

**Annual report on the implementation of the landing obligation  
(Regulation (EU) 2015/812 amending Regulation (EU) 1380/2013, Article 15.14)  
in the United Kingdom for year 2018**

---

**Steps taken by Member States and producer organisations to comply with the landing obligation**

**1. Have you initiated, supported, participated in or implemented any measures and/or studies relating to the avoidance of unwanted catches through spatial or temporal changes to fishing behaviour (for example, studies/pilots on real time closures)?**

**Please specify the measures taken or studies.**

Since 2011, the UK has run Fully Documented Fisheries (FDF) trials. Vessels were fitted with Remote Electronic Monitoring (REM)/CCTV camera systems and operated as if they were under a landing obligation, with the trial participants landing all their catch in exchange for additional quota. The catch quota trial reports for the UK can be found [here](#).

In 2018 England ran a FDF scheme using REM with 13 participants, 12 using TR1 gear and 1 with GN1. Each vessel was given a share of the English uplift quota of North Sea Cod and Saithe, as an incentive, based on the percentage of the total Cod landed in 2017 by the scheme participants. There were also some small amounts of scientific quota of other species made available. The scheme ran from the beginning of June until the end of December with discard rates of landing obligation species observed at well below 1%.

Other relevant scientific research projects include H2020 DiscardLess, the outputs from which include identifying trends in hotspots of unwanted catches based on observer data from English, Irish and French monitoring programmes.

The Spurdog bycatch avoidance programme has continued in 2018. This aims to develop incentives for avoidance behaviour and enhanced data collection for this species.

**2. Which fleet segments/fisheries do these measures and/or studies apply to?**

The REM trial was applied to 12 TR1 vessels and 1 GN1 vessel in the North Sea.

There were 3 vessels using REM in the South West between July 2017 and July 2018. They were monitoring Cod and Haddock discards until the end of December in a selectivity trial, with Cefas collecting and monitoring data, and the vessel masters collecting retained and discarded data for both Cod and Haddock on haul sheets.

There was one REM trial in the South West purse seine fishery during 2018, to monitor the point of release of the net against the survival exemption within that fishery.

The hotspot mapping tool was applied to data from vessels operating in the Celtic Sea.

The Spurdog bycatch programme has been operating with selected vessels in the Celtic Sea from different fisheries.

**3. What has the uptake of these measures and/or studies been in the fleet segments/fisheries to which they are applicable?**

**Please provide the number and proportion of vessels in the segment/fishery.**

The English North Sea trial had an uptake of twelve English (out of 63) vessels in 2018. Six vessels participated in the spurdog bycatch avoidance programme.

**4. Have you initiated any changes to your quota management system to implement the landing obligation?**

**Please specify these changes.**

The UK already operates a transferable quota system within the majority of the fleet which allows industry groups to exchange quota. As a result there is no regulatory barrier to fisherman better aligning their quota holding with catches. This flexibility also helps with the avoidance of choke scenarios; for example pelagic operators have had to source additional herring quota to cover landings of unintended by-catch.

Within the remainder of the fleet, which is provided with periodic catch limits set by the administrations, consideration has been given to the option of reserving quota to hedge against a choke scenario, avoiding premature fishery closure. This mechanism has not been called on to date as there are limited stocks currently subject to the landing obligation.

Quota limits and closures are managed through licence conditions. Pre-landing obligation, the condition related to prohibition of retaining on-board catches in excess of certain limits or from areas subject to closure. These conditions have now been amended to prohibit fishing but without prejudice to the landing obligation requirements.

**5. For stocks managed through catch limits, have you conducted a quantitative analysis to identify potential national choke issues?**

**Please give details.**

Through 2018, the UK worked with its Marine Labs and fishing industry to understand the likely choke risks. Bio-economic models have been used to quantitatively predict choke risks, including predictions on foregone catch. The outputs of these analyses as well as the more qualitative assessments we have undertaken, have been used to

inform our conversations with the industry and other Member States on choke prevention.

The UK is committed to dealing with choke by implementing the landing obligation alongside a range of pragmatic and flexible mitigating measures, but ultimately, choke risk is hard to quantify given the complexities surrounding fishing opportunities.

**6. Have you pursued any exemptions to the landing obligation (either for high survival or *de-minimis*) in the development of regional joint recommendations?**

**Please give details of each exemption pursued.**

The UK has contributed to several exemptions during the development of the regional joint recommendations which are now part of the Delegated Acts for the North Western Waters and North Sea regions for the period 2019-2021. This included high survival exemptions for nephrops, plaice, skates and rays.

**7. What studies or evidence have you collected or produced in order to support such a request.**

The Joint Recommendation from each Regional Group contains the evidence to support each exemption.

**8. What steps have you taken to ensure the amount discarded under granted *de-minimis* exemptions does not exceed the permitted volume in the delegated act?**

The quantities of fish discarded under *de-minimis* exemptions are required to be reported in logbooks. This requirement has been highlighted in published guidance and through direct advice.

**9. What has been the utilisation of any granted *de-minimis* exemptions in the fleet segment/fishery to which the exemption applies?**

**Please provide the total weight and proportion of catch discarded under this exemption for each fleet segment/fishery to which an exemption applies.**

The final 2018 figures on use of *de-minimis* from the UK will not be available until later in 2019.

**10. Have any of your vessels utilised the provision to discard fish, which shows damage caused by predators?**

**Please provide the total weight of catch of each species discarded for each fleet segment/fishery concerned.**

The final figures on use of this provision from the UK will not be available until later in 2019.

**11. For stocks managed by catch limits, did you make use of the provisions for inter-annual or inter-species flexibility?**

**Please identify which flexibility (or flexibilities) was used, and the corresponding reallocation of fishing opportunities for the stocks concerned.**

Whenever possible, the UK makes full use of the inter-annual flexibility provisions to maximise quota uptake. This information has been reported to the Commission in the usual way.

The UK has not yet made use of the inter-species flexibility provision in 2018. Although not used at UK level, ISF has been trialled at vessel level in England. Where a vessel caught saithe that they did not have quota for at the end of a month, they could pay a quota penalty of either Cod, Haddock or Whiting, calculated using an exchange ratio based on the previous month's average price per kilogram.

**12. In the development of joint recommendations, has consultation with Advisory Councils and other relevant stakeholders taken place?**

**Please outline the process of consultation with Advisory Councils.**

**Please outline the process of consultation with other stakeholders, if relevant.**

Details of the consultations between the relevant Regional Groups and Advisory Councils are included in the relevant Joint Recommendations for the North Western Waters and North Sea.

**13. Following the adoption of the delegated act for a discard plan, have steps been taken to ensure adequate understanding among stakeholders of their obligations under the provisions of the act?**

**Please outline the process of ensuring stakeholders understand the obligations that will apply to them.**

The UK published guidance online for its industry on the landing obligation and the content of the relevant delegated acts. This guidance was highlighted to the industry through correspondence, meetings and face to face advice on the quayside and through local officers.

**14. Are there any other steps not covered by the questions above that you have carried out to effect compliance with the provisions of the landing obligation?**

**Please specify the measures taken.**

No.

**15. Which fleet segments/fisheries do these studies/pilots apply to?**

N/A

**16. What has the uptake been of these measures in the fleet segments/fisheries to which they are applicable?**

**Please provide the number and proportion of vessels in the segment/fishery.**

N/A

**Steps taken by Member States regarding control of compliance with the landing obligation.**

**17. Has information been provided by Member States administrations and control agencies to fishermen?**

**In what format has this information taken:**

- **Initiatives directed to fishermen to improve compliance;**
- **Guidelines on the application of the landing obligation, accurate recording of catches, etc.;**
- **Other.**

In 2018, the UK continued its focus on ensuring industry had the right advice and guidance to comply with the landing obligation and make long-lasting changes. The UK produced guidance for industry each year as the landing obligation has been phased; available on-line, through meetings and conversations with fishery officers and hard copies of the guidance are available.

**18. Have guidelines been provided by Member States administrations and control agencies for inspectors?**

**In what format has this information taken:**

- **Delivery of guidelines for inspectors on the effective and uniform application of the landing obligation;**

- **Seminars and trainings organised for presenting the guidelines to inspectors at national and regional level.**

Fisheries Officers are kept fully informed of all developments and Enforcement Policy Instructions are drafted and amended as required. Fishery Officers were involved in the drafting of the delegated acts guidance and were kept up to date with any amendments. Guidance continues to be rolled out to all offices via written communication, videoconferencing seminars, face to face meetings and workshops.

## **19. Have new control and monitoring tools been used by Member States?**

**Please supply information on:**

- **Control tools used in the context of landing obligation, i.e. REM, traditional**

The Marine Management Organisation (MMO) continued the North Sea FDF scheme on a voluntary basis in 2018, allocating quota uplift from the 2018 negotiated TACs as an incentive to participating vessels.

To date, one of the highest risk fisheries, North Sea cod, was monitored through the use of REM. This scheme applied to vessels which catch approximately 80% of the English share of the North Sea cod quota. The scheme has adapted with industry collaboration to include all species as they have been introduced under the landing obligation. REM has also been deployed in various fisheries in the Southwest to enhance data collection and assess its use for both compliance and scientific purposes.

There have been promising results from UK Fully Documented Fisheries (FDF) trials to date. Catch quota management monitored through the use of REM/CCTV equipment has made an important contribution to the recovery of cod in the North Sea, with the cod discard rate of FDF vessels having been reduced to negligible levels. We would like to constructively build on this work and the expertise developed so far.

Although trials in the South West have predominantly been used for scientific data gathering, one stern trawler took part in an FDF trial that concluded in 2016. A trial was carried out in 2018 using REM to monitor slipping events in the South West on a ring netter. The purpose was to monitor the closure point at which the net was released against the survival exemption for pelagic species in the purse seine fishery.

- **systems (aerial surveillance, inspections at sea), reference fleets, etc.;**
- **steps towards implementation of new tools, including electronic monitoring**

The UK uses all tools available to compliance officers are utilised including traditional techniques such as aerial surveillance, inspections at sea, and monitoring landings at ports. These have been supplemented with new tools and techniques such as CCTV and fitting forward look infrared cameras (FLIR) to our surveillance aircraft allowing them to keep a check on activities during the hours of darkness.

Within England, DEFRA are proposing to install Inshore Vessel Monitoring Systems (I-VMS) on vessels under 12 metres in length and are introducing electronic catch recording for those less than 10 metres in length. An app is being developed to record catches made by commercial fishing vessels and I-VMS will transmit using mobile phone signal.

- **means dedicated to implementation of landing obligation, haul-by-haul recording, etc.**

The UK also follows up any boarding at sea where last haul analysis has been carried out with a full monitoring of the vessel on landing; this is then analysed against the landings of other vessels fishing in the same area. All pelagic vessels continue to provide their average gramme size and these are compared against vessels from the same fishery, allowing them to be used as reference vessels.

**20. Have the Member state administrations and control authorities monitored below Minimum Conservation Reference Size (MCRS) catches at and after landing (traceability)?**

**Please supply information on:**

- **Total number of discards (by fishery, fleet segment) from 2013 to 2018;**
- **Initiatives taken to prevent under MCRS catches from reaching the commercial channels (pre-notification of landings of under MCRS catches, etc.);**
- **Measures taken to monitor landings at fish markets/auctions adopted.**

Below MCRS fish entering direct human consumption outlets has not manifested as a risk to date. Officers routinely monitor vessels at sea and in port checks are made on the size of all fish. Fish that have been retained below the minimum size are kept separately and landed to specific areas which have been set up in all auction halls. Fish within these specific areas are subject to specific controls and are normally used for bait by local creel vessels or dispatched to a meal plant where they are turned into meal and oil. Guidance has been provided to industry on the potential markets for below MCRS fish, specifying that food hygiene or Animal By-Products legislation should be adhered to, depending on the markets the fish is being directed to.

**21. Has control and monitoring been based on risk assessment?**

**Please supply information on the risk assessment tools used and the results obtained, including those implemented by the regional Control Expert Groups in cooperation with EFCA.**

Risk assessments are currently being used to categorise the highest risk fisheries with a view to implementing appropriate and proportionate control tools. Control activities are risk based although the highest risks are not necessarily linked to the landing obligation. They have thus far focussed on control and technical risks to compliance not associated with the landing obligation.

**22. Has the “last observed haul” approach elaborated by EFCA as a tool for monitoring the implementation of the landing obligation and to derive potential targets for inspection been used?**

**Please give details of the fisheries covered and the extent of sampling.**

The UK has been fully involved with the implementation of the last observed haul approach elaborated by EFCA, for both pelagic and demersal fisheries.

### **Information on the socioeconomic impact of the landing obligation**

**23. Using the most appropriate indicators defined below, provide information on the socioeconomic impacts on:**

- **The catching sector;**
- **Upstream businesses;**
- **Processors;**
- **Consumption and markets;**
- **Costs for Member States.**

Detailed statistics on 2018 will not be available until later this year and we anticipate that it will be difficult to disentangle the effects of the landing obligation from wider movements in the fishing industry due to the lack of an identified control group fishing outside the landing obligation to which we can compare.

### **Information on the socioeconomic impact of the landing obligation.**

**24. Have there been any reported incidents of overloading of vessels causing stability problems?**

None that we are aware of.

**Please specify the number and nature of such incidents.**

**Can you quantify these in terms of:**

- **Number of deaths or serious injuries;**
- **No of vessels involved as a % of the specific fleet segment.**

**25. Have there been any reported incidents of overloading of vessels forcing them to return to port early?**

**Please specify the number and nature of such incidents.**

We are not aware of any such situations.



**26. Have there been any reported incidents or accidents on board vessels that can be attributable to excessive workload?**

**Please specify the number and nature of such incidents or accidents.**

There were two occasions where electronic monitoring cameras were deliberately obscured by crew. Through discussions with vessel masters it has been confirmed that these events have arisen after unexpected hauls of juvenile fish have been taken and that the volume of fish concerned would have required several hours of processing by crew which would involve working on deck in excess of safe working hours. Such volumes of undersized fish are infrequent and large enough to render selectivity of the trawl ineffective.

**27. Has any national legislation relating to safety on board fishing vessels arising from the landing obligation been amended or introduced?**

**Please provide details of this legislation.**

Fishing vessel safety is regulated by the Maritime and Coastguard Agency. Amendments to legislation have not been necessary as vessel stability and safety rules already cover fishing vessel operations.

**28. Have you provided or received any funding under Article 32 (Health and safety) of EMFF or Article 3 (Eligible operations on safety) and Article 6 (Eligible operations on working conditions) of Commission Delegated Regulation (EU) 2015/531 to mitigate against potential safety issues caused by the landing obligation? Yes/No**

**If yes, please specify the number of projects involved and the nature of the measures taken.**

**If no, have any measures been taken which have not been funded under the EMFF?**

Under Article 32 of the EMFF England, Wales and Northern Ireland have not funded any projects but there is provision to fund such projects if an application is made.

Marine Scotland committed £1.03m (£773k EMFF & £257k National) to Art 32 projects but none have specifically mentioned the LO as the reason for requiring the work.

**Information on the use and outlets of catches below the minimum conservation reference size of a species subject to the landing obligation**

**29. What have been the main reported uses and destinations for catches below MCRS?**

**Can you quantify these catches by species in terms of volumes, price per tonne and associated costs for the different outlets such catches have been sent?**

The main reported uses of below MCRS fish are for fish meal and pot bait. Guidance to industry does list a wider potential list of markets, but in reality these are the most readily accessible ones. We will evaluate whether this changes over subsequent years.

**30. Have you carried out any studies or pilot projects considering the potential uses for such catches?**

**Please provide details of such studies or pilot projects.**

Work published by Cefas in 2013 (Mangi and Catchpole, 2013), explored the potential uses for previously discarded undersized catches. Results indicate that opportunities for using discards include reduction to fishmeal and fish oil, ensiling, composting, anaerobic digestion with energy recovery, and freezing (prior to use as bait). In the UK, nine main outlets expressed interest in using discards as raw materials to process into animal, pet and aqua feed; organic fertilizer; frozen bait; and other products, such as renewable energy generation. Estimates of discard quantities from English fleets show that most of the outlets are not located close to the main landing ports where the discards would likely come ashore. However, most outlets have extensive established transport links, which would enable them to cover even the remote ports. Preliminary analysis shows that a discard ban will lead to increases in annual operating costs for fishers due to the transport costs and low value of the material. Assuming that discards are processed for fishmeal, then majority of the fishers will make losses in their fishing operations, even before considering the implications of using quota to land undersized fish.

**Information on port infrastructures and of vessels' fitting with regard to the landing obligation for each fishery concerned**

**31. Have you provided funding under Article 38 of the EMFF for modifications on board vessels for the handling of catches on board?**

**Please specify the number, nature and total amount invested in such projects.**

England has approved 243 projects, predominantly to support the purchase of more selective gear types, with an EMFF value of £2,441,494. These projects have contributed in significantly reducing the bycatch that the applicants have to land. The grant funding in this area also contributes to limitation of the physical or biological impacts of fishing on the ecosystem or sea bed. It is difficult to isolate or make a clear distinction between projects that contribute specifically to just the landing obligation in that in general several benefits will be realised alongside the reduction of bycatch which would be discarded.

Within Scotland two vessels have been awarded a total of £178k (£134k EFF & £44k National). This was for vessel modifications to change from scallop dredging to prawn/lobster creeling due to limitations on dredging put in place by Marine Protected Areas (MPA) designations.

**32. Have you provide funding under Article 43 of the EMFF for investment in the infrastructure of fishing ports, auction halls and shelters for the handling of unwanted catches?**

**Please specify the number, nature and total amount invested in such projects.**

England has approved two projects, primarily focusing on harbour improvements with some equipment included in these projects, with EMFF funding of £236k. These projects have helped to facilitate compliance with the obligation to land all catches. This is an area where the uptake has been low and the team have adopted various approaches to encourage applications. We have engaged with key stakeholders and industry throughout the life of the scheme but the level of interest in this area has been minimal as sufficient data has been unavailable and the species covered in the phased approach of the landing obligation have yet to make an impact on most ports and harbours in England. Uncertainty surrounding Brexit has also been cited as a reason for the lack of interest.

Within Scotland, three projects have been awarded £63,400 grant (£47,550 EMFF & £15,850 National) these have been for refrigerated facilities to store unwanted catch 'discards'

**33. Have you provide funding under Articles 68 and 69 of the EMFF for investment in marketing measures and the processing of fishery and aquaculture products?**

**Please specify the number, nature and total amount invested in such projects.**

England approved ten projects under Article 68 and 85 projects under Article 69 with a combined value of EMFF funding of £5.27m. Several projects in Article 69 have devised innovative methods of reusing and recycling landed catch that isn't destined for human consumption. Pet products has been an emerging market that processors have considered and developed products using fish that would usually be considered waste. Recovering and maximising the value of waste streams is a key aim of the Reformed Common Fisheries Policy and has been incorporated into several projects in EMFF.

Marine Scotland provided the following funding:

Art 68 - £1.88m grant (£1.4m EMFF & £480k National) awarded to eight projects to find new markets & improve market conditions for fishery & aquaculture products.

Art 69 - £9.7m grant (£7.3m EMFF & £2.4m National) awarded to 37 projects for buildings & equipment to increase production and/or efficiency, improve safety, improve energy efficiency and process by-products.

### **Information on the difficulties encountered in the implementation of the landing obligation and recommendations to address them**

#### **34. Please provide information on the following:**

##### **Operational difficulties, such as:**

- **Avoidance and/or selectivity insufficient to avoid unwanted catches;**

There are continuing issues with avoidance and/or selectivity measures in pelagic fisheries, where herring is taken as an unintended bycatch in horse mackerel fisheries. Evidence from REM trials suggest that even with optimised selectivity it is difficult to avoid some species such as Celtic Sea cod where abundance is widespread. This is problematic as quota availability for this species is very low for the UK.

- **Handling, storage and processing of unwanted catches;**

In 2018 the UK did not see significant problems with the handling, storage or processing of unwanted catches.

- **Lack of funding to adapt fishing gears, vessels or port infrastructure.**

The UK is not aware of any specific issues in this area.

##### **Difficulties relating to monitoring, control and enforcement, such as:**

- **Lack of understanding or awareness of the rules;**

Detailed guidance and advice is available however the rules can be complex.

- **Difficulties implementing and monitoring *de-minimis* or high survivability exemptions;**

There are concerns around the reliability of discard data. It is not possible to monitor these levels of discards whilst self-reported discard data remains unreliable and invalidated. Some indication of discard levels can be gleaned from observer and inspection data. Whilst such data may provide an indication of discard levels it will not be possible to ascertain a precise figure of *de-minimis* use during the course of a year as the percentage of total catches can only be established at the year's end.

- **Implementation problems with regard to control/monitoring processes or infrastructure (e.g. adaptation of ERS systems);**

Current systems are able to cater for discards and undersized fish although further changes to the XSD are required to allow for the reason for discarding, e.g. *de-minimis* etc.

- **Refusal to carry observers.**

N/A

**Difficulties in fully utilising fishing opportunities, such as:**

- **Problems re-allocating quota to cover catches previously not landed;**

N/A

- **Problems with the timing or availability of quota swaps;**

The UK is unaware at this stage of problems with timing or availability of quota swaps.

- **Fisheries being forced to close early due to choke problems.**

No closures were necessary in 2018.

**Questions concerning control and enforcement, added in the questionnaire sent in 2017**

**35. How is the effective control and enforcement of the landing obligation at sea and the accurate documentation of all catches, including quantities discarded, ensured?**

Enforcement of the landing obligation is carried out around the coast, at sea and in the air. Catch details including discards and the exemptions utilised are checked during routine pre-boarding checks with catches verified once landed or at the designated areas within market halls. Fisheries identified as high risk can be carefully monitored for discards and breaches of the Tech Con regulations by both Air surveillance and Marine Protection Vessels. Boarding's at sea are carried out both as routine boarding's or specific tasking to concentrate on last haul analysis. Although potential trends are identified no breaches of the landing obligation has taken place whilst officers have been present.

The use of remote electronic monitoring (REM) has been deployed on English North Sea whitefish vessels.

REM has also been deployed in the South West on beam trawlers and trawlers to corroborate skipper-reported discard data and to assess selectivity measures prior to the full landing obligation coming into force. The industry are also required to report discards in their logbooks.

**36. How many suspected and confirmed infringements, related to the landing obligation, have been detected at sea and at landing/marketing?**

**In cases of confirmed infringements please indicate the circumstances of the offence and the sanctions applied, including penalty points.**

There have been no recorded incidents of non-compliance in 2018 in the UK.