The Regional DataBase (RDB) Exchange Format

Version 1.3

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International Council for the Exploration of the Sea Conseil International pour l'Exploration de la Mer

H. C. Andersens Boulevard 44–46 DK-1553 Copenhagen V Denmark Telephone (+45) 33 38 67 00 Telefax (+45) 33 93 42 15 www.ices.dk info@ices.dk This document describe the Regional DataBase (RDB) Exchange Format and is a dynamic document, which will be updated according to changes in the Regional DataBase.

This document and the Regional DataBase Exchange Format is using and building on the exchange format described in the ICES Cooperative Research Report No. 296, "Definition of Standard Data-Exchange Format for Sampling, Landings, and Effort Data from Commercial Fisheries".

Import file naming convention

The files imported should follow the following naming convention:

[Country code 3-alpha]_[year]_Q[Quarters included]_[Areas included]_][Data type].[csv or zip]

E.G. SWE_2014_Q1234_CS.csv

The only required naming convention is the file extension and the last two letters that state the data type. But to ease the support it is important to use the full naming convention.

File structure/order of records in the file and file delimiter

It is important to keep the hierarchical structure in the import file for CS data, so HH follow the TR record they belong to etc. So it is NOT possible to import all the TR records in the beginning of a file.

It is suggested that the imported files are comma delimited, but the files can also be imported as XML, but that is not recommended because of the size of the files.

Codes missing

If codes are missing for species please find the relevant species with a status of 'Accepted' in the WoRMS database <u>http://www.marinespecies.org/</u>. Then request ICES Secretariat <u>RDBsupport@ices.dk</u> to add the species. For Harbours please use the in the RDB existing harbour LOCODE codes from the European Master Data Register 'Code-Location-vX.Y.xls'. If the specific harbour does not exist, please check if another relevant nearby harbour code could be used, if not please use the code for country unknown harbour '[XY]999'.

Download of all code lists

All code lists used in the RDB can be downloaded from the RDB by any RDB user. Log in to the RDB and go to: Tools, Lookup Manager, View/Edit Tables, select the code list/table and press the 'Download [selected code list/table]'-button. Then all the codes will be downloaded to your PC in a comma separated file.

Overwriting rules

If data after correction (of already uploaded data) are re-uploaded to the RDB, the new data overwrite the old similar data by the following fields dependent of the data type:

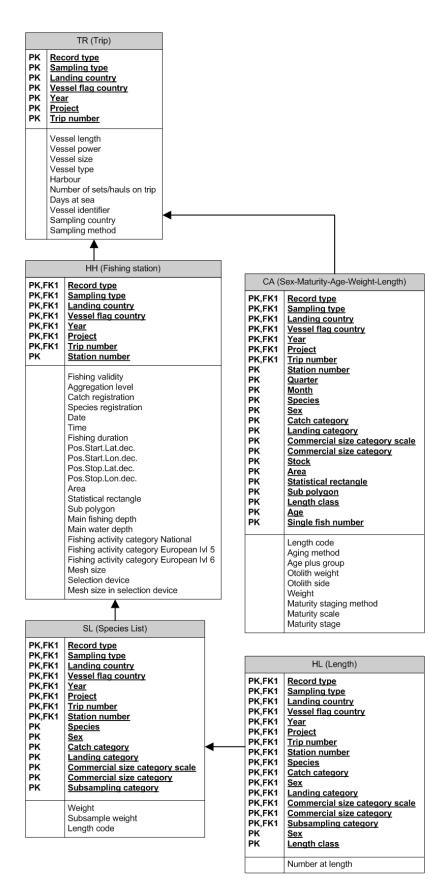
- Commercial sampling (CS): By Year, Country, trip, sampling type, project.
- Landing statistics (CL): By Year, Quarter, Vessel flag Country and Species.
- Effort statistics (CE): By Year, Quarter, Vessel flag Country, Fishing Activity, Area.

Please note that if the correction includes any difference on one or more of the fields, then the system recognise the data as complete new data and the old data are not overwritten and has to be deleted manually (using the "Delete data" procedure).

Record structure

Data type	Record types
CS (Commercial fisheries sampling)	TR (trip)
	A commercial fishing trip that has been sampled on
	board or a sample from a fish market.
	HH (station/(haul header))
	Detailed information about a fishing operation, e.g.
	a haul or a net set.
	SL (species list)
	The sorting strata defined by species, catch
	category, etc.
	HL (haul length)
	Length frequency in the subsample of the stratum.
	One record represents one length class.
	CA (catch aged) = SMAWL (Sex-Maturity-Age-
	Weight-Length) Sex-Maturity-Age-Weight
	distribution sampled representatively from the
	length groups. One record represents one fish.
CL (Commercial fisheries landings statistics)	CL (commercial fisheries landings statistics)
	Official landings statistics with some modifiers for
	misreporting.
CE (Commercial fisheries effort statistics)	CE (commercial fisheries effort statistics)
	Effort statistics from logbooks.

The record types are given in a specific hierarchy (Figure 1) and order within the data file.



	CL (Landing statistics)							
F F F F F F F F F F F F F F F F F F F 	Record type Landing country Vessel flag country Year Quarter Month Area Statistical rectangle Sub polygon Species Landing category Commercial size category scale Commercial size category Fishing activity category European IvI 6 Harbour Vessel length category Unallocated catch weight							
	Unallocated catch weight Area misreported catch weight Official landings weight Landings multiplier Official landings value							
	CE (Effort statistics)							
PK PK PK PK PK PK PK PK PK PK PK	Record type Vessel flag country Year Quarter Month Area Statistical rectangle Sub polygon Fishing activity category National Fishing activity category European IvI 5 Fishing activity category European IvI 5 Fishing activity category European IvI 6 Harbour Vessel length category							

Legend:

Number of trips Number of sets / hauls

kW-days

GT-days

Days at sea

Fishing time / soaking time

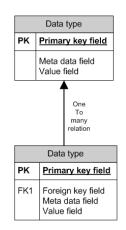


Figure 1. Data entity diagram of the data types.

Trip record (TR) in commercial fisheries sampling data

Req. stand for required. In the Req. column the "M" stands for mandatory and "O" stands for optional.

Order	Field name	Туре	Req.	Basic checks	Comments
1	Record type	Stringing	М		Fixed value TR.
2	Sampling type	String	Μ	Code list	"S" = sea sampling, "M" = market sampling of known fishing trips, "D" = market sampling of mixed trips, "V" = vendor.
3	Landing country	String	М	Code list	ISO 3166-1 alpha-3 codes: the country where the vessel is landing and selling the catch. *
4	Vessel flag country	String	Μ	Code list	ISO 3166–1 alpha-3 codes: the flag country of the vessel. This can be different from the landing country (see description of Landing country). *
5	Year	Integer	М	1900-3000	
6	Project	String	М	Code list	National project name. Code list is editable.
7	Trip code	String	М	String 50	National coding system. *
8	Vessel length	Integer	0	3-160	Over-all length in metres.
9	Vessel power	Integer	0	4-10 000	Vessel power in kW
10	Vessel size	Integer	0	0 - 10 000	Gross registered tonnes (GRT).
11	Vessel type	Integer	М	Code list	0 = Missing-Old data, 1 = stern trawler, 2 = side trawler, 3 = gillnetter, 4 = other boats, 5 = other than boats.
12	Harbour	String	0	Code list	Landing harbour. Using harbour LOCODE codes (5 alpha- numeric) from the European Master Data Register Code- Location.xls
13	Number of sets/hauls on trip	Integer	0	1-900	Total number of hauls/sets taken during the trip. Both the stations where biological measures were taken and the stations that were not worked up should be counted here.
14	Days at sea	Integer	0	1-100	In days. A day at sea shall be measured as any continuous period of 24 hours where a vessel is absent from port
15	Vessel identifier (encrypted before uploaded)	Integer	0	1 - 999 999	The vessel identifier must be encrypted by the countries before data is uploaded. If other data with vessel identifiers are requested in parallel e.g. in connection with a data call, the encrypted unique vessel identifier must be the same across all transmitted data. The vessel identifier must be encrypted so that no-one can map the vessel identifier to the real vessel.
16	Sampling country	String	Μ	Code list	ISO 3166–1 alpha-3 codes. The country that did the sampling.
17	Sampling method	String	М	Code list	"Observer" or "SelfSampling".

*"Sampling type": The sampling types are as follows:

- "S" Sea sampling. Should be used when exact information about time and place for the catch is available. Each haul/set can be worked up separately. Sea sampling can be done by observers or by self-sampling at sea or in the port.
- "M" Market sampling of known fishing trips. Should be used when it was impossible to obtain samples of the discard. Exact information on time and place of catch may not be available, and normally the landing cannot be split into hauls/sets but has to be worked up as pooled for all hauls/sets. Market sampling can be done by observers at fish markets.
- "D" Market sampling of mixed trips (day trips to market). Should be used when it was impossible to obtain samples of the discard. Exact information on time and place of catch may not be available, and normally the landing cannot be split into hauls/sets but has to be worked up as pooled for all hauls/sets/trips. Market sampling can be done by observers at fish markets.
- "V" Vendor. Should be used when the sample has been bought from a fish vendor. The sample is accompanied with a very restricted set of information. Only TR and CA records are allowed for this type (criteria to be checked)

"LandingCountry" and "VesselFlagCountry": The values relating to the fields "LandingCountry" and "VesselFlagCountry" for the given catch should correspond to the CL (commercial landings) data. In the special case where a vessel lands the catch in country A, but the catch is transported directly to country B, it should be registered as being landed in country B, because the catch would add to the CL values for country B.

"Trip code": A trip is defined for:

- Sea sampling, as the period between when a vessel departs from a port (or factory ship) and arrives at a port (or factory ship) for discharge of its catch.
- Market sampling, as a sampling trip to a market. This would typically be just one day. If this grouping information is not available nationally, any other reasonable grouping of market samples can be used. The time-span of the trip has no implication for the raising of the market samples.

Station record (HH) in commercial fisheries sampling data

Order	Field name	Туре	Re q.	Basic checks	Comments
1	Record type	String	М		Fixed value HH.
2	Sampling type	String	М	Code list	"S" = sea sampling, "M" = market sampling of known fishing trips, "D" = market sampling of mixed trips, "V" = vendor.
3	Landing country	String	М	Code list	ISO 3166-1 alpha-3 codes: the country where the vessel is landing and selling the catch.
4	Vessel flag country	String	М	Code list	ISO 3166–1 alpha-3 codes: the flag country of the vessel. This can be different from the landing country (see description of Landing country).
5	Year	Integer	М	1900-3000	
6	Project	String	М	Code list	National project name. Code list is editable.
7	Trip code	String	М	String 50	National coding system. See Trip code for trip/TR record
8	Station number	Integer	М	1-99999	Sequential numbering of hauls. Starting by 1 for each new trip. If the "Aggregation level" is T then this "Station number" should be 999.
9	Fishing validity	String	M /0	Code list	I = Invalid, V = Valid. Mandatory for sampling type "S" and "M". When a haul is invalid, then no SL and HL records are allowed.
10	Aggregation level	String	M /0	Code list	H = haul, T = trip. Mandatory for sampling type "S" and "M". If more than one station exist for the same trip, then all should be "H" (= haul).
11	Catch registration	String	м	Code list	The parts (landings/discards) of the catch, registered as:"All", "Lan", "Dis", "None".*
12	Species registration	String	м	Code list	The species in the catch, registered as "All", "Par", "None".*
13	Date	String	Μ	"1900–01- 01" to "2020–12– 31"	"YYYY-MM-DD" (ISO 8601). If aggregation level is "T", the day = day of first station no. Fishing starting date.
14	Time	String	0	00:00-23:59	Starting time. "HH:MM" in UTC/GTM (No daylight saving/summer time). "Meaning the time in London". If aggregation level is "T", the time shoot = time shot of first station no.
15	Fishing time	Integer	0	5 -99 999	In minutes. Mandatory for sampling type "S". If aggregation level is "T", the total fishing time is entered. (previously called fishing duration).
16	Pos.Start.Lat.dec.	Dec(5)	M /0	0.00000- 80.00000	Shooting (start) position in decimal degrees of latitude. Mandatory for sampling type "S". If aggregation level is "T", the shooting position of the first station no. is entered.
17	Pos.Start.Lon.dec.	Dec(5)	M /0	-85.00000- 31.00000	Shooting (start) position in decimal degrees of longitude. Mandatory for sampling type "S". If aggregation level is "T", the shooting position of the first station no. is entered.
18	Pos.Stop.Lat.dec.	Dec(5)	0	0.00000- 80.00000	Hauling (stop) position in decimal degrees of latitude. If aggregation level is "T", the shooting position of the first station no. is entered.

Order	Field name	Туре	Re q.	Basic checks	Comments
19	Pos.Stop.Lon.dec.	Dec(5)	0	-85.00000- 31.00000	Hauling (stop) position in decimal degrees of longitude. If aggregation level is "T", the shooting position of the first station no. is entered.
20	Area	String	M	Code list	ICES divisions or subdivisions prefixed with the FAO area, like 27.4.c. For the Baltic Sea, Mediterranean, and Black Seas it should be subdivisions. In the Data Collection Regulation (EC, 2008a, 2008b) it is described as level 3= ICES divisions and level 4 =ICES subdivisions.
21	Statistical rectangle	String	M /0	Code list	If aggregation level is "T" and the fishing positions covers more than one rectangle, the rectangle with the most fishing is entered. Area level 5 in the Data Collection Regulation (EC, 2008a, 2008b). Mandatory for sampling type "S" and "M". Mandatory if a value is given for the field "Subpolygon". Use '99x9' outside FAO 27 and FAO 37/Northeast Atlantic and Mediterranean.
22	Subpolygon	String	0	Code list	National level as defined by each country as child nodes (substratification) of the ICES rectangles. It is recommended that this is coordinated internationally, e.g. through the Regional Coordination Meetings (RCMs/RCGs).
23	Main fishing depth	Integer	0	1-4000	Depth from surface to ground rope in meters. If aggregation level is "T", the estimated average depth is entered.
24	Main water depth	Integer	0	1-4000	Depth from surface in metres. If aggregation level is "T", the estimated average depth is entered.
25	Fishing activity category National	String	0	Code list	Country specific Fishing activity category (=métier). National level as defined by each country as child nodes (substratification) of the level-5 codes.
26	Fishing activity category European level 5	String	0	Code list	Should not be filled in when Fishing activity category European level 6 is filled. Metier level 5. Meaning the gear type (level 4) and an underscore "_" and the target assemblage (level 5). Defined in a hierarchic structure in the Data Collection Regulation (EC, 2008a, 2008b).
27	Fishing activity category European level 6	String	М	Code list	Metier level 6. Meaning the gear type (level 4) and an underscore "_" and the target assemblage (level 5). Then an underscore "_" and the mesh size min. "-" max. and selectivity device. Defined in a hierarchic structure in the Data Collection Regulation (EC, 2008a, 2008b). Level 6 is further specified by the Regional Coordination Meetings (EC RCMs, Council Regulation [EC] No 1543/2000) or any later authorized revision.
28	Gear type	string	М	Code list	Mandatory for sampling type "S" and "M"
29	Mesh size	Integer	0/ M	1-999	Stretch measure. Mandatory if sampling type is "S" and gear is not one of the following: LLD, LLS, LHM, LHP, LL, FPO. So optional if one of the gears mentioned is used or if not a sea sampling.
					The mesh size is defined as the size in mm of a mesh stretched in the direction of the long diagonal of the meshes. The gauges to be used for determining mesh sizes shall be 2 mm thick, flat, of durable material, and capable of retaining their shape. The mesh size is measured in the codend if it is a trawl
30	Selection device	Integer	0	Code list	Not mounted=0, Exit window/selection panel=1, grid=2. A selection device is defined as a square-meshed panel or window that is inserted into a towed net.

Order	Field name	Туре	Re q.	Basic checks	Comments
31	Mesh size in selection device	Integer	0	18–310	In mm. The mesh size of a square-meshed panel or window shall mean the largest determinable mesh size of such a panel or window.

"Catch registration": This field describes the fraction of the catch that was registered. If the value "None" is used, Species Registration must also be assigned "None" (criteria to be checked):

- "All" SL record is expected for both landings and discards fractions. If there is no SL record, it is a true measured O-value.
 "Lan" SL record is expected only for the landed fraction. For this fraction, if there is no SL record, it is a true measured O-value. For the discards, no SL record is expected because it has not been registered.
 "Dis" SL record is expected only for the discarded fraction. For this fraction, if there is no SL record, it is a true measured 0-value. For the discarded fraction. For this fraction, if there is no SL record, it is a true measured 0-value. For the landings, no SL record is expected because it has not been registered.
- "None" None. There are no SL records (criteria to be checked).

"Species registration": This field describes whether all species or only a subset has been registered. If the value "None" is used, CatchRegistration must also be assigned "None":

- "All" SL record is expected for all species in the given part of the catch. If there is no SL record, it is a true measured 0-value.
- "Par" Partial. SL record is expected only for some of the caught species. If there is no SL record, it is not known if it is a true measured 0-value. Please refer to the sam-pling protocol for an exact list of species which can be provided by the institute in charge of the given sampling.

"None" None. There are no SL records (criteria to be checked).

Species list record (SL) in commercial fisheries sampling data (CS)

Orde r	Name	Туре	Req.	Basic checks	Comments
1	Record type	String	М		Fixed value SL.
2	Sampling type	String	М	Code list	"S" = sea sampling, "M" = market sampling of known fishing trips, "D" = market sampling of mixed trips, "V" = vendor.
3	Landing country	String	М	Code list	ISO 3166 – 1 alpha-3 codes.
4	Vessel flag country	String	М	Code list	ISO 3166 – 1 alpha-3 codes. The flag country of the vessel. This can be different from the landing country (see description of LandingCountry).
5	Year	Integer	М	1 900 - 3 000	
6	Project	String	М	Code list	National project name. Code list is editable.
7	Trip code	String	М	String 50	National coding system.
8	Station number	Integer	М	1 - 999	Sequential numbering by trip.
9	Species	Integer	Μ	Code list	The AphialD, which is a 6 digit code, is used for the species in the species field. The AphialDs are maintained by WoRMS. Only species AphialDs with status "Accepted" or "Alternate Representation" is allowed.
10	Catch category	String	М	Code list	The fate of the catch: "LAN" = Landing, "BMS" = Below Minimum Size landing, "DIS" = Discard or "REGDIS" = Logbook Registered Discard.
11	Landing category	String	Μ	Code list	The intended usage at the time of landing. This should match the same field in CL record (whether or not the fish was actually used for this or another purpose): "IND" = industry or "HUC" = human consumption or "BMS" = Below Minimum Size landing. The "BMS" is added added to Landing category to be able to indicate the BMS landing in the CL record.
12	Commercial size category scale	String	0	Code list	Commercial sorting scale code (optional for "Unsorted").
13	Commercial size category	Integer	0	Code list	Commercial sorting category in the given scale (optional for "Unsorted"). (EC, 2006) and later amendments when scale is "EU".
14	Subsampling category	String	0	Code list	Used when different fractions of the same species are subsampled at different levels. Typically used when few large specimens are taken out from the total catch before the many small fish are subsampled.
15	Sex	String	0	Code list	M = Male, F = Female, T = Transitional2 (optional for "Unsexed").
16	Weight	Integer	М	1 - 9 999 999 999	Whole weight in grams. Decimals not allowed. Weight of the corresponding stratum (Species – Catch category – size category – Sex).
17	Subsample weight	Integer	M/O	1 - 9 999 999 999	Whole weight in grams. Decimals not allowed. For sea sampling: the live weight of the subsample of the corresponding stratum. For market sampling: the sample weight is the whole weight of the fish measured (e.g. the summed weight of the fish in one or more boxes). Mandatory if HL records are provided

Orde r	Name	Туре	Req.	Basic checks	Comments
18	Length code	String	м/о	Code list	Class: 1 mm = "mm", 0.5 cm = "scm"; 1 cm = "cm"; 2.5 cm = 25 mm", 5 cm = "5 cm". Mandatory if HL records are provided

Length record (HL) in commercial fisheries sampling data (CS)

Order	Field name	Туре	Req.	Basic checks	Comments
1	Record type	String	М		Fixed value HL.
2	Sampling type	String	М	Code list	"S" = sea sampling, "M" = market sampling of known fishing trips, "D" = market sampling of mixed trips, "V" = vendor.
3	Landing country	String	М	Code list	ISO 3166 – 1 alpha-3 codes.
4	Vessel flag country	String	М	Code list	ISO 3166 – 1 alpha-3 codes. The flag country of the vessel. This may be different from the landing country (see description of LandingCountry).
5	Year	Integer	М	1 900 - 3 000	
6	Project	String	М	Code list	National project name. Code list is editable.
7	Trip code	String	М	String 50	National coding system.
8	Station number	Integer	М	1 - 999	Sequential numbering by trip.
9	Species	Integer	Μ	Code list	The AphialD, which is a 6 digit code, is used for the species in the species field. The AphialDs are maintained by WoRMS. Only species AphialDs with status "Accepted" or "Alternate Representation" is allowed.
10	Catch category	String	М	Code list	The fate of the catch: "LAN" = Landing, "BMS" = Below Minimum Size landing, "DIS" = Discard or "REGDIS" = Logbook Registered Discard.
11	Landing category	String	Μ	Code list	The intended usage at the time of landing. This should match the same field in CL record (whether or not the fish was actually used for this or another purpose): "IND" = industry or "HUC" = human consumption or "BMS" = Below Minimum Size landing. The "BMS" is added added to Landing category to be able to indicate the BMS landing in the CL record.
12	Commercial size category scale	String	0	Code list	Commercial sorting scale code (optional for "Unsorted").
13	Commercial size category	Integer	0	Code list	Commercial sorting category in the given scale (optional for "Unsorted"). See (EC, 2006) and later amendments when scale is "EU".
14	Subsampling category	Integer	0	Code list	Used when different fractions of the same species are subsampled at different levels. Typically used when few large specimens are removed from the total catch before the many small fish are subsampled.
15	Sex	String	01	Code list	M = Male, = , F = Female, T = Transitional = (optional for "Unsexed"). HL.Sex should always match SL.Sex
16	Individual sex	String	М	Code list (sex)	If M = Male, = , F = Female, T = Transitional = (optional for "Unsexed"). Only different from "Sex" if individual length distribution is obtained on HL-level (and not on SL-level).
17	Length class	Integer	М	1-3 999	In mm. Identifier: lower bound of size class, e.g. 650 for 65 – 66 cm.
18	Number at length (not raised to whole catch)	Integer	Μ	1-999	Length classes with zero should be excluded from the record.

Sex-Maturity-Age-Weight-Length record (CA) in commercial fisheries sampling data (CS)

CA record represents only one fish.

All CA records (except sampling type = "V" (Vendor) should match at least one HH record on the Station no. If that is not possible the the CA should match the HH record on VesselFlagCountry, LandingCountry, Year, Quarter, Month, Area, and StatisticalRectangle.

Order	Field name	Туре	Req.	Basic checks	Comments
1	Record type	String	М		Fixed value CA.
2	Sampling type	String	М	Code list	"S" = sea sampling, "M" = market sampling of known fishing trips, "D" = market sampling of mixed trips, "V" = vendor.
3	Landing country	String	М	Code list	ISO 3166 – 1 alpha-3 codes.
4	Vessel flag country	String	М	Code list	ISO 3166 – 1 alpha-3 codes. The flag country of the vessel. This may be different from the landing country (see description of LandingCountry).
5	Year	Integer	М	Code list	1 900-3 000.
6	Project	String	М	Code list	National project name. Code list is editable.
7	Trip code	String	М	String 50	National coding system.
8	Station number	Integer	0	1-999	Sequential numbering by trip.
9	Quarter	Integer	М	Code list	1-4.
10	Month	Integer	0	Code list	1-12.
11	Species	Integer	Μ	Code list	The AphialD, which is a 6 digit code, is used for the species in the species field. The AphialDs are maintained by WoRMS. Only species AphialDs with status "Accepted" or "Alternate Representation" is allowed.
12	Sex	String	0	Code list	M= Male = , F = Female, T = Transitional = (optional for "Unsexed").
13	Catch category	String	М	Code list	The fate of the catch: "LAN" = Landing, "BMS" = Below Minimum Size landing, "DIS" = Discard or "REGDIS" = Logbook Registered Discard.
14	Landing category	String	М	Code list	The intended usage at the time of landing. This should match the same field in CL record (whether or not the fish was actually used for this or another purpose): "IND" = industry or "HUC" = human consumption or "BMS" = Below Minimum Size landing. The "BMS" is added added to Landing category to be able to indicate the BMS landing in the CL record.
15	Commercial size category scale	String	0	Code list	Commercial sorting scale code (optional for "Unsorted").
16	Commercial size category	Integer	0	Code list	Commercial sorting category in the given scale. (optional for "Unsorted").
17	Stock	String	0	Code list	Only applicable for herring (Clupea harengus), salmon (Salmo salar), common whitefish (Coregonus lavaretus) and redfish (Sebates mentella and S. viviparus).

Order	Field name	Туре	Req.	Basic checks	Comments
18	Area	String	Μ	Code list	ICES divisions or subdivisions prefixed with the FAO area, like 27.4.c. For the Baltic Sea, Mediterranean, and Black Seas it should be subdivisions. In the Data Collection Regulation (EC, 2008a, 2008b) it is described as level 3= ICES divisions and level 4 =ICES subdivisions.
19	Statistical rectangle	String	M/O	Code list	Mandatory for sampling type = "S". Area level 5 in the Data Collection Regulation (EC, 2008a, 2008b). This is the ICES statistical rectangles (e.g. 41G9). Use '99x9' outside FAO 27 and FAO 37/Northeast Atlantic and Mediterranean.
20	Subpolygon	String	0	Code list	National level as defined by each country as child nodes (substratification) of the ICES rectangles. It is recommended that this is coordinated internationally, e.g. through the Regional Coordination Meetings (EC RCMs).
21	Length class	Integer	М	1-3 999	In mm. Identifier: lower bound of size class, e.g. 650 for 65 –66 cm.
22	Age	Integer	0	0-99	Estimated age.
23	Single fish number (id)	Integer	Μ	1-999 999 999	National numbering system of the individual fish. Preferably unique within the given Station and Species, but necessarily unique for the given combination of key fields above.
24	Length code	Integer	М	Code list	Class: 1 mm = "mm", 0.5 cm = "scm"; 1 cm = "cm"; 2.5 cm = "25 mm", 5 cm = "5 cm".
25	Aging method	String	M/O	Code list	Mandatory if a value is given in "Age". Methodology for estimating the age.
26	Age-plus-group	String	М	Code list	+ = Plus group, - = Not plus group. The use of a plus-group should be avoided when possible. When the reading is equal to or more than the specified age.
27	Otolith weight	Dec(5)	0	0.000 00– 99.999 99	In grammes.
28	Otolith side	String	0	Code list	The side of the fish where the otolith was taken. R = right, L = left.
29	Weight	Dec(1)	0	1.0-99 999.9	In grammes.
30	Maturity staging method	String	0	Code list	Methodology for estimating the maturity stage.
31	Maturity scale	String	0	Code list	The maturity scale gives the range of the possible stages (values).
32	Maturity stage	String	0	Code list	The stage (value) in the given scale.

Commercial fisheries landings statistics record (CL)

Order	Name	Туре	Req.	Basic checks	Comments
1	Record type	String	М		Fixed value CL.
2	Landing country	String	м	Code list	ISO 3166 – 1 alpha-3 codes. In the special case where a vessel lands the catch in country A, but the catch is transported directly to country B, it should be registered as if it had been landed in country B.
3	Vessel flag country	String	М	Code list	ISO 3166 – 1 alpha-3 codes. The flag country of the vessel. This may be different from the landing country (see description of LandingCountry).
4	Year	Integer	М	Code list	1 900-3 000.
5	Quarter	Integer	М	Code list	1-4.
6	Month	Integer	0	Code list	1-12.
7	Area	String	Μ	Code list	ICES divisions or subdivisions prefixed with the FAO area, like 27.4.c. For the Baltic Sea, Mediterranean, and Black Seas it should be subdivisions. In the Data Collection Regulation (EC, 2008a, 2008b) it is described as level 3= ICES divisions and level 4 = ICES subdivisions.
8	Statistical rectangle	String	0	Code list	Area level 5 in the Data Collection Regulation (EC, 2008a, 2008b). This is the ICES statistical rectangles (e.g. 41G9). Use '99x9' outside FAO 27 and FAO 37/Northeast Atlantic and Mediterranean.
9	Subpolygon	String	0	Code list	National level as defined by each country as child nodes (substratification) of the ICES rectangles. It is recommended that this is coordinated internationally, e.g. through the Regional Coordination Meetings (EC RCMs).
10	Species	Integer	М	Code list	The AphiaID, which is a 6 digit code, is used for the species in the species field. The AphiaIDs are maintained by WoRMS. Only species AphiaIDs with status "Accepted" or "Alternate Representation" is allowed.
11	Landing category	String	Μ	Code list	The intended usage at the time of landing. This should match the comparable field in the LS record (whether or not the fish was actually used for this or another purpose). Codes: "IND" = industry or "HUC" = human consumption or "BMS" = Below Minimum Size landing. The "BMS" is added added to Landing category to be able to indicate the BMS landing in the CL record.
12	Commercial size category scale	String	0	Code list	Commercial sorting scale code (optional for "Unsorted").
13	Commercial size category	Integer	0	Code list	Commercial sorting category in the given scale (optional for "Unsorted"). See (EC, 2006) and later amendments when scale is "EU".
14	Fishing activity category National	String	0	Code list	Fishing activity category (= métier) – National level as defined by each country as child nodes (substratification) of the level-5 codes.
15	Fishing activity category European Ivl 5	String	0	Code list	Should not be filled in when Fishing activity category European level 6 is filled. Fishing activity category (= métier) – Level 5 as defined in a hierarchical structure in the Data Collection Regulation (EC 2008a, 2008b).

Commercial Landings (CL)

		-/	1	1	
16	Fishing activity category European IvI 6	String	М	Code list	Fishing activity category (= métier) – Level 6 as defined in a hierarchical structure in the Data Collection Regulation (EC, 2008a, 2008b). Level 6 is further specified by the Regional Coordination Meetings (EC RCMs, Council Regulation [EC] No. 1543/2000).
17	Harbour	String	0	Code list	Landing harbour. Using harbour LOCODE codes (5 alpha- numeric) from the European Master Data Register Code- Location.xls
18	Vessel length category	String	М	Code list	Grouping of vessels into fleet segments according to the vessel length categories defined in the Data Collection Regulation (EC, 2008a, 2008b).
19	Unallocated catch weight	Integer	М	-2 000 000 000-2 000 000 000	Whole weight in kg.
20	Area misreported catch weight	Integer	М	-2 000 000 000 - 2 000 000 000	Whole weight in kg.
21	Official landings weight	Integer	М	0-2 000 000 000 (i.e. 2 million t)	Whole weight in kg. Weight can be entered as fresh weight or as estimated weight based on a statement of the number of fish boxes sold to the first buyer.
22	Landings multiplier	Dec(3)	0	0.500-2.000	Multiplier to correct official landings for, e.g., overweight in fish boxes. A overweigth of 5 % more would give a value of 1.05
23	Official landings value	Integer	0	1-100 000 000	In € 5. Official sales value of the landings.

Commercial fisheries effort statistics record (CE)

Order	Name	Туре	Req.	Basic checks	Comments
1	Record type	String	М		Fixed value CE.
2	Vessel flag country	String	М	Code list	ISO 31661–alpha-3 codes. The flag country of the vessel.
3	Year	Integer	М	Code list	1900-3000.
4	Quarter	Integer	М	Code list	1-4.
5	Month	Integer	0	Code list	1-12.
6	Area	String	Μ	Code list	ICES divisions or subdivisions prefixed with the FAO area, like 27.4.c. For the Baltic Sea, Mediterranean, and Black Seas it should be subdivisions. In the Data Collection Regulation (EC, 2008a, 2008b) it is described as level 3= ICES divisions and level 4 =ICES subdivisions.
7	Statistical rectangle	String	0	Code list	Area level 5 in the Data Collection Regulation (EC, 2008a, 2008b). This is the ICES statistical rectangles (e.g. 41G9). Use '99x9' outside FAO 27 and FAO 37/Northeast Atlantic and Mediterranean.
8	Subpolygon	String	0	Code list	National level as defined by each country as child nodes (substratification) of the ICES rectangles. It is recommended that this is coordinated internationally, e.g. through the Regional Coordination Meetings (EC RCMs).
9	Fishing activity category National	String	0	Code list	Fishing activity category (=métier)–National level as defined by each country as child nodes (substratification) of the level-5 codes.
10	Fishing activity category European Ivl 5	String	0	Code list	Should not be filled in when Fishing activity category European level 6 is filled. Fishing activity category (=métier)–Level 5 as defined in a hierarchical structure in the Data Collection Regulation (EC, 2008a, 2008b).
11	Fishing activity category European Ivl 6	String	м	Code list	Fishing activity category (= métier) – Level 6 as defined in a hierarchical structure in the Data Collection Regulation (EC, 2008a, 2008b). Level 6 is further specified by the Regional Coordination Meetings (EC RCMs, Council Regulation [EC] No. 1543/2000).
12	Harbour	String	0	Code list	Landing harbour. Landing harbour. Using harbour LOCODE codes (5 alpha-numeric) from the European Master Data Register Code- Location.xls
13	Vessel length category	String	М	Code list	Grouping of vessels into fleet segments according to the vessel length categories defined in the Data Collection Regulation (EC, 2008a, 2008b).
14	Number of trips	Integer	М	1-50 000	If a trip covers more than one rectangle/SubPolygon, the rectangle with the most fishing is used. A trip is defined as the period between when a vessel departs from a port (or factory ship) and arrives at a port (or factory ship) for discharge of the catch
15	Number of sets/hauls	Integer	0	1-250 000	
16	Fishing time/soaking time	Integer	0	1-1 200 000	In hours.
17	kW-days	Integer	0	1-2 500 000	In kW days.
18	GT-days	Integer	0	1-2 000 000	In GT (Gross Tonnage) days.

Commercial Effort (CE)

Order	Name	Туре	Req.	Basic checks	Comments
19	Days at sea	Integer	0	1-25 000	In days. A day at sea shall be measured as any continuous period of 24 hours (or part thereof) when a vessel is absent from port.

Change log

Date	Ver-	Respon-	Page	Change description
	sion	sible	ref.	
02.07.2015	1.0	HKN	All	The Regional DataBase Exchange Format is using and building on the exchange format described in the ICES Cooperative Research Report No. 296, "Definition of Standard Data- Exchange Format for Sampling, Landings, and Effort Data from Commercial Fisheries".
14.06.2016	1.1	HKN	11, 13, 14, 16, 3,9, 18	Species field changed from string to integer and the use of AphiaIDs is implemented. Catch category added codes: "BMS" BMS landing and "REGDIS" Logbook Registered Discard. Landing category added code: "BMS" BMS landing. Missing code section added. Statistical rectangle '99x9' text added.
20.06.2017	1.2	HKN	9, 15, 16, 18	The area field in all record types, where area is used, is updated to be prefixed with the FAO area and to use the area level separation dot more consistently.
14.08.2018	1.3	HKN	3	Description of how to download code lists/tables from the RDB.