

GENERAL INFORMATION	
Parameter name	Land surface temperature
Name of the layer in EGD Map Viewer	Land surface temperature, Girona
Original name of the layer uploaded to EGD database	PP03_ICGC_land_surface_temp
Category	Resources for closed-loop systems
Definition	Temperature of the land surface on the top canopy layer
Harmonized unit	°C
Relevance for shallow geothermal energy	Mean annual surface temperature derived from infrared satellite data. If available, these datasets are calibrated and validated by soil temperature measurements.
Data type	Continuous data layer
Data format	raster
Projection	EPSG: 3034
Dataset selected for pilot area	Bratislava, Vienna, Zagreb, Prague, Cork, Linköping, Ljubljana, Brussels, Girona

ATTRIBUTES	
Unit	°C

DATA SOURCE	
Pilot area	Urban area of Girona city (Catalonia, NE Spain)
Data source	Geoindex - Shallow geothermal energy viewer of Catalonia https://www.icgc.cat/Geoindex/Geoindex-Geotermia-superficial
Contact data owner	geotermia@icgc.cat
Last Update	July 2020

Explanatory text English
Raster dataset which represents the average annual air temperature distribution of the pilot area. This layer was developed using a spatial interpolation scheme based on Multiple Linear Regression from available data of 187 weather stations. The factors that have been considered in the theoretical model are altitude, potential solar radiation, topographic wetness index TWI), topographic position index (TPI), terrain ruggedness index (TRI), latitude and continentality.

Explanatory text national language	
Language	Catalan
Capa en format raster que representa la distribució de la temperatura mitjana anual de l'aire a la zona pilot. Aquesta capa va ser elaborada mitjançant interpolació espacial i Anàlisi de Regressió Múltiple a partir de les dades disponibles en 187 estacions meteorològiques. Els factors que s'han considerat en el model teòric de càlcul són l'altitud, la radiació solar potencial, l'índex de humitat topogràfica (Topographic Wetness Index, TWI), l'índex de posició topogràfica (Topographic	

Position Index, TPI), la complexitat del terreny (Terrain Ruggedness Index, TRI), la latitud i la continentalitat.