Metadata for ‘MPA\_MetaAnalysis\_StudyData\_forPub.xlsx’

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## Data sheets

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| **Raw data** | Where all the data are entered for refs that have passed the criteria above. See ‘Raw Data’ table headers for more info. |
| **Irrelevant Refs** | List of references that have failed one or more of the criteria for inclusion. |

## ‘Raw Data’ table headers

\*Green = automatically filled, Yellow = manually input data

|  |  |  |
| --- | --- | --- |
| ***Table Header*** | ***Explanation*** | ***Data Type/values*** |
| **ID** | Unique entry (row) ID | Automatic |
| **Country** | Should be self-explanatory | Text |
| **Reserve** | Name of the no-take area to which the ‘inside’ data refers. Use a new line if there is data from multiple reserves | Text  If no name specified use the MPA\_network name |
| **MPA\_network** | Name of the MPA network where the data was collected. | Text  If not applicable use NA |
| **Reserve\_habitat** | The broad habitat type that the reserve covers | Text  e.g. estuarine, deep water, offshore, nearshore |
| **Substrate** | Main substrate category that the sampling occurred on (if they specifically sampled bot hard and soft, then use mixed) | Options: Hard, Soft, Unknown |
| **Depth** | Approximate average depth sampled | Options: Shallow (<30m), Deep (>30m) |
| **Ocean** | The ocean basin the MPA occurs in | Options: North Atlantic, South Atlantic, North Pacific, South Pacific, Indian, Arctic, Southern, Mediterranean |
| **Temp\_Trop** | Whether the MPA is primarily in a temperate or tropical region | 2 options: temperate, tropical |
| **Reserve\_size\_km2** | Use the size of the no-take area(s) (reserve), NOT the total size of the park, as reported in the paper. If no-take areas are aggregated, use the total size of the no-take areas.  If there is no reserve size, make a note. Websites to look up: <http://www.mpatlas.org/> <https://www.protectedplanet.net/marine> | Numeric  NA if the data is aggregated over multiple networks/areas (i.e., not part of a cohesive MPA network that has an estimate area) |
| **Organism\_name** | ***Whole scientific name*** at the lowest taxonomic unit possible. If there is ambiguity on species name, then use genus | Text  Could be species, genus, family, name etc.  If unclear, leave blank. |
| **Common\_name** | The common name (or group name) | Text. Please check if it already exists in the table and copy. This is where groupings (e.g. fish >30cm, demersal species) go |
| **Taxnomic\_unit** | The taxonomic unit used | Text  E.g. ‘species’, ‘genus’, ‘family’, ‘functional group’, etc. |
| **Var\_recorded** | The variable being measured/recorded | 4 options: density, biomassden, biomass, size, richness, cover |
| **Var\_measurment** | The measurement used in the study (e.g. FL vs TL for fish size) | Text. Leave blank if NA or unknown |
| **BO** | Before-Outside value | Numeric. Leave blank if NA |
| **BI** | Before-Inside value | Numeric. Leave blank if NA |
| **AO** | After-Outside value | Numeric. Leave blank if NA |
| **AI** | After-Inside value | Numeric. Leave blank if NA |
| **Response\_ratio** | The response ratio as defined in Lester et al. 2009, which is either   1. Inside/Outside 2. After/Before 3. (AI/BI)/(AO/BO) | Automatically calculated.  Override if the study only give response ratio |
| **Percent\_change** | The (Response\_ratio - 1) \* 100 | Automatically calculated  **NOTE: PC is percentage change as calculated by Farnsworth, these values need to be doubled checked** |
| **Aggregated\_data\_areas** | Is the data aggregated from multiple reserves? (and can’t be broken down into individual reserves). I.e., this is often due to the whole network being assessed rather than individual reserves. | Y or N |
| **Aggregation\_spatial\_scale\_km** | What is the spatial scale over which the data for the reserves is aggregated (measure furthest distance between centroids of no-take area) **OPEN TO SUGGESTIONS OF BETTER APPROACH!** | Numeric (text) (km) |
| **Aggregated\_data\_time** | Is the data aggregated over time? (ie the final year of data can’t be determined). Not include aggregated over a few months (<1yr) | Y or N |
| **Aggregated\_time\_inc** | Is the time aggregation valid? (only done for a few studies) |  |
| **Study\_type** | The design of the study, with respect to inside:outside, before:after or both | 3 options: IO, BA, IOBA |
| **Study\_start** | The year the study started | Numeric (whole years) |
| **Study\_length\_yrs** | The length of the study in years (the period over which the data was collected) | Numeric |
| **Study\_length\_mnths** | The length of the study in months | Numeric  **Note: Duration\_study\_yrs (old) is from Farnsworth** |
| **Res\_start** | The year the reserve was implemented | Numeric (whole years) |
| **Res\_age\_start** | The age of the reserve when the study started (in years). If the study started before the reserve, use negative values | Automatically calculated |
| **Res\_age\_end** | The age of the reserve when the study finished (in years) | Automatically calculated  **Note: Reserve age at end of study (old) is from Farnsworth** |
| **Time\_series\_data** | Is there time-series data available in the study | Y or N |
| **Source\_athr** | The first author of the data source | Text. Only the first authors name |
| **Source\_yr** | The year of publication for the data source | Numeric |
| **Source\_jrnl** | The journal for the data source | Text. Full journal name |
| **Repeat\_study** | Does the study build on already published data for that site (I.e. has the data for that site already been published and this is just looking at a longer timer period etc.)  Make a note in the notes section of what study it builds on | Y or N |
| **Related\_studies** | If the study builds on other work, include the reference here. Leave blank otherwise | Text |
| **In\_Lester\_analysis** | Is the reference in the original analysis Lester et al. 2009? | Y or N |
| **In\_Zotero** | Is the reference catalogued in the group library in Zotero? | Y or N |
| **Read\_by** | Who read the paper and entered the data | Your initials |
| **Data\_source** | If the data came from another source other than being read by a lab member | Text |
| **Notes** | Notes | Text |
| **BRUV\_ROV\_study** | is the study a BRUV or ROV study? | Text (can have blanks) |