Metadata to the database on fish distribution in Italian lakes and reservoirs

Pietro Volta & Silvia Galafassi

Metadata to the database on fish distribution in Italian lakes and reservoirs

Pietro Volta [1] & Silvia Galafassi [1]

[1] CNR IRSA Water Research Institute, Verbania, Italy; corresponding author: pietrovolta@gmail.com

Keywords

fish biodiversity, multimesh gillnet, WFD 2000/60/EC, lakes, reservoirs

Short description of the dataset/summary

The database comprises the distribution of freshwater fish species in 28 Italian lakes. Data were obtained between 2007 and 2014 from standardised (CEN based) samplings with benthic and mesopelagic multi-mesh gillnets. The database offers a detailed description of the biodiversity of fish communities in the Italian regions of Piedmont, Lombardy, Trentino-Alto Adige and Sardinia including both natural lakes and reservoirs.

Short description of the dataset/summary (original/national language)

Il dataset include le informazioni sulla distribuzione della fauna ittica in 28 laghi italiani. Le informazioni raccolte sono basate su campionamenti con reti multimaglia bentiche e pelagiche in accordo con la metodologia CEN e il protocollo nazionale utilizzato per l'applicazione della Direttiva Quadro sulle Acque 2000/60/CE.

General information

dataset entry ID:	FWM_19
name of the dataset:	
full name of the dataset:	Fish distribution in 28 Italian lakes based on CEN gillnets
full name of the datast (original/national language):	
	Distribuzione della fauna ittica di acqua dolce in 28 laghi italiani
dataset short name:	Fish distribution in italian lakes
type of dataset:	species distribution data
data type:	point data/observation data
science keywords according to GCMD:	
topic:	Biosphere, Biological Classification, Climate Indicators, Terrestrial

Hydrosphere

ISO topic category according to ISO 19115:

Biota, Environment, Inland Waters

INSPIRE keywords according to GEMET:

Species distribution

own science keywords: freshwater fish; Italy; lakes; non native fish species

related project: LIFE+ Inhabit, WISER, CENSIMENTO DELLA FAUNA ITTICA DEI LAGHI SUDALPINI

funding: INHABIT - LIFE08 ENV/IT/000413.
WISER - European Union, 7th Framework Programme, Theme 6 (Environment including Climate Change) (contract No. 226273).
CENSIMENTO DELLA FAUNA ITTICA DEI LAGHI SUDALPINI - REGIONE LOMBARDIA.

Technical and administrative specifications

data format:	csv
operating system:	all operating systems
data language:	English
current access level:	web (public)
currently available through GBIF:	yes
exchange planned:	yes
data in data repository:	yes
specify repository:	http://150.145.35.118/Datasets/Fish_distribution.csv

Do you plan to publish the data on the Freshwater Biodiversity Data Portal:

yes

update level:	completed
documentation:	
type:	manual
language:	English

contact details:

metadata contact person:

first, last name:	Pietro Volta
phone:	+39 0323 518335
email:	p.volta@cnr.it
institution:	CNR IRSA Water Research Institute
address:	Largo Tonolli 50
postal code, city:	28922 Verbania
province, state:	VB
country	Italy
web address:	http://www.irsa.cnr.it/

technical contact person:

first, last name:	Silvia Galafassi
phone:	+39 0323 518300
email:	silvia.galafassi@gmail.com

scientific contact person:

first, last name:	Pietro Volta
phone:	+39 0323 518335

email: p.volta@cnr.it

Intellectual property rights and citation

dataset creator (data compiler):
    contact name: Pietro Volta
    contact email: p.volta@cnr.it
    contact institution: Water Research Institute IRSA - Consiglio Nazionale delle Ricerche
data contributors to/owners of this dataset:
    single
    criteria for using this dataset: The dataset is publicly available (data portal, data archive) and can be used without restrictions, but dataset creator/data contributors must be informed prior to publication. Data must be acknowledged and cited correctly.
citation of this dataset:
    author(s): Volta, P. & Galafassi, S.
    title and journal (name, number, pages): Database on fish distribution in Italian lakes and reservoirs.
    year: 2018
    doi: https://doi.org/10.15468/uey35v
citation of the metadata:
    author(s): Volta P. & Galafassi S.
    title and journal (name, number, pages): Metadata to the database on fish distribution in Italian lakes and reservoirs. Freshwater Metadata Journal 35: 1-4
    year: 2018
    doi: https://doi.org/10.15504/fmj.2018.35

General data specifications

regional coverage of the dataset:
    spatial extent of the dataset: national
    continents: Europe
spatial extent (bounding coordinates):
    southernmost latitude [°]: 40.553089
    northernmost latitude [°]: 46.756744
    westernmost longitude [°]: 7.125792
    easternmost longitude [°]: 12.085461
    minimum altitude: 43 metres
    maximum altitude: 2275 metres
    countries: Europe: Italy
world climatic regions according to Köppen:
    Group C: temperate/mesothermal climates
    Group D: continental/microthermal climate
    Group H: alpine climates
European ecoregions according to Illies (WFD):
    Italy, Corsica and Malta (ER3)
ecosystem type: lakes/ponds
covered timeframe: 2007 - 2014

Site specifications

coordinate system/grid data:	latitude/longitude, format: DD
	projected, UTM
datum (e.g. WGS84):	WGS84
grid data available:	no
number of sites:	<100
exact number of sites:	28

Biological data

biological data origin:	from sampling,
	INHABIT - LIFE08 ENV/IT/000413. WISER - European Union, 7th Framework Programme, Theme 6 (Environment including Climate Change) (contract No. 226273). CENSIMENTO DELLA FAUNA ITTICA DEI LAGHI SUDALPINI - REGIONE LOMBARDIA
organism group addressed:	fish

Sample resolution

fish:

taxonomic resolution:

level:	species
percentage of species level data:	100

taxonomic coding:

taxalist according to:	Kottelat and Freyhof
reference(s):	Kottelat, M. and J. Freyhof, 2007. Handbook of European freshwater fishes. Publications Kottelat, Cornol and Freyhof, Berlin. 646 pp.

sample specifications:

specification of method(s) used for sampling and sorting:

According to the depth and surface area of the lake, an appropriate number of benthic and pelagic multi-mesh gillnets were used, following CEN standards partly modified. Each benthic net was 40 m long and 1.5 m high and was composed of 16 panels (each 2.5 m long) with mesh sizes ranging from 5.5 to 135 mm. The benthic nets were set from the surface down to 100 m depth. Pelagic sampling was performed with a variable number of nets linked together, each being 27.5 m long and 6 m high and having 11 panels (with a mesh size ranging from 8 mm to 55 mm, knot to knot). Four additional nets (40 m long, 6 m high, 4 panels (75, 95, 115 and 135 mm)) were attached to the end of each pelagic net set. The nets were set at 10 m intervals from the surface down to 50 m depth. Nets were set at dusk between 16.00 and 20.00 pm and lifted the following morning between 06.00 and 08.00 am.

reference(s):	CEN. Water quality?Sampling of fish with multi-mesh gillnets (English version prEN 14757:2013). Brussels: European Committee for Standardization; 2005. ISPRA. 2014. Metodi biologici per le acque superficiali interne. Manuali e linee guida 111 / 2014. Rome, Italy. ISBN 978-88-448-0651

Other specifications

GIS layers, shape files related to the dataset:

no data available

availability of photos: no

availability of maps: no

quality control procedures:

Were any quality control procedures applied to your dataset?

no

Acknowledgements