## LAS HIGUERUELAS PALAEONTOLOGICAL SITE

## **ANANCUS ARVERNENSIS FOSSILS**

This collection recreates the appearance of the palaeontological site of Las Higueruelas (Alcolea de Calatrava, Ciudad Real), where large mammal bones have been found among greenish volcanic sediments.

The fossils from the Las Higueruelas site are from the Pliocene (some 3.2 million years ago). They were discovered in 1935 and excavated in 1971. Between 1984 and 1991, systematic excavations were carried out, yielding the fossils displayed here.

The site lies within a maar or explosion crater in the volcanic region of Campos de Calatrava, which contains more than 240 volcanic landforms. A lake system developed in the crater, with a hot semi-arid climate. The presence of a lake in the area must have been of vital importance for *Anancus*, since these proboscideans needed large amounts of water every day to drink and for taking the mud baths that protected them from insect bites and the sun.

The fossil remains displayed here are genuine and correspond to a mastodon named *Anacus arvernensis*, an extinct species related to modern elephants, whose straight tusks were as long as its body. The tusks of elephants and their related species are formed from adapted upper incisors and serve both a defensive and feeding function (enabling the animal to dig up roots). They grow continuously throughout the animal 's life.

In addition to the remains of proboscideans such as *Anancus*, the four-metre deep site contains small insectivore mammals such as shrews, felids related to the cheetah (*Acinonyx pardinensis*), rodents (*Stephanomys amplius*, *Castillomys crusafonti*, *Apodemus dominans*, *Hystrix* sp.), canids (*Nyctereutes megamastoides*), hyenas (*Chasmaporthetes lunensis*, *Pachycrocuta* cf. *perrieri*), cervids (*Cervus* cf. *perrieri*, "*Cervus*" cf. *cusanus*, *Arvernoceros ardei*), bovids (*Gazella borbonica* equids (*Hipparion rocinantis*) and rhinoceros (*Stephanorhinus* etruscus), as well as numerous birds, reptiles, amphibians, fish, ostracods and foraminifera.

In the specimen exhibited in the museum it can be seen the cranium, a set of scapula and ulna, several vertebrae and ribs, the mandible, a pelvis and a pair of tusks, which are very characteristic of this species.



