and between the EU and the rest of the world.
[76] 03061430 Frozen crabs "*Cancer pagurus*", even smoked, whether in shell or not, incl. crabs in shell, cooked by steaming or by boiling in water; 03063310 Crabs "*Cancer pagurus*", whether in shell or not, live, fresh or chilled; 03069310 Crabs "*Cancer pagurus*", whether in shell or not, dried, salted, smoked or in brine, incl. crabs in shell, cooked by steaming or by boiling in water.

6. Global Highlights



EU / Fisheries: On 21 February 2023, the European Commission presented a package of measures to improve the sustainability and resilience of the EU's fisheries and aquaculture sector. The package included four elements: A **Communication** on the Energy Transition of the EU Fisheries and Aquaculture sector; an **Action Plan** to protect and restore marine ecosystems for sustainable and resilient fisheries; a **Communication** on the common fisheries policy today and tomorrow and a **Report** on the Common Market Organisation for fishery and aquaculture products. The main objectives of the measures are to promote the use of cleaner energy sources and reduce dependency on fossil fuels as well as reduce the sector's impact on marine ecosystems. The proposed actions will be carried out gradually to help the sector adapt. The proposals also aim to make the sector an attractive workplace for younger generations[77].

Portugal / Biodiversity: PuertAlMar, which translates as 'gateway to the sea', is a project that shows how human activities and thriving biodiversity can coexist in ports. It also shows how the carbon footprint of ports can be reduced. Located in the port of Vigo, on Spain's Atlantic coast, the EU-funded project was carried out by the Port Authority of Vigo and the University of Vigo. It has produced very good results that can be replicated in other ports. The actions implemented are positive for everyone. Improving the ecological state of the coastline in an area significantly altered by industrial and port activities benefits not only the fishing and aquaculture communities, but also society in general[78].

EU / BlueInvest: On 9 March 2023, the European Commission unveiled a **new investor report**, on the occasion of the **BlueInvest Day 2023**. The report provides investors with an overview of investment activities and opportunities in the EU blue economy. It also features key innovative technologies and a sample of investment-ready companies across 10 sectors of the sustainable blue economy from the BlueInvest pipeline. The report is part of an investor capacity-building programme that aims at guiding investors all the way: from understanding where the sector opportunities are, to setting up their financial product and investment strategy. The report aims to further mobilise private capital for clean tech in the blue economy, including ground-breaking solutions that can help fight climate change and support the objectives of the EU Green Deal[79].

EU / Maritime security: On 10 March, the European Commission and the High Representative adopted a **Joint Communication** on an enhanced EU Maritime Security Strategy to ensure a peaceful use of the seas and safeguard the maritime domain against new threats, together with an **updated Action Plan** through which the Strategy will be implemented. The EU economy depends greatly on a safe and secure ocean, as over 80% of global trade is seaborne and about two-thirds of the world's oil and gas is either extracted at sea or transported by sea. Moreover, up to 99% of global data flows are transmitted through undersea cables. The EU has become a recognised actor in maritime security, conducting its own naval operations, enhancing maritime domain awareness and cooperating with a wide range of external partners[80].

Iceland / Fishery: The total fish catch of Icelandic vessels in February 2023 was 145.000 tonnes as opposed to 198.000 tonnes in February last year. This is mainly due to smaller catches of pelagic species. Of demersal species, cod was about 22.000 tonnes. In the 12-month period from March 2022 to February 2023 the overall catch was 1.254.000 tonnes which is 187.000 tonnes less than was caught in the same period one year earlier[81].

EU / Norway: On 17 March 2023, the EU and Norway signed three bilateral agreements including quota setting in the Skagerrak and the Kattegat the exchanges of quotas between the two parties, and reciprocal access to waters for fishers[82].

[77] https://ec.europa.eu/commission/presscorner/detail/en/IP_23_828
[78] https://oceans-and-fisheries.ec.europa.eu/news/puertalmar-reducing-carbon-footprint-port-vigo-2023-02-27_en
[79] https://oceans-and-fisheries.ec.europa.eu/news/blueinvest-new-investor-report-features-ocean-investment-opportunities-sustainable-blue-economy-2023-03-09_en
[80] https://ec.europa.eu/commission/presscorner/detail/en/ip_23_1483
[81] https://www.statice.is/publications/news-archive/fisheries/fish-catch-in-february-2023/
[82] https://oceans-and-fisheries.ec.europa.eu/news/fisheries-eu-and-norway-conclude-bilateral-consultations-fishing-opportunities-skagerrak-reciprocal-2023-03-17_en

7. Macroeconomic Context

7.1. Marine fuel

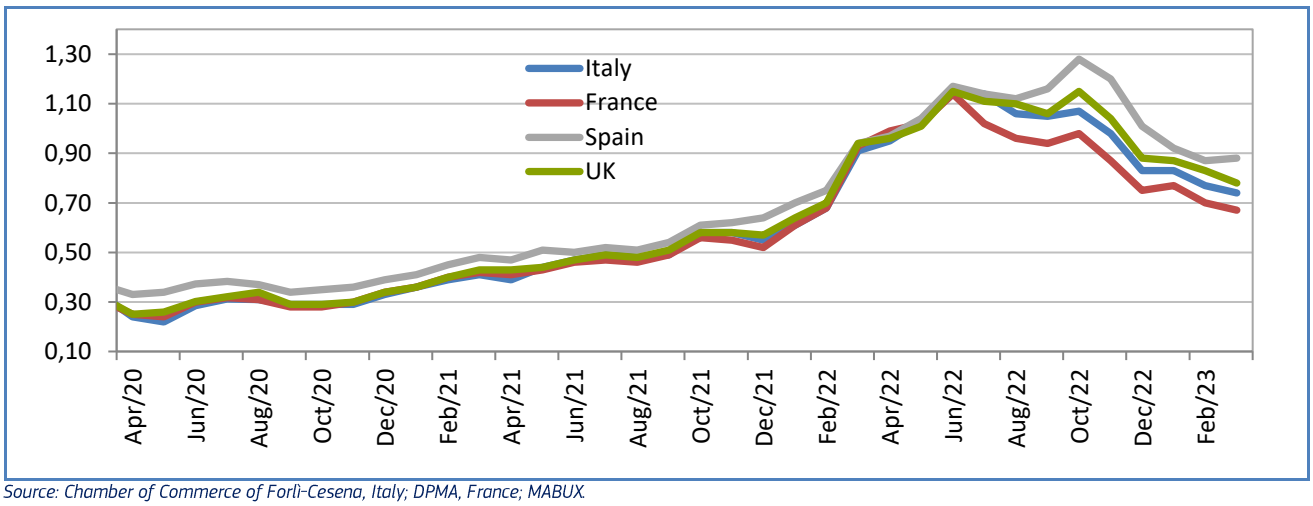
Average prices for marine fuel in **March 2023** ranged from 0,67 to 0,88 EUR/litre in ports in **France, Italy, Spain** and the **UK**. Average prices decreased by 3,2% compared with the previous month and by 17,5% compared with the same month in 2022.

Table 28. **AVERAGE PRICE OF MARINE DIESEL IN ITALY, FRANCE, SPAIN AND THE UK (EUR/litre)**

Member State	Mar 2023	Change from Feb 2023	Change from Mar 2022
France *(ports of Lorient and Boulogne)*	0,67	-4%	-28%
Italy[83] *(ports of Ancona and Livorno)*	0,74	-4%	-19%
Spain *(ports of A Coruña and Vigo)*	0,88	1%	-6%
The UK *(ports of Grimsby and Aberdeen)*	0,78	-6%	-17%

Source: Chamber of Commerce of Forlì-Cesena, Italy; DPMA, France; MABUX.

Figure 54. **AVERAGE PRICE OF MARINE DIESEL IN ITALY, FRANCE, SPAIN AND THE UK (EUR/litre)**

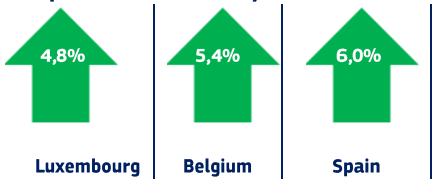


Source: Chamber of Commerce of Forlì-Cesena, Italy; DPMA, France; MABUX.

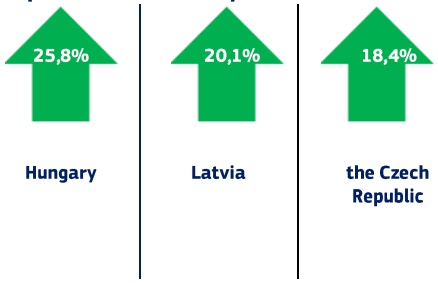
7.2. Consumer prices

The EU annual inflation rate was 9,9% in February 2023, down from 10,0% in January 2023. A year earlier, the rate was 6,2%.

Inflation: Lowest rates in February 2023, compared with January 2023.



Inflation: Highest rates in February 2023, compared with January 2023.



[83] Between September 2022-December 2022 no data was received from Ravenna port in Italy, thus the port has not been considered in the analysis in that period of time.

Table 29. **HARMONISED INDEX OF CONSUMER PRICES IN THE EU (2015 = 100)**

	Feb 2021	Feb 2022	Jan 2023	Feb 2023	Change from Jan 2023		Change from Feb 2022	
Food and non-alcoholic beverages	110,01	116,05	135,60	138,17	↑	1,9%	↑	19,1%
Fish and seafood	113,54	119,10	136,12	136,50	↑	0,3%	↑	14,6%

Source: Eurostat.

7.3. Exchange rates

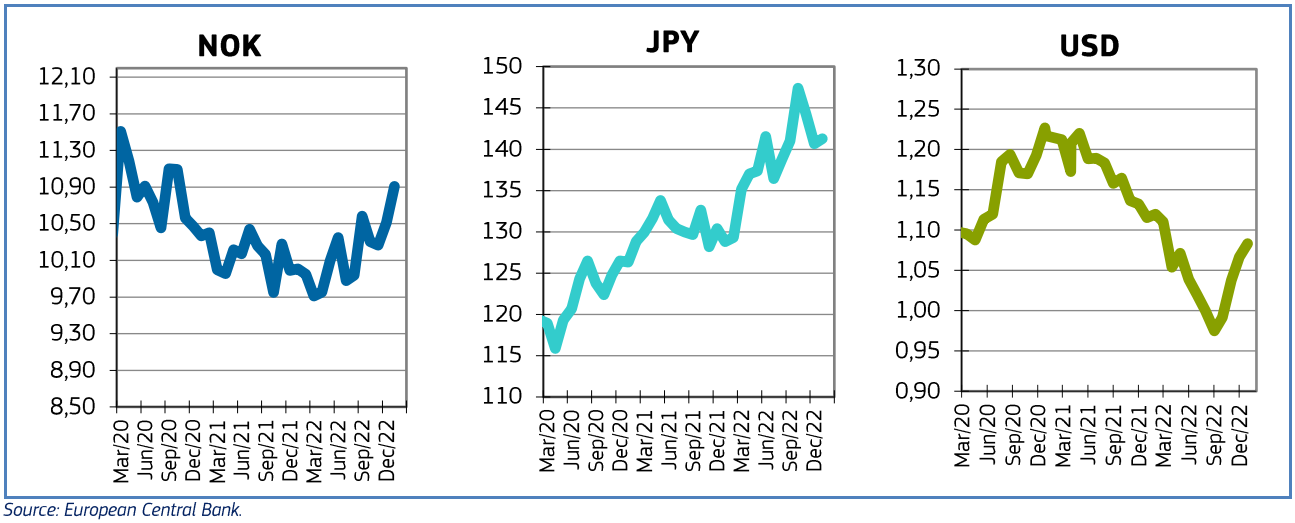
Table 30. **EURO EXCHANGE RATES FOR SELECTED CURRENCIES**

Currency	Feb 2021	Feb 2022	Jan 2023	Feb 2023
NOK	10,4012	9,9465	10,9083	10,9713
JPY	128,83	129,31	141,27	145,23
USD	1,2121	1,1199	1,0833	1,0619

Source: European Central Bank.

In February 2023, the euro appreciated against the Japanese yen (2,8%) and the Norwegian krone (0,6%), while it depreciated against the US dollar (2,0%), relative to the previous month. For the past six months, the euro has fluctuated around 143,31 against the Japanese yen. Compared to February 2022, the euro has appreciated 12,3% against the Japanese yen and 10,3% against the Norwegian krone. However, it depreciated 5,2% against the US dollar.

Figure 55. **TREND OF EURO EXCHANGE RATES**



Source: European Central Bank.

Manuscript completed in March 2023
The European Commission is not liable for any consequence stemming from the reuse of this publication.

Luxembourg: Publications Office of the European Union, 2023

© European Union, 2023

The reuse policy of European Commission documents is implemented based on Commission Decision 2011/833/EU of 12 April 2011 on the reuse of Commission documents (OJ L 330, 14.12.2011, p. 39).

Except otherwise noted, the reuse of this document is authorised under a Creative Commons Attribution 4.0 International (CC-BY 4.0) licence (https://creativecommons.org/licenses/by/4.0/). This means that reuse is allowed provided appropriate credit is given and any changes are indicated.

For any use or reproduction of elements that are not owned by the European Union, permission January need to be sought directly from the respective rightsholders. The European Union does not own the copyright in relation to the following elements:

Images: © Cover photo and pages 17, 27, 44 © EUROFISH, page 13 © Scandinavian Fishing Year Book, page 31 © CIA, The World Facebook, page 39 © Valentyn Volkov, shutterstock.

PDF ISBN 978-92-76-98544-0 ISSN 2314–9671 KL-AK-23-004-EN-N doi. 10.2771/719200

FOR MORE INFORMATION AND COMMENTS:

Directorate-General for Maritime Affairs and Fisheries
B-1049 Brussels
E-mail: **contact-us@eumofa.eu**

This report has been compiled using EUMOFA data and the following sources:

First sales: EUR-Lex, DG MARE– European Commission, mapa.gob.es, Sealifebase, ScienceDirect, Seawatch.no, Britishseafishing.co.uk, academia.edu, Slovak Ethnology, Bastillepost.com

Consumption: Europanel, FishBase.

Case studies: Britannica, USDA Foreign Agricultural Service, Marine Management Department, FAO, UK Fisheries, Eurostat-Comext, The National Archives, European Commission, UK Parliament, Marine Management Organisation, Marine Scotland Directorate, Trade Data Monitor, Seafish, Eurostat, Market Advisory Council, STECF, Eumofa, European Commission, MarLIN, Marine Conservation Society, Fishing News, ScienceDirect, the fish site, Irish Brown Crab FIP

Global highlights: European Commission, Oceans and Fisheries, Statistics Iceland

Macroeconomic context: Chamber of Commerce of Forlì-Cesena, Italy; DPMA, France; MABUX, Eurostat, European Central Bank

The underlying first-sales data is in an annex available on the EUMOFA website. Analyses are made at aggregated (main commercial species) level and according to the EU Electronic recording and reporting system (ERS).

In the context of this Monthly Highlights, analyses are led in current prices and expressed in nominal values.

The **European Market Observatory for Fisheries and Aquaculture Products (EUMOFA)** was developed by the European Commission, representing one of the tools of the new Market Policy in the framework of the reform of the Common Fisheries Policy. [Regulation (EU) No 1379/2013 art. 42].

As a **Market intelligence tool**, EUMOFA provides regular weekly prices, monthly Market trends, and annual structural data along the supply chain.

The database is based on data provided and validated by Member States and European institutions. It is available in 24 languages.

The EUMOFA website is publicly available at the following address: www.eumofa.eu.

EUMOFA **Privacy Policy**

Publications Office of the European Union