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COORDINATING WORKING PARTY ON FISHERY STATISTICS

Intersessional Meetings of Aquaculture and Fisheries Subject Groups

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CWP ad-hoc Task Group on catch concepts (CWP-IS/2022/1)

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Document Summary

This document provides the progress report of the work carried out by the ad-hoc group on fishing catch concepts (TG-Catch) between March 2021 – June 2022, which was requested to review the CWP catch concepts and associated definitions, including revisions to the CWP catch concepts diagram.

CWP members are invited to provide feedback on the work carried out, including proposals to update and revise the CWP catch concepts diagram and catch related definitions for endorsement by CWP-27.

1. BACKGROUND

CWP-26 established the ad-hoc task group on fishing catch concepts (TG-Catch) to:

- i. Review, revise and where necessary further develop CWP catch concepts and associated definitions including the components 'retained catch', 'bycatch' and 'intended catch'.
- ii. Review and develop the application of catch concepts to the broader context of recreational, small-scale, artisanal, commercial, semi-industrial and industrial fisheries.

As part of this work, TG-catch was also tasked with considering revisions to the catch concepts and associated diagram that were proposed at the technical workshop on global harmonization of tuna fisheries statistics (Appendix 7, FAO, 2019b¹). In addition, CWP Fishery Subject Group requested that further consideration be

¹ <https://www.fao.org/documents/card/en/c/ca3132en/>

given to a definition and use of the term ‘fish’ in the context of the catch concepts (FAO, 2019a). A summary of the tasks and timeframe for the work of the TG-Catch is provided in [Appendix 1](#).

Progress on this work was reported at the Joint CWP Task Group meeting (Catch Concepts, Fishing Effort), 6th July², and the Intersessional Meeting of CWP, 2-5 November 2021³. Since November 2021, the TG-Catch has continued to refine the catch concept diagram and associated catch-related definitions, taking into consideration feedback from the last CWP Intersessional Meeting and also discussions with selected TG members.

The status of proposals to revise the CWP catch concepts and the associated catch diagram are presented below for the consideration and endorsement of CWP members.

Part 1: Revision to the CWP Catch Concepts Diagram

A copy of the current CWP catch concepts diagram, as well as proposed revisions to the diagram, are provided in Figs. 1 and 2 respectively.

Revised catch concepts diagram: issues to note

- The revised diagram is intended to provide clearer representation of the catch concepts and their relationships in terms of the different components of total catches, landings and discards that more accurately reflect the status and definition of datasets disseminated by CWP members – many of who now routinely disseminate landed catches plus estimated of discards.
- The addition of new elements such as post-release mortality (proposed by ICCAT, expressing the proportion of the discarded catch released alive which subsequently die), is further intended to ensure the relevance and coherence of concepts presented the diagram for CWP members.
- The diagram is intended to be sufficiently generic to be of relevance to fisheries of priority to different CWP members, including large-scale commercial, artisanal, recreational and subsistence fisheries. Not all elements of the diagram will be applicable to all fisheries (e.g., artisanal fisheries, where there may be no or negligible discards), in which case certain elements of the diagram can simply be ignored.
- Greater prominence is given to the position and relevance of concepts of ‘gross catches’ and ‘gross removals’ in order align more closely with the requirements of stock assessments and the estimation of biomass removals due to fishing activity. This contrasts to earlier iterations of the catch concept diagram where the importance and position of ‘landings’ (i.e., nominal catches) was given greater emphasis.
- The concepts of ‘nominal landings’ and ‘nominal catches’ are separated and clearly distinguished, in an attempt to address ambiguity in the use of *landings* and *catches* which are often used interchangeably in reference to nominal catches.

² https://www.fao.org/fileadmin/user_upload/cwp/CWP_2021/presentations/Pr2.pdf

³ <https://www.fao.org/publications/card/en/c/CB9063EN/>

- The inclusion of (+), (-) and (x) connecting lines between different components in the diagram is intended to guide users to distinguish quantities which are added, subtracted, or multiplied by a predefined coefficient, at each stage of the diagram.
- Definitions of each component in the diagram are provided in tabular form to accompany the new diagram in order to simplify the design and minimise the amount of explanatory text on the diagram itself.

Figure 1. Current CWP catch concepts diagram (<https://www.fao.org/3/bt981t/bt981t.pdf>)

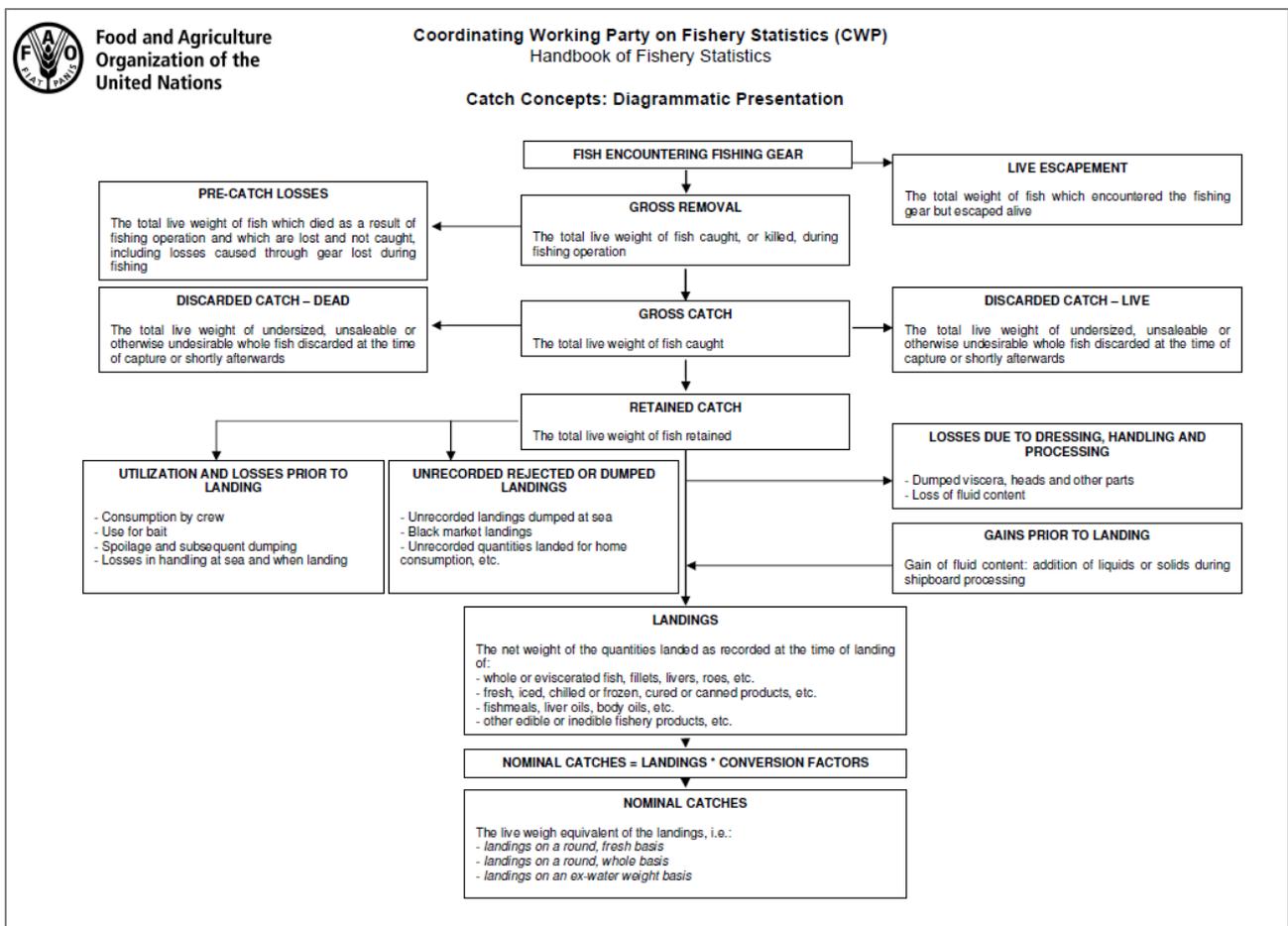


Table 1. Revised catch concept diagram: accompanying definitions

Catch concept	Description
Fish encountering fishing gear (FE)	The live weight of all aquatic animals ⁴ which encounter the fishing gear that are either caught (or otherwise killed and lost), or escape alive.
Live escapement (EL)	The live weight of all aquatic animals which encountered the fishing gear but escaped alive.
Gross removal (GR)	The live weight of all aquatic animals caught, or killed, during a fishing operation, including individuals which are killed but may be lost and not caught.
Pre-catch losses (PCL)	The live weight of aquatic animals which died as a result of the fishing operation and which are lost and not caught, including losses caused through gear lost during fishing, depredation, as well as entanglement with the fishing gear.
Gross catches (GC)	Total live weight of aquatic animals caught (i.e., including retained catches and discards).
Retained catch (RC)	Total live weight of aquatic animals retained.
Losses due to dressing, handling and processing (LDP)	Losses due to dumped viscera, heads and other parts, or loss of fluid content.
Gains prior to landing (GPL)	Gain of fluid content, or addition of liquids or solids during shipboard processing.
Utilization and losses prior to landing (ULL)	Quantities consumed by the crew, used for bait, spoilage and subsequent dumping, or losses during handling at sea or when landing.
Total landings (TL)	<p>Total net weight (product weight) of the quantities landed, at the time of landing, which may include processed and unprocessed quantities, e.g.,</p> <ul style="list-style-type: none"> - whole or eviscerated fish, fillets, livers, roes, etc. - fresh, iced, chilled or frozen, cured or canned products, etc. - fishmeal's, liver oils, body oils, etc. - other edible or inedible fishery products, etc. <p>Quantities may include recorded landings and (estimates of) unrecorded landings, e.g.;</p> <ul style="list-style-type: none"> - black market landings; - faux poissons⁵; - unrecorded quantities landed for home consumption or subsistence; - unrecorded retained catches from recreational or sports fisheries; - any other type of unrecorded landings.
Live-weight equivalent conversion factor (LWE)	Conversion factor used to transform processed quantities to live weight equivalent (LWE).

⁴ A species or group of species of living aquatic (i.e., marine, freshwater or brackish) resources which are targeted during fishing or associated with the catch of the target species or group, subsequently processed or not.

⁵ https://horizon.documentation.ird.fr/exl-doc/pleins_textes/divers18-05/010072552.pdf

Nominal landings (NL)	Total landings converted to live weight equivalent, also expressed in some national publications as: <ul style="list-style-type: none"> - landings on a round, fresh basis; - landings on a round, whole basis; - landings on an ex-water weight basis.
Nominal catch (NC)	Represents the nominal landings, plus the component of the catch discarded dead, plus the post-release mortality of fish discarded alive. It approximates the concept of ‘total catch’ (i.e., the quantity of biomass removed).
Discarded catch (D)	The total live weight of aquatic animals discarded, either dead or alive.
Discarded dead (DD)	The total live weight of aquatic animals discarded dead, including recorded and unrecorded discards, including catch rejected or dumped at sea due to, e.g., spoilage or retention bans. <ul style="list-style-type: none"> - Recorded dead discards may be collected via logbooks, sampling of catches, onboard observers, electronic monitoring systems, or other forms of data recording. - Unrecorded dead discards may not be available in many cases, but in some fisheries may be estimated (e.g., applying correction factors based on ad-hoc studies, empirical observation or knowledge of the fisheries or fishing operations).
Discarded alive (DL)	The total live weight of aquatic animals discarded alive, including recorded and unrecorded discards alive. <ul style="list-style-type: none"> - Recorded discards alive may be collected via logbooks, sampling of catches, onboard observers, electronic monitoring systems, or other forms of data recording. - Unrecorded discards alive may not be available in many cases, but in some fisheries may be estimated (e.g., applying correction factors based on empirical observation, knowledge of the fisheries or fishing operations, or discard survival assessments⁶).
Post-release mortality conversion factor (PRM)	Post-release mortality of the catch that is discarded alive, usually estimated by means of fixed proportion of the total discards alive. Quantities are subsequently recorded under the nominal catch due to the loss of biomass.

⁶ ICES Guidelines on Methods for Estimating Discard Survival, September 2021:
[https://www.ices.dk/sites/pub/Publication%20Reports/Cooperative%20Research%20Report%20\(CRR\)/CRR351.pdf](https://www.ices.dk/sites/pub/Publication%20Reports/Cooperative%20Research%20Report%20(CRR)/CRR351.pdf)

Part 2: Proposed revisions to the definition of catch related concepts

CWP members are invited to review and provide additional comments for the following catch related concepts:

- [Nominal catch and nominal landings](#)
- [Retained catch](#)
- [Fish](#)
- [Discards](#)
- [Bycatch](#)
- [Intended catch and incidental catch](#)

Nominal catch & Nominal landings

Current CWP definition⁷:

- Nominal catch (also referred to as nominal landings): Landed weight converted to a live weight basis often by use of a conversion factor.
- Nominal catch is often referred to as the live weight equivalent of the landed weight or shortened to the live weight, and in some national publications it is also referred to as landings on a round, fresh basis, landings on a round, whole basis or landings on an ex-water basis.
- Care should be taken when referring to the nominal catch as the catch since in many situations the catch includes discarded components which are not landed.
- Often, in further processing the data, conversion factors are applied to the individual products (i.e., landed weight) which express the weight in a more homogenous way. Once verified, nominal catch is also in many cases the definitive declaration of what was caught and the amount which is applied against quotas or reported by a country.

Proposal for revised definition(s) (key changes highlighted in yellow):

- *[TG-Catch notes] Based on the discussions with CWP members, and also changes suggested to the catch concepts diagram, a proposal is made is to separate and clearly define the concepts of ‘Nominal landings’ and ‘Nominal catches’.*
- *This is partly in recognition that the current definition of Nominal catches is not always applied consistently by CWP members, the terminology of ‘landings’ and ‘catches’ is often used interchangeably, as well as the growing importance of discards in CWP member’s disseminated statistics.*

Nominal ~~catch~~ **landings**

⁷ <https://www.fao.org/cwp-on-fishery-statistics/handbook/capture-fisheries-statistics/catch-and-landings/en/>

- Nominal ~~catch~~ landings represent ~~is often referred to as~~ the live weight equivalent of the landed weight, often calculated by use of a conversion factor, in order to express the landed weight in a more homogenous way.
- Nominal landings may be referred to as the “live weight”, or ~~and~~ in some national publications it is also referred to as “landings on a round, fresh basis”, “landings on a round, whole basis” or “landings on an ex-water basis”, or “green weight”.
- Note: care should be taken when referring to nominal landings ~~catch~~ as ‘the catch’, since in many situations the catch includes discarded components which are not landed.

Nominal catches

- Nominal catches refer to the total landings expressed in live weight equivalent (i.e., nominal landings), plus the component of the catch discarded dead, as well as the post-release mortality of fish discarded alive.
- Once verified, the nominal catch in many cases represent the definitive declaration of what was caught and the amount which is applied against quotas or reported by a country.

Notes:

- Some CWP members have noted that the position of ‘nominal catch’ in the current catch concepts diagram is somewhat misleading, as it is derived from a component of total *landings*, with the term ‘catch’ generally used at a higher level in the diagram’s hierarchy.
- This points to a wider issue with the way in which ‘catches’ and ‘landings’ are often used interchangeably in the broader discussion of catch-related concepts – specifically in the case of nominal catches, which are sometimes used to represent the total catch rather than total landings. Previous CWP definitions of nominal catches address this point directly:

“Care should be taken when referring to the NOMINAL CATCH (the live weight equivalent of the landings) as the CATCH, since in many situations the initial catch (the GROSS CATCH) has been reduced by a number of factors”⁸.

- Discussions with CWP members have also highlighted the different ways in which ‘nominal catch’ or equivalent terms (such as ‘total catch’ or ‘annual catch’) are applied, but may not necessarily correspond to the current CWP definitions.
- Of particular note is the inclusion of discards in Nominal Catches disseminated by ICCAT. As already noted, many CWP members disseminate estimates of total catches (e.g., landings plus discards) in order to more closely align with the requirements of stock assessments and estimates of biomass removals due to fishing activity.

⁸ <https://www.fao.org/cwp-on-fishery-statistics/archivedhandbook/capture-fisheries-statistics/catch-and-landings/en/>

- Some CWP members have suggested that the term ‘nominal landings’ rather than ‘nominal catches’ would be a more accurate description, and would better align with the current definition (see above) in terms of the quantities *landed* (expressed in live weight equivalent).
- On the other hand, it was also noted during the November 2021 CWP Intersessional Meeting that replacing ‘nominal catch’ with ‘nominal landings’ may be problematic, given the concept of nominal catches is well established and generally understood to represent recorded landings (in live weight equivalent) – rather than ‘the catch’ including discarded components that are not landed.
- In addition, ‘*landing*’ statistics are often used to refer to the landed weight, not reconverted into live weight equivalent, and the change of the terminology could generate further confusion. The similarity in names (i.e., nominal catches and nominal landings) may also lead to additional confusion and misinterpretation of each concept.
- Despite these issues, the case is made that nominal catches and nominal landings may be justified in the sense that ‘nominal’ is used in the context of “(a quantity or dimension) stated or expressed but not necessarily corresponding exactly to the real value”; in other words, an approximation of the total landings and total catches (expressed in live weight equivalent).

Retained catch

Current CWP definition⁹:

- Estimated component of the catch which is retained on board during a fishing trip.
- An estimate of the retained catch is reported as total live weight of fish retained and in some fisheries the number of individuals retained is also required to be reported.
- If a retained catch is intended for aquaculture, then for the purpose of fishery and aquaculture statistics that retained catch is required to be recorded as unrecorded, rejected or dumped landings and any post-release mortality of that catch is required to be recorded as discarded catch.

Proposed revision¹⁰:

- Component of the catch which is retained during a fishing trip. The retained catch is reported as total live weight of fish retained and in some fisheries the number of individuals retained is also required to be reported.
- If a retained catch is intended to be transferred to cages for the fattening of fish in aquaculture, then for fishery statistics that retained catch is required to be recorded as ‘for other purposes of utilization and process’ and any post-release mortality of that catch is required to be recorded as ‘discarded catch’.

Notes:

- Minimal changes to the definition since the revisions presented to CWP-26 (2019) and CWP-FS (2019).
- However further consideration may be needed – in terms of the catch concepts diagram – regarding the component of the retained catch which may be retained alive (e.g., for the purposes of fattening in aquaculture or are maintained alive for the market, as in the case of bluefin tuna as well many other fisheries around the world).
- Currently the revised catch concepts diagram does not distinguish between the fate of retained catches (i.e., whether retained catches-dead and retained catches-alive, as with discards) – and in particular the post-mortality of the retained catch-alive.

⁹ <https://www.fao.org/cwp-on-fishery-statistics/handbook/capture-fisheries-statistics/catch-and-landings/en/>

¹⁰ Revisions presented to CWP-26 (2019); revised by CWP-FS (2019).

Fish / Aquatic animals**Fish: current definition (presented to CWP-26 (2019))**

- A species or group of species of living aquatic (i.e., marine, freshwater or brackish) resources which are targeted during fishing or associated with the catch of the target species or group, subsequently processed or not, many of which are recorded in the ASFIS ¹¹List of Species for Fishery Statistical Purposes.
- The ASFIS classification system provided information on the species descriptors (ISSCAP code, taxonomic code, 3-alpha code, scientific name, names in English, French and Arabic, etc.) and ISSCAP codes which allow species to be grouped taxonomically. Other types of grouping or splitting of species may be implemented to meet specific national or regional reporting requirements, and in such cases the mapping against codes of the ASFIS classification is essential in order to facilitate data exchange.

Proposed revision: Aquatic animals (in place of ‘Fish’) (key changes highlighted in yellow):

- All aquatic animal species of living aquatic resources which are targeted during fishing or associated with the catch of the target species or group, subsequently processed or not, many of which are recorded in the ASFIS List of Species for Fishery Statistical Purposes.
- Includes all aquatic animals (fish, crustaceans, molluscs and other associated aquatic animals, including seabirds, mammals, reptiles, invertebrates), algae (macroalgae, microalgae, and cyanobacteria), as well as plants and microorganisms harvested through fisheries and aquaculture activities, whether occurring in marine, inland or brackish waters.
- The ASFIS classification system provides information on the species descriptors (ISSCAP¹² code, taxonomic code, 3-alpha code, scientific name, names in English, French and Arabic, etc.) that allow species to be grouped taxonomically. Other types of grouping or splitting of species may be implemented to meet specific national or regional reporting requirements, and in such cases the mapping against codes of the ASFIS classification is essential in order to facilitate data exchange.

Notes:

1. Most of CWP catch-related concepts, such as “retained catch”, “bycatch” and “discards”, include references to “fish” which – without reference to the definition itself – may be misinterpreted as referring to fin-fish only.

¹¹ Aquatic Science and Fisheries Information System (<https://www.fao.org/fishery/en/collection/asfis/en>).

¹² International Standard Statistical Classification of Aquatic Animals and Plants.

2. This appears to take the current definition of “fish” out of context, which includes *all* aquatic species or groups of living aquatic resources (e.g., crustaceans, cephalopods, molluscs, etc.). Nevertheless, TG-Catch was tasked with reviewing the current definition of “fish” and use of the term in the context of the other catch related concepts, and revise the definition if considered necessary.
3. In order to address the issue of possible misinterpretation, the proposal is to use the term “aquatic animals” (rather than “fish”) to more accurately reflect the inclusion of all aquatic animals (fish, crustaceans, molluscs and other aquatic animals, including seabirds, mammals, reptiles, invertebrates), as well as plants and microorganisms harvested through fisheries and aquaculture activities, whether occurring in marine, inland or brackish waters.
4. The proposed definition also aligns closely with the same concept used in the FAO’s 2022 The State of World Fisheries and Aquaculture (to be published in due course), which also uses “aquatic animals” rather than fish, defined as:

Plants and microorganisms harvested through fisheries and aquaculture activities, whether marine or inland. Includes all aquatic animals (fish, crustaceans, molluscs and other aquatic animals), algae (macroalgae, microalgae, and cyanobacteria).
5. Alternative definitions were also reviewed, such as PSMA which defines “fish” as: *all species of living marine resources, whether processed or not*¹³, however this would exclude aquatic species or resources occurring in inland and brackishwaters, and so was not considered further.

¹³ p.2, <https://www.fao.org/3/i5469t/i5469T.pdf>

Discards

Current CWP definition¹⁴:

- Estimated component of the catch which is the total live weight of undersized, unsaleable or otherwise undesirable whole fish and other aquatic organisms which are discarded at the time of the capture or shortly afterwards.
- Discarded catch refers to whole fish and other aquatic organisms discarded dead or alive, and may include species taken as bycatch. Discarding in some fisheries is prohibited.

Proposed revised definition (key changes highlighted in yellow):

- Discards refer to the component of the catch (fish and other aquatic organisms) which are discarded alive or dead at the time of the capture or shortly afterwards.
 - Discarded catch is generally expressed as the live weight of whole fish and other aquatic organisms and may include species taken as bycatch.
 - Discarding in some fisheries may be prohibited.
- *[TG-Catch notes] Minor wording revisions for the purposes of clarity, including the inclusion of “generally expressed as the total live weight of....” to accommodate cases where discards may be expressed in terms of numbers (e.g., seabirds, turtles, cetaceans, elasmobranchs, etc.).*

Notes:

- It was suggested that the current CWP wording describing the reasons for discarding, (i.e., “undersized, unsaleable, or otherwise undesirable”), may be too restrictive and exclude other reasons for the release of catch, such as species or juveniles which may be subject to a retention ban, given that there is always a reason why catches are discarded.
- Two possible solutions are to:
 - (i.) include additional categories to ensure that the full range of reasons for discarding are sufficiently captured in the description; or
 - (ii.) alternatively, abbreviate the current definition (as proposed above) in order that the wording is sufficiently generic to encompass all possible reasons for discarding.

¹⁴ Revisions presented to CWP-26 (2019); revised by CWP-FS (2019).

Bycatch

Current CWP definition¹⁵:

- Component of the catch which represents non-targeted fish associated with the catch of the target species or group towards which fishing effort is directed, or other aquatic organisms taken incidentally during the course of fishing (e.g., birds, mammals, reptiles, invertebrates).
- Some or all of the bycatch may be returned to the sea as discarded catch, either dead or alive. The catch taken incidentally is also referred to as incidental catch.

Proposed revised definition (key changes highlighted in yellow)::

- **Bycatch refers to the** component of the catch that represents non-targeted **fish and other aquatic animals associated** with the catch of the target species or group towards which fishing effort is directed, or other **associated aquatic species** taken **onboard or affected** incidentally **in the water** during the course of fishing (e.g., birds, mammals, reptiles, invertebrates). **Bycatch may also be referred to as associated species.**
- *[TG-Catch comments]: Minor wording changes proposed (highlighted in yellow) to include, and distinguish, between incidental interactions with bycatch which may be taken on board and returned to the sea (e.g., marine turtles), as opposed to incidentally affected through interactions with fishing equipment but not taken on board (e.g., seabirds).*
- Some or all of the bycatch may be retained as catch taken incidentally (also referred to as the “incidental catch”), or returned to the sea as discarded catch, either dead or alive.
- *[TG-Catch comments] Minor revision to the wording to improve clarity and the understanding that bycatch can either be (i.) retained (as incidental catch) or (ii.) discarded dead or alive.*

Notes:

- 1.1 There may be examples where sub-groups (e.g., juvenile fish) of a given species are considered as bycatch. In other words, the concept of bycatch “*species*” may be misleading in cases where adults may be the target species, but individuals such as juveniles considered as bycatch (but which may still be retained as “incidental catches” or discarded dead or alive).
- 1.2 For this reason, the revised definition avoids specific references to bycatch species and instead refers to “non-targeted fish and aquatic animals” to encompass individuals within a species, species groups, or subset of a population that may also be associated with the target species that fishing effort is directed.
- 2.1 The issue of which species are considered as bycatch can vary depending on the context, e.g., national or international institution concerned. For example:

¹⁵ Revisions presented to CWP-26 (2019).

- In the case of IOTC, bycatch is defined as '*all species, other than the 16 species listed in Annex B of the IOTC Agreement, caught or interacted with by fisheries for tuna and tuna-like species in the IOTC area of competence*'¹⁶, while IOTC CPC's may in fact be targeting a much greater number of species than just tuna and tuna-like species within their fisheries.
- In the context of demersal fisheries (or bottom fisheries) in NAFO, the species or stock with the highest quantity in a haul is considered the directed or target species, while the remaining species or stock in the haul is considered "bycatch".

2.2 In other words, a component of the catch may be considered as either bycatch or intended catch/target species, depending on the context and mandate in which the data is being collected or disseminated – e.g., national fisheries institutions versus RFBs/RFMO requirements. This issue is difficult to resolve, other than by ensuring that the definition of bycatch is sufficiently generic in order not to be prescriptive on the specific species that qualify as bycatch.

3.1 In the case of small-scale fisheries (SSF), the concepts of targeted and non-targeted fish or species may not necessarily be applicable (i.e., there may be no bycatch, as all fish/species may be considered "targeted" which are either retained, or discarded if considered to be undersized, unsaleable, etc.).

3.2 Nevertheless, there are still clearly instances of SSF "bycatch", for example in the case of unintended interactions with birds or aquatic mammals which do not fall under this current CWP definition of bycatch. For this reason, the inclusion of "other aquatic organisms taken or affected incidentally during the course of fishing (e.g., birds, mammals, reptiles, invertebrates)" is intended to try and address this specific issue. "Incidental" is used in the context of rare incidents or events such as catches of marine mammals, turtles or seabirds.

¹⁶ https://www.iotc.org/sites/default/files/documents/2018/12/IOTC-2019-WPICMM02-11a_-_Glossary_of_terms_and_definitions_EN.pdf

Intended catch and Incidental catch

Intended catch (target species or directed species)

- Intended catch, also referred to as directed species or target species, refer to species, species groups, or individuals within a species or group that are primarily sought and which fishing effort is directed towards. **There may be primary as well as secondary target species¹⁷.**
 - Intended catch or target species are distinguished from species, species groups, or individuals, not specifically targeted as a component of the catch (i.e., by-catch), that may be incidentally captured and retained (i.e., as incidental catch) or discarded alive or dead.
- *[TG-Catch comments]: The inclusion of “primary as well as **secondary** target species” (Source: Fishbase) may need to be clearly defined (e.g., also with practical examples) to avoid confusion with other, related, terms such as ‘associated species’ (i.e., bycatch). An alternative suggestion would be remove this last sentence to avoid potential confusion.*

Incidental catch or species

- Incidental catch refers to non-target species, species groups, individuals (e.g., juvenile fish) or other unintended catch not specifically targeted as a component of the catch (i.e., by-catch), which are taken incidentally during the course of fishing and are retained.
- *[TG-Catch comments] The definition of incidental catch/species proposed here describes the component of the non-targeted catch (i.e., bycatch) which is captured incidentally during the course of fishing and retained; as opposed to bycatch which are caught, but not retained, and are discarded either dead or alive.*

Notes:

- Based on previous CWP discussions, a number of terms are used by members such as “target species”, “intended catch”, “directed species”, as well as “incidental species/catch” and “associated species” which may have overlapping definitions.
- The concept of “intended” or “target species” therefore may require further consideration by CWP members in terms of usage, given that other terms such as directed species and intended species) may be used synonymously in the context of different fisheries.

¹⁷ <https://www.fishbase.se/Glossary/Glossary.php?sc=is&q=target+species>

Appendix 1: Proposed tasks and timeframe for the work of TG-catch

	Task	Timeframe
0.	Develop draft ToRs and work plan in consultation with TG Convener and circulate to members for validation. Call for TG participations and their contact details.	Feb 2021
1.	Finalise ToRs and establish TG membership	March 2021
2.	Review and develop the catch concepts and diagram, including consideration of revisions proposed by the tuna technical workshop and broader application of the concepts to recreational, small-scale, artisanal, commercial, semi-industrial and industrial fisheries	June 2021
3.	Concurrently with 2, review, revise and where necessary further develop the catch concepts definitions	June 2021
4.	Circulate first draft of the revised catch concepts, diagram and definitions	July 2021
5.	Consider further development to the catch concepts, diagram and definitions	Prior to Intersessional meeting (IS)
6.	Concurrently with 5, consider implications of the revised catch concepts and definitions in the work of TG-effort and TG-RH2	Prior to IS
7.	Present advanced version of revised catch concepts, diagram and definitions at the intersessional meeting (IS)	IS Sept/Oct 2021
8.	Consider further developments including intersessional meeting feedback and enlarging the scope of contributions to other CWP parties	Post IS
9.	Incorporate relevant outputs of TG-effort and TG-RH2	Post IS
10.	Present final version of the revised catch concepts, diagram and definitions to CWP-27 for consideration and, if appropriate, adoption	First half of 2022