Datasets names

#1) a_MME_dataset.csv
#2) b_ MHWsst_vs_incidence.csv
#3) c_MHWinsitu_vs_incidence.csv

General aspects

The three datasets are provided in comma separated value (CSV) text files that adhere to UTF-8 encoding. The decimals are separated by points. Whenever necessary, text strings containing commas are qualified by double quotes. The files can be imported in R using the following function:

```
dataset <- read.csv(file.choose(), sep=",", dec=".", encoding="UTF-8")
```

Description of the datasets

#1) a_MME_dataset.csv: This dataset contains all data used for the description of the spatial-temporal, depth and biological patterns of mortality observed in the Mediterranean Sea in the 2015-2019 period. The specific fields contained in the dataset are described below:

Field name	Description
Record_ID	A unique ID assigned to each survey record of the dataset
Year	The year in which each record was obtained
Season_of_survey	The season in which each record was obtained
Ecoregion	The ecoregion in which each record was obtained
Monitored_Area	The name of the monitored area in which each record was obtained
Surveyed_site	The name of the surveyed site (within the monitored areas) in which each record was obtained
Country	The country in which each record was obtained
Latitude	The latitude of the surveyed record in decimal degrees
Longitude	The longitude of the surveyed record in decimal degrees
Mortality_Lower_Depth	The lower (deeper) depth limit of each mortality record in meters
Mortality_Upper_Depth	The upper (shallower) depth limit of each mortality record in meters
Surveyed_Lower_Depth	The lower (deeper) depth limit of each mortality survey conducted

Surveyed_Upper_Depth	The upper (shallower) depth limit of each mortality survey conducted
Survey_periodicity	The periodicity of the surveys associated to each survey record (i.e., single survey *vs* periodical monitoring)
Broad_habitat	The broad habitat in which each record was obtained (e.g., hard rocky substrates, soft substrates, seagrasses…)
Specific_Habitat	The specific habitat in which each record was obtained (e.g., upper sublittoral, lower sublittoral…)
Phylum	The phylum of each surveyed record
Taxon	The taxon of each surveyed record. When possible, the record was identified to the species or genus level. Otherwise, It was assigned to a broad biological group (e., gorgonians or encrusting calcareous algae)
Percentage_of_affected_organisms	The percentage of affected individuals/colonies corresponding to each surveyed record
Severity_class	A qualitative classification of impact based on the percentage of affected organisms (%). Four arbitrary severity classes were established: no mortality (<10% affected organisms), low impact ($\geq$10%, <30%), moderate impact ($\geq$30%, < 60%), and severe impact ($\geq$ 60%)

#2) b_ MHWsst_vs_incidence.csv**:** This dataset contains all data used to conduct the analyses on the relationship between marine heatwave (MHW) days found on the surface (averaged per monitored area and year) and the corresponding mass mortality incidence of benthic organisms. Specific details on the criteria used to select only some monitored areas and years for this analysis can be found in the Material and Methods section of the manuscript. The description of the specific fields contained in the dataset is shown below:

Field name	Description
Ecoregion	The ecoregion in which the corresponding monitored area used in the analysis is found
Monitored_area	The name of the monitored areas in which the relationship between mortality and heat stress was explored for a given year
Year	The year in which the relationship between mortality and heat stress was explored for a given monitored area
N_of_MME	The number of mass mortality records found in a given monitored area and year
N_of_Records	The total number of records obtained in a given monitored area and year.
Incidence	The proportion of mass mortality records (MME records) among the total number of records found in a given monitored area and year.
SST_MHW_days	The average number of marine heatwave days calculated on the surface area of a given monitored area and year.

#3) c_ MHWinsitu_vs_incidence.csv**:** This dataset contains all data used to conduct the analyses on the relationship between *in-situ* MHW days (averaged per monitored area, depth and year) and the corresponding mass mortality incidence. Specific details on the criteria used to select only some monitored areas, years and depths for this analysis can be found in the Material and Methods section of the manuscript. The description of the specific fields contained in the dataset is shown below:

Field name	Description
Monitored_area	The name of the monitored areas in which the relationship between mortality and *in-situ* (along depth) heat stress was explored for a given year and depth
Year	The year in which the relationship between mortality and heat stress was explored for a given monitored area and depth
Depth	The depth (in meters) in which the relationship between mortality and heat stress was explored for a given monitored area and year
N_of_MME	The number of mass mortality records found in a given monitored area, year and depth
N_of_Records	The total number of records obtained in a given monitored area, year and depth.
Incidence	The proportion of mass mortality records among the total number of records found in a given monitored area, year and depth.
Insitu_MHW_days	The average number of marine heatwave days calculated for a given monitored area, year and depth