#

# Revised OSPAR Reporting Format for Dumping at Sea and revised supplementary Explanatory Notes

Explanatory notes - 2018 Reporting Format for the dumping and placement[[1]](#footnote-1) of wastes and other matter at sea

(Agreement 2018-02)[[2]](#footnote-2)

General

1. The format for Annual Reporting for the dumping and placement of wastes and other matter at sea requires information on the categories recognised by the OSPAR Convention, 1992 (Annex II, Article 3 § 2.a‑e).

Contracting Parties should report their data for each calendar year, in accordance with the format to the Secretariat via email (secretariat@ospar.org), by **1 October** following the year to which the deposit data relates. The Secretariat provides Contracting Parties with the relevant annual file template, which will be uploaded to the Human Activities section of the OSPAR website.

The format for Annual Reporting consists of these explanatory notes and an excel file:

Explanatory Notes– the formatcontains information on deposit operations and data of amounts of material deposited which change annually and for which a tabular reporting format is appropriate.

* + - * Table 1: Contaminated material
			* Table 1a: Deposit site coordinates
			* Table 1b : Dredging site coordinates
			* Table 2: Details of activity
			* Table 3: Contaminant load
			* Table 4: LoD\_LoQ
			* Table 5: Quality assurance
			* Table 6: Method of analysis
			* Table 7: Action levels
			* Table 8: Conversion factors
			* Table 9: Additional Information

EIHA 2018 approved this revised reporting format for use from 2018 onwards.

2. National data should be entered in the respective sheets of the accompanying spreadsheet by following the instructions given below.

3. (a) Material originating from different locations but dumped or place of at the same deposit site should be described in separate lines in tables 2 and 3.

 (b) Material originating from the same dredging operation but dumped or placed in more than one site should be reported in tables 2 and 3 using separate lines for each site used.

4. Please do not alter the format of the spreadsheet (e.g. by insertion of new columns or rows), but inform the Secretariat of any problems you may encounter.

5. Please indicate clearly the reference for all additional information in Sheet 9 (additional data).

1. Each site must have a unique OSPAR code (which must not change from year to year). Each site must have a central coordinate.

7. The location of dredging and deposit sites for each Contracting Party should be supplied as coordinates in decimal degrees, WGS84. And also in ArcGIS Shapefiles (using coordinate reference system WGS84) with the attribute table clearly showing the reporting country and corresponding site code and ID (as used in the data tables).

Guidance for reporting

The data should be entered by using the continental decimal (with a space as 1000 separator and a comma as decimal separator) with the maximum number of digits available (i.e. with maximum number of digits after the comma) and taking into account the unit given in the column header. This will ensure correct calculations for preparing total amounts. The pre-defined number format in all data cells ensures that the values will be displayed and printed.

Missing information should be explained in the “Notes” column for the following:

NI no information

ND not determined

EX exempted from analyses according to the OSPAR Guidelines for the Management of Dredged Material (Reference: Agreement 2014-06)

Instructions for reporting data per sheet:

**1. Contaminated material**

|  |  |
| --- | --- |
| Year | Year of dumping or placement activity |
| Contracting Party | Name of applicable Contracting Party |
| ID | Code generated by CP reflecting number of different operations at particular deposit site (if data available) e.g. a = 1st operation, b = 2nd operation, of a = all material from location x, b = all material from location y, c = all material from location z , etcThe same ID code must be included both throughout reporting in order to identify analytical results corresponding to each operation (and associated material location and amount). |
| Deposit site code | National codeNote: code for a location must remain the same from year to year |
| Contaminant | Chemical symbol or compound acronym. In order to streamline the reporting, the chemical symbol or compound acronym should be the same as those in table 3. Reference is also made to the naming guidance, included in this guidance. New and emerging contaminants will be added to the guidance when necessary. Select from: As, Cd, Cr, Cu, Hg, Ni, Pb, Zn, Oil, HCB, DBT, TBT, a-HCH, g-HCH, CB101, CB118, CB138, CB153, CB180, CB28, CB52, ƩPCB7, pp'-DDD, pp'-DDE, pp'-DDT, ƩDDX , acenaphthene, acenaphthylene, anthracene, benzo[a]anthracene, benzo[b]fluoranthene, benzo[a]pyrene, benzo[ghi]perylene, chrysene, dibenz(ah)anthracene, fluoranthene, fluorene, indeno(123‐cd)pyrene, naphthalene, phenanthrene, pyrene, ΣPAH9 , ƩPAH16, other (please specify) |
| Average concentration in the dredged material (mg/kg or µg/kg dry wt)  | Average contaminant concentration in the dredged material  |
| National criteria/upper level (mg/kg or µg/kg dry wt) | The national upper level of contamination (this must match the information in sheet 7) |
| Granulometric fraction of reference for the average concentration (column F) and upper level (column G) | Select from:<63 µm/<20 µm fraction<2 mm fraction |
| Amount of dredged material disposed (tonnes dry wt) | Amount of dredged material disposed |
| Reasons for allowing disposal | Describe reasoning behind granting of approval |
| Notes | Any additional information or notes relating to missing data |

**1a. Deposit site coordinates**

|  |  |
| --- | --- |
| Year | Year of dumping or placement activity |
| Contracting Party | Name of applicable Contracting Party  |
| ID | Code generated by CP reflecting number of different operations at particular deposit site (if data available) e.g. a = 1st operation, b = 2nd operation. , of a = all material from location x, b = all material from location y, c = all material from location z , etcThe same ID code must be included both throughout reporting in order to identify analytical results corresponding to each operation (and associated material location and amount). |
| Deposit site code | National codeNote: code for a location must remain the same from year to year |
| Shapefile submitted? | Is a Shapefile being submitted along with reporting? Yes/No.  |
| Latitude | Deposit site latitude, WGS84, decimal degrees Only necessary when no shapefile is submitted.. |
| Longitude | Deposit site longitude, WGS84, decimal degrees. Only necessary when no shapefile is submitted. |
| Notes | Additional information |

**1b. Dredging site coordinate**

|  |  |
| --- | --- |
| Year | Year of dumping or placement activity |
| Contracting Party | Name of applicable Contracting Party |
| Dredging site code | National site codeNote: code for a location must remain the same from year to year |
| Shapefile submitted | Is a Shapefile being submitted along with reporting? Yes/No. |
| Latitude | Latitude, WGS84, decimal degrees. Only necessary when no shapefile is submitted. |
| Longitude | Longitude, WGS84, decimal degrees. Only necessary when no shapefile is submitted. |
| National site name | Nationally recognised dredging site name |

**2. Details of activity**

|  |  |
| --- | --- |
| Year | Year of dumping or placement activity |
| Contracting Party | Name of applicable Contracting Party  |
| ID | Code generated by CP reflecting number of different operations at particular deposit site (if data available) e.g. a = 1st operation, b = 2nd operation. , of a = all material from location x, b = all material from location y, c = all material from location z, etcThe same ID code must be included both in tables 3 and 4 in order to identify analytical results corresponding to each operation (and associated material amount) |
| Deposit site code | National code, corresponding dredging site code from Table 1a.Note: code for a location must remain the same from year to year |
| Description of material e.g. silt / sand / gravel | Describe in general terms, the granulometry of the sediment - % gravel, sand and silt  |
| Material type | Select from: Dredged Material, Fish Waste, Inert Material, Other |
| Dredging site code | National code, corresponding dredging site code from Table 1b. |
| Dredging Activity | Select from dropdown: Capital, Maintenance, Environmental |
| Total amount of material dumped (tonnes dry wt) | Amount of material dumped of at sea |
| Amount of dredged material placed (tonnes dry wt) | Amount of material not disposed but used for beneficial use |
| Placement (Beneficial use) | Select from: Beach nourishment; Sediment recharge; Land reclamation; Construction; Coastal protection (other than beach nourishment); Habitat generation/improvement; Sustainable Relocation; Other (please specify in “notes”) |
| Amount of material exempted from characterisation (tonnes dry wt) | Quantity of material, in tonnes-dry weight, exempted from characterisation |
| Amount of material in CAD (tonnes dry wt) | Quantity of material, in tonnes-dry weight, that is deposited in the bottom with or without cells and covered with a layer of clean material. This technique is known as “capping” or confined/contained aquatical disposal only sites that are located in or in direct contact with OSPAR waters should be reported. Amounts stored in CAD will be included separately in the calculation of the total loads and average concentrations.  |
| Amount of material in CDF (tonnes dry wt) | Quantity of material, in tonnes-dry weight, which is confined in CDF. Only sites that are located in or in direct contact with OSPAR waters should be reported. Amounts stored in CDF will be included separately in the calculation of the total loads and average concentrations. |
| Notes  | To include additional information reference to monitoring reports (in any language, with link if available) and notes relating to missing data |

**3. Contaminant load**

|  |  |
| --- | --- |
| Year | Year of dumping or placement activity |
| Contracting Party | Name of applicable Contracting Party |
| ID | Code generated by CP reflecting number of different operations at particular deposit site (if data available) e.g. a = 1st operation, b = 2nd operation.The same ID code must be included both in tables 3 and 4 in order identify analytical results corresponding to each operation (and associated material amount) |
| Deposit site code | National codeNote: code for a location must remain the same from year to year |
| Cd (tonnes dry wt) | Tonnes of cadmium deposited (dry weight) |
| Hg (tonnes dry wt) | Tonnes of mercury deposited (dry weight) |
| As (tonnes dry wt) | Tonnes of arsenic deposited (dry weight) |
| Cr (tonnes dry wt) | Tonnes of chromium deposited (dry weight) |
| Cu (tonnes dry wt) | Tonnes of copper deposited (dry weight) |
| Pb (tonnes dry wt) | Tonnes of lead deposited (dry weight) |
| Ni (tonnes dry wt) | Tonnes of nickel deposited (dry weight) |
| Zn (tonnes dry wt) | Tonnes of zinc deposited (dry weight) |
| Oil (tonnes dry wt)  | Tonnes of oil deposited (dry weight) (see glossary below) |
| ΣPAH9 (tonnes dry wt) | Tonnes of nine selected polycyclic aromatic hydrocarbons deposited (dry weight) (see glossary below) |
| ΣPAH16 (tonnes dry wt) | Tonnes of USEPA 16 selected polycyclic aromatic hydrocarbons deposited, (dry weight) if data available (see glossary below) |
| ΣPCB7 (kg dry wt) | Tonnes of ICES7 selected polychlorinated biphenyls deposited (dry weight) |
| HCB (kg dry wt) | Kilograms of Hexachlorobenzene deposited (dry weight) |
| g-HCH (kg dry wt) | Kilograms of ɣ-Hexachlorocyclohexane (Lindane) deposited (dry weight) |
| p,p' DDT (kg dry wt) | Kilograms of p,p’ DDT deposited (dry weight) |
| p,p' DDD (kg dry wt) | Kilograms of p,p’ DDD deposited (dry weight) |
| p,p' DDE (kg dry wt) | Kilograms of p,p’ DDE deposited (dry weight) |
| Σ DDX (kg dry wt) | Sum of p,p' DDT, p,p' DDD and p,p' DDE deposited (dry weight)  |
| TBT (kg dry wt) | Kilograms of tributyl tin (cation) deposited (dry weight) |
| DBT (kg dry wt) | Kilograms of dibutyl tin (cation) deposited (dry weight) |
| Notes | Any additional relevant information  |

Calculation of contaminant load for analytical results (individual concentrations or average concentration) below LoD/LoQ , should use the value of 0.5 x LoD or LoQ.

**4. LoD\_LoQ (see also sheet 8)**

Information on LoD / LoQ is required only in the event that data are reported as <detection limit, and detection limit is considered higher than desired. In case of multiple values per substance, the mean should be reported.

|  |  |
| --- | --- |
| Year | Year of dumping or placement activity |
| Contracting Party | Name of applicable Contracting Party |
| ID | Code generated by CP reflecting number of different operations at particular deposit site (if data available) e.g. a = 1st operation, b = 2nd operation.The same ID code must be included both in tables 3 and 4 in order identify analytical results corresponding to each operation (and associated material amount) |
| Deposit site code | National code Note: code for a location must remain the same from year to year |
| LoD/LoQ | Select from: LoD; LoQ |
| Amount of material LoD/LoQ applies to | Quantity of dredged material in deposit operation where concentration has been reported as <LoD or LoQ |
| All remaining columns | Insert LoD / LoQ. Note units given |

**5. Quality assurance**

To be completed for each laboratory undertaking analyses. QA information will need to be completed only once, and then only revised when changes have occurred from previous year.

**6. Method of analysis**

Methods of analyses will need to be completed only once, and then only revised when changes have occurred from previous year.

**7. Action levels**

Action levels should be provided when initially completing new reporting format. Action levels do not need to be reported again unless they are revised.

|  |  |
| --- | --- |
| Upper Action Level | Upper Action Levels represent a threshold above which there is likely to be concern due to increased potential for effects on human health and the marine environment. |
| Lower Action Level | Lower action levels represent thresholds below which there is little potential for adverse impacts on the marine environment from contaminants. |
| Grain size fraction on which action level is based? | Select from: <2mm, <63μm, <20μm, or <2μm |

**8. Conversion factors (and use of LoD/LoQ)**

Contains sample calculations for wet weight to dry weight.

Also contains conversion factors from volume to weight which can be used in the event that density has not been measured.

* LoD/LoQ is excluded from calculations for average concentrations if there are other values in the sample set that can be used.
* For locations where no value above detection limit has been recorded, then half of LoD used to calculate loads of contaminants, taking into account point 3 (below).
* If LoD/LoQ is considered very high, 95%ile value for background sediment was applied, for samples in remote areas.
* If LoD/LoQ is appropriately low, then no amount is reported for samples in remote areas.

**Glossary:**

Glossary and Acronym

|  |  |
| --- | --- |
| Action levels  | Guidance values used to trigger action |
| Beneficial use - beach nourishment | the replacement of lost sediment in order to "stop, or reduce, the general retreat of the coastal profile" |
| Beneficial use- Habitat restoration and development | Use of dredged materials to improve environmental conditions in a wide range of habitats  |
| Beneficial use- shoreline stabilisation and protection  | e.g. Placement on banks of waterways; Artificial beaches; Submarine dike construction; Formation of offshore berms; Mud flat nourishment; marsh recharge (can also be habitat generation)  |
| Beneficial use- Land reclamation; | Land reclamation, usually known as reclamation, and also known as land fill (not to be confused with a landfill), is the process of creating new land from ocean, riverbeds, or lake beds. The land reclaimed is known as reclamation ground or land fill |
|  |  |
| Beneficial use- Sustainable Relocation | Sustainable Relocation : Sustainable relocation is the introduction of dredged material into aquatic systems to maintain and/or supplement sediment supply, in order to sustain the natural processes within the system |
| Beneficial use-construction | Construction of water related infrastructure, that is not coastal protection or land reclamation , e.g. port infrastructure and, in particular, the use of DM as filling material for port infrastructures |
| CAD | Iolation of the contaminated dredged material by disposal of the contaminated dredged material at a specific aquatic site and capping. The disposal can be in natural depressions in the seafloor, in borrow pits in the seafloor from mining operations (e.g., beach nourishment), or in specifically designed and constructed cells to contain the contaminated dredged material. Confined aquatic disposal can also be accomplished via disposal of the contaminated dredged material on the seafloor, creating a mound, and capping it with clean material, which is called Level Bottom Capping[[3]](#footnote-3) (from: )-.  |
| CDF | A nearshore confined disposal facility (CDF) is a constructed in-water disposal site with containment structures or constructed dikes in the water, taking advantage of the shoreline as a dike.. An island CDF is a containment facility for dredged material in open water and is the same as a nearshore CDF except the island does not use the shoreline as a containment dike1. ( |
| Capital dredging | Capital dredging includes geological material dredged from previously unexposed layers beneath the seabed and surface material from areas not recently dredged. |
| Clay | Sedimentary mineral particles 0.2 to 2.0 µm in size, usually with a negative charge (anion); the size and charge have profound implications for sediment chemistry and other physical interactions. |
| Contaminated dredged material  | Dredged material not meeting national assessment criteria for dumping or placement at sea (e.g. exceeding upper action levels). |
| Dredged material | Material arising from dredging operations. |
| Fish waste | Fish waste from industrial fish processing operations; |
| Gravel | Unconsolidated rock fragment > 2mm to < 63mm |
| Harbour  | Harbours include enclosed and semi-enclosed docks, docks entrances, marinas, wharves and unloading jetties |
| Inert material of natural origin | Inert material of natural origin that is solid, chemically unprocessed geological material, the chemical constituents of which are unlikely to be released into the marine environment. The type of inert material including the reason for its classification as inert should be indicated. |
| Maintenance dredging  | Maintenance dredging is the dredging required to maintain berths and navigation channels at advertised depth. It includes material dredged from recently deposited by sedimentation processes in harbour or sea areas |
| Oil  | Total petroleum hydrocarbons (total oil and grease) |
| ΣPCB7 | Sum of the concentration of CB28; CB52; CB101; CB118; CB138; CB153; and CB180 |
| ΣPAH16  | Sum of the concentration of acenaphthene, acenaphthylene, anthracene, benzo[a]anthracene, benzo[b]fluoranthene, benzo[k]flouranthene, benzo[a]pyrene, benzo[ghi]perylene, chrysene, dibenz(ah)anthracene, fluoranthene, fluorene, indeno(1,2,3-cd)pyrene, naphthalene, phenanthrene and pyrene, |
| ΣPAH9 | Sum of the concentration of anthracene; benzo[a]anthracene; benzo[ghi]perylene; benzo[a]pyrene; chrysene; fluoranthene; indeno[1,2,3-cd]pyrene; pyrene; phenanthrene |
| Sand | Mineral particles > 63 µm and < 2 mm in size. |
| Sea areas  | Areas outside harbours i.e. in open, coastal and offshore sea areas |
| Sediment | Naturally occurring material that is produced through the processes of weathering and erosion of rocks, and is subsequently transported by the action of fluids such as wind, water, or ice, and/or by the force of gravity acting on the particle itself. |
| Silt | Mineral particles between 2.0 µm and 63 µm in size;  |

1. Placement relates only to dredged material [↑](#footnote-ref-1)
2. This Agreement replaces Agreement 2016-08 [↑](#footnote-ref-2)
3. Definition from International Review of Practices and Policies for Disposal in Ocean and Coastal/Estuarine Waters of Contaminated Dredged Material, (Craig Vogt, 2009) [↑](#footnote-ref-3)