



GOOGLE MAPS 38.687485, -4.106837



PROJECT

CALATRAVA VOLCANOES GEOPARK. CIUDAD REAL

FUENTE AGRIA AND CASA DE BAÑOS IN PUERTOLLANO



www.proyectogeoparquevolcanesdecalatrava.es



Magma

Mercury

Coal



Castilla-La Mancha



GEOPARQUE
VOLCANES
DE CALATRAVA
CIUDAD REAL



DIPUTACIÓN DE
CIUDAD REAL



Ayuntamiento de
Puertollano

This spring is known locally as “Fuente agria” (sour spring) as its flavour is dominated by the taste of iron and the slightly spicy sensation in the nose produced by the carbon dioxide gas dissolved in the water. It is a medicinal mineral water source that emerges at a temperature of 20°C and has a very constant flow of 0.5 litres per second. Its waters are bicarbonated, magnesian with iron and about 1,800 mg/l of CO₂.

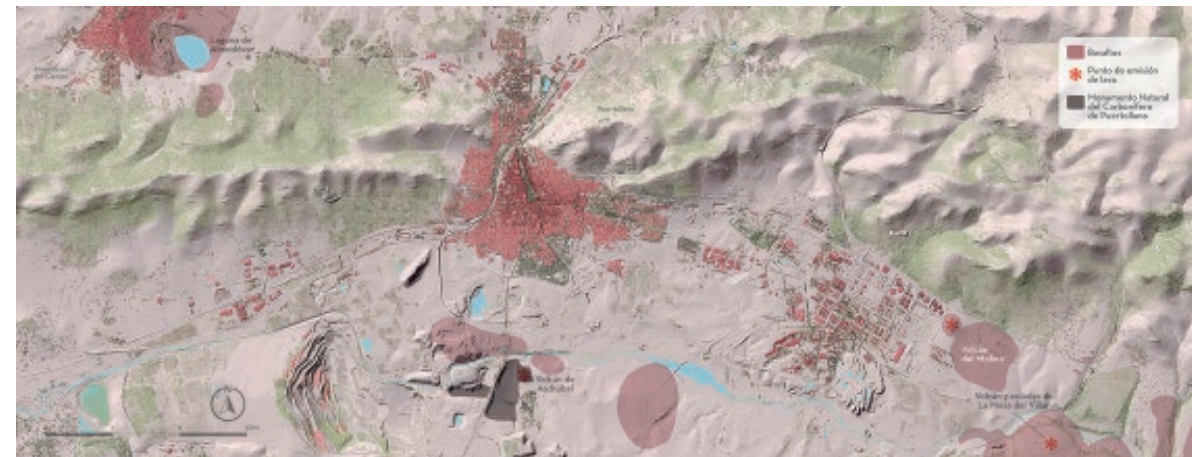
We are in the Calatrava Volcanic Region with more than 350 volcanic buildings (Fig. 1); in the vicinity of the city we can find several volcanoes such as Asdrúbal (Fig. 2), only 2,500 m. south of the spring.

The Fuente Agria spring is related to the deep flow of residual volcanic gas from the Campo de Calatrava. The gas, coming from the interior of the earth, uses the fractures in the ground to rise to the surface and can drag water and dissolve some of the minerals it finds in its path. This high content of carbon dioxide makes the

water very capable of dissolving iron and other minerals in the crack and fracture systems of the subsoil. These fracture lines were formed by the movements and thrusts of the ground over a long and complex geological history. The Fuente Agria of Puertollano probably originates from the discharge of pressurised water into a local aquifer - associated with fractures in the bedrock surrounding the city - in the Sierra de Santa Ana, with carbon dioxide gas being incorporated at depth through fractures on the periphery of this aquifer and dissolving the iron and other minerals present in the rocks (Fig. 3).

The waters of Puertollano began to be used for bathing in the last quarter of the 18th century. The present bathhouse was built in 1850 and the pavilion covering the spring dates from 1905.

It is listed by the IGME as a Site of Geological Interest -LIG Cls-251- “Fuente Agria de Puertollano”.



Work derived from Mapa-LiDAR 2019 CC-BY 4.0 scne.es - Fig. 1



Fig. 2

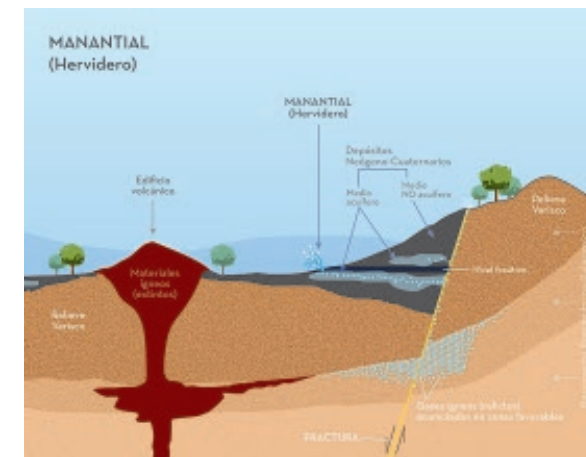


Fig. 3