Underground shelters of Golgoli (Cappadocia - Turkey)

Ali Yamaç¹, Eric Gilli²

Abstract

The region known today with its ancient name as "Cappadocia" includes the Turkish provinces of Nevsehir, Aksaray and Kayseri. In this region, different underground structures such as houses, barns and churches were excavated by the locals for centuries in the tuffaceous rocks spewed out of volcanoes active in the late Pliocene and Pleistocene period. However, the most interesting of these structures are, without doubt, the underground shelters. These structures, carved for defensive purposes probably between 7th to 12th centuries, are found in almost every part of Cappadocia. There are more than 200 examples identified to date in the region. Only a small part of those hypogea have been surveyed so far. In this study, we will examine two different unpublished rock-cut shelters at the ancient settlement of Golgoli near Sinasos (Mustafapaşa). Even though it is quite close to touristic Cappadocia, Mustafapaşa is one of the neglected settlements in this region. On the other hand, this settlement shares similar geomorphological formations with the rest of the region and there are countless rock-cut dwellings in its surroundings.

Key words: cave dwellings, rock-cut shelter, church, Cappadocia, Golgoli.

Riassunto

I rifugi sotterranei di Golgoli (Cappadocia - Turchia)

La Cappadocia è una regione storica dell'Anatolia che comprende le provincie di Nevsehir, Aksaray e Kayseri. Le rocce tufacee formatesi per l'azione eruttiva dei vulcani attivi nel tardo Pliocene e nel Pleistocene sono state scavate per secoli dalle popolazioni locali per la realizzazione di abitazioni, chiese e granai. Tra le differenti strutture scavate, i rifugi sotterranei costituiscono l'esempio più interessante. Tali strutture, realizzate a scopo difensivo tra il VII e il XII secolo, sono distribuite in ogni parte della regione. Sebbene siano stati identificati più di duecento rifugi sotterranei all'interno della regione, solo una piccola parte di essi è stata studiata e rilevata. In questo lavoro esamineremo due rifugi sotterranei inediti che si trovano nell'antico insediamento di Golgoli vicino Sinasos (Mustafapaşa). Tale località presenta una struttura morfologica e geologica molto simile agli altri insediamenti dell'area, ed è caratterizzata da un ricco patrimonio rupestre. Nonostante queste caratteristiche, e la sua posizione non distante dai centri turistici della Cappadocia, la città di Mustafapaşa o (Sinasos) è uno degli insediamenti che non hanno ancora ricevuto il giusto rilievo culturale.

Parole chiave: città sotterranea, Cappadocia, rifugio sotterraneo, Golgoli.

Introduction

Mustafapasa (Sinasos) is a village located 17 km south of Ürgüp (fig. 1) and, althoughit is part of Cappadocia, it has numerous differences from the other villages of the region. Until the population movements of 1923, Sinasos was a completely Greek village. It still has houses from this period. Even though some of these houses belonged to the Greek villagers who lived in Sinasos, the majority were the summer houses of Greeks who were former residents of this place, and settled in Istanbul in the 18th and 19th centuries.

The houses of Sinasos, most of which date back to 19th century, have a splendor that indicates the wealth of the Greeks living in Istanbul, who visited here seasonally. Academic work on the history of Sinasos, which is different from other settlements of Cappadocia, is very limited.

However these studies have documented that the history of this place goes back to the $16^{\rm th}$ century (Ilbars & Temren, 2003; Balta, 2007). The churches of Constantine and Helena within Sinasos and the Hagios Nicolaos Monastery, which is 3 km from the village, date back to the $18^{\rm th}$ century.

¹ Obruk Cave Research Group, Acikhava Apt. 16/7, Nisantasi, Istanbul, Turkey ayamac@gmail.com

² Paris 8 University, Department of Geography. 2, Rue de la Liberté, 93526, Saint Denis, France

Although there is no building within Sinasos that maybe dated to the Byzantine period, two rock-cut churches are present in a nearby rock-cut village named "Golgoli" or "Gorgoli" (JERPHANION, 1912; JOLIVET, 2015).

They contain paintings that have the same style as others that can be seen in many places around Cappadocia, dating back to the 12th and 13th centuries.

Golgoli village

This area of pinnacles (locally called *peribacalari* or 'fairy chimneys') is located west of the road to Ayvali

village, 5 km south of Sinasos (Kivilcim, 2011; Pekak, 2008). At the point where Panayia Hill reaches the plain, most of the pinnacles are carved with rock-cut dwellings (fig. 2).

There are tens of houses, 2 churches and 2 different underground or rock-cut shelters. Even though there are no known historical or archaeological records, this settlement maybe the first settlement of Sinasos.

The traditional pilgrimages to the Golgoli churches, made in spring by the people of Sinasos indicate that the history of Golgoli was strongly present in the collective memory until the 1920s (fig. 3). Unfortunately, the only information we have about these pilgrimages are some oral informations (Balta, 2007).

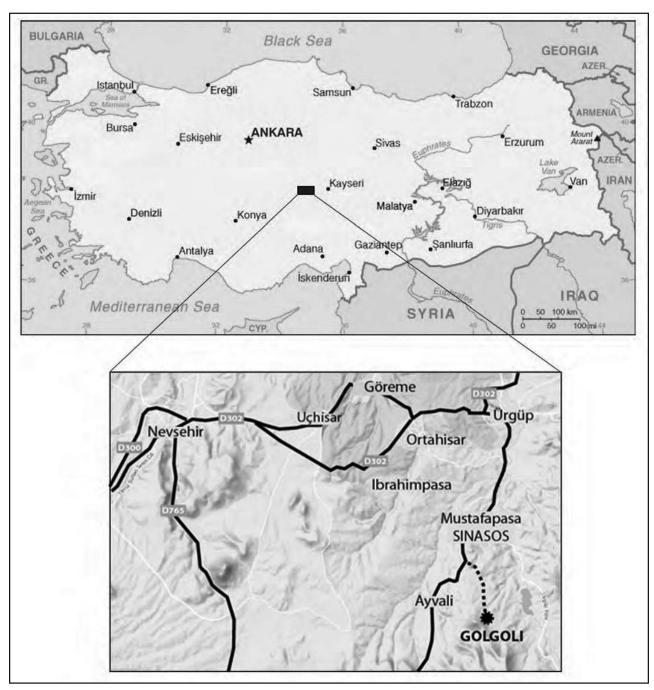
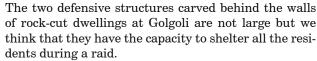


Fig. 1 - Location map showing Golgoli (drawing A. Yamaç).

Fig. 1 - Cartina di Golgoli (disegno A. Yamaç).



Fig. 2 - Golgoli rock-cut dwellings (photo C. Cankirili). Fig. 2 - Abitazioni rupestri di Golgoli (foto C. Cankirili).



Only a limited number of the many underground settlements in Cappadocia have been surveyed and inventoried to date (Bixio, 2012).

In this article, we aim to present these two shelters which have been mentioned by JERPHANION (1912) and JOLIVET (2015) but had never been investigated.



Fig. 3 - Golgoli in 1923 (source Balta, 2007, p. 94). Fig. 3 - Foto storica di Golgoli risalente al 1923 (da Balta, 2007, p. 94).

Golgoli underground shelter No. 1

The main entrance of this underground settlement (fig. 4) is situated at the base of the eastern wall of a big rock-dwelling, north of the hill side where the main rock-cut dwellings of Golgoli are situated. Right behind the entrance stairs, is the first millstone door. Then the main tunnel divides into two sections.

To the west, we arrive in an upper chamber (fig. 5). Although the whole southern face of this upper cham-

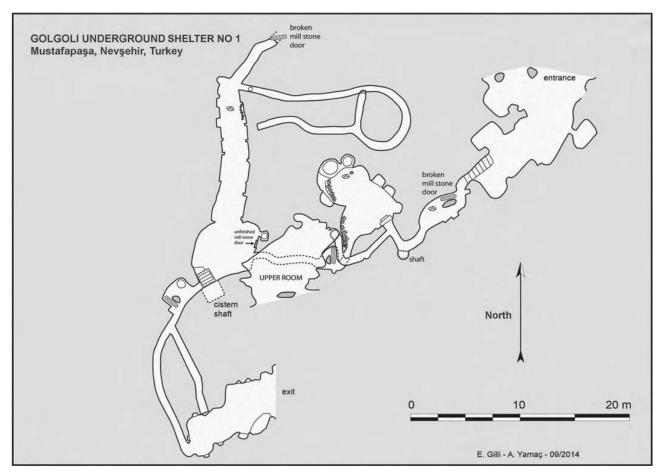


Fig. 4 - Plan of Golgoli rock-cut shelter No. 1 (survey E. Gilli, A. Yamaç). Fig. 4 - Planimetria del rifugio rupestre di Golgoli n. 1 (rilievo di E. Gilli, A. Yamaç).

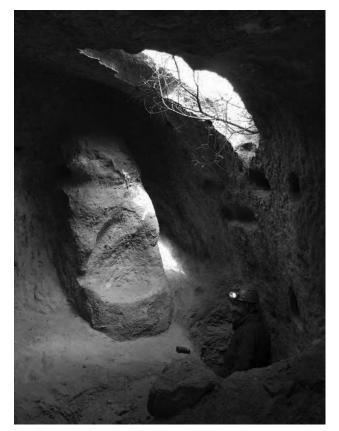


Fig. 5 - Entrance to the upper room of Golgoli rock-cut shelter No. 1 (photo E. Gilli).

Fig. 5 - Ingresso al piano superiore del rifugio rupestre di Golgoli n. 1 (foto E. Gilli).

ber is open towards the outside, it is not possible to reach it from outside.

To the north, the other branch of the tunnel goes towards another chamber which is 9x6 m. Storage holes line all the walls of this chamber. The tunnel that continues from the southwest wall of the chamber is fortified by another millstone door. The height of ceiling is about 1.40-1.60 m and its width is about 60-70 cm, then the tunnel reaches another chamber which is very interesting. In its first part it is 5 m wide and then it narrows down to a 3 m, and 17 m long part (fig. 6) that contains several boulders.

Stone rings, carved in the ignimbrite, are also present but their use remains unexplained. An unfinished millstone door is found next to the rock where the tunnel reaches the chamber. Its carving was probably interrupted because the threat of raids had disappeared and this defensive structure was abandoned (fig. 7).

Other causes are possible, like a sudden invasion or a local disease, or a lack of funds, before the end of the work. This is a good example showing the location and the method of carving the numerous millstone doors that can be seen in Cappadocian underground shelters (BIXIO & CASTELLANI, 2002).

A tunnel that continues at the northern point of the chamber has a millstone door but it is blocked by debris. Another tunnel which is located in the east of this tunnel, and is 32 m long, has a U shape and ends without reaching anywhere.



Fig. 6 - Main passage of Golgoli rock-cut shelter No. 1 (photo C. Cankirili).

Fig. 6 - Galleria principale del rifugio rupestre di Golgoli n. 1 (foto C. Cankirili).

An interesting point is that all parts of this tunnel are unblocked with no connection to anywhere. Another interesting characteristic of the main chamber is the presence of an almost vertical pit to the west of the tunnel that reaches this place. A stairway, 80 cm wide, with a 65° slope, goes down 7.5 m to a cistern or well (fig. 8).



Fig. 7 - Entrance to the main room of Golgoli rock-cut shelter No. 1. Unfinished millstone door is in the centre of photo (photo E. Gilli).

Fig. 7 - Accesso camera principale del rifugio rupestre di Golgoli n. 1. Al centro della foto si nota una porta macina incompiuta (foto E. Gilli).



Fig. 8 - Cistern (or well) in the main chamber of Golgoli rock-cut shelter No. 1. (photo C. Cankirili).

Fig. 8 - Cisterna (o pozzo) nella camera principale del rifugio rupestre di Golgoli n. 1 (foto C. Cankirili).

Although there is no water in it today, this cistern (or well) could be the "sacred spring water" (ayazma) mentioned by the locals of Sinasos (Kivilcim, 2011).

The cross which is carved on the rock that is located at the western wall of this cistern also suggests the religious importance of this structure (fig. 9).

This pit can also be accepted as a type of defensive trap for the tunnel that continues to the south of these stairs. This tunnel, following another millstone door and operation room, reaches to a second entrance in a rock-cut dwelling that opens to Golgoli Valley.



Fig. 9 - Cross on the wall of main chamber of Golgoli rock-cut shelter No. 1 (photo C. Cankirili).

Fig. 9 - Croce incisa sulla parete della camera principale del rifugio rupestre di Golgoli n. 1 (foto C. Cankirili).

Golgoli rock-cut shelter No. 2

Unlike the first shelter which is totally underground, this structure is located at the top of the hillside, among the Golgoli cave dwellings. This three storey rock-cut shelter opens through the western wall of a pinnacle or "Fairy Chimney" (fig. 10).

From this perspective, it represents a unique example among the underground shelters studied so far in Cappadocia. The southern entrance of the structure starts with a narrow tunnel that leads to a big chamber (lower level) protected by a millstone door, approximately 7 m away.

Another tunnel that continues from the west of this chamber is very low (fig. 11) and after a 1 m steep shaft, is connected to another chamber 4x2 m in size.

A third tunnel that continues to the north of this lower level chamber reaches the north chamber. This chamber has another millstone door that stands *in situ* (fig. 12).

This chamber leads to an upper-level tunnel.

This middle level includes a double tunnel and a room. The stairs that connect the middle storey to upper and lower levels has almost the shape of a shaft and is 6.60 m high. In the third storey a millstone door lays on the floor. It is very large with a diameter of 1.70 m and a thickness of 32 cm, which is very rare in the region (fig. 13).

The uppermost chamber at the top of this pinnacle must be the last point of defence.

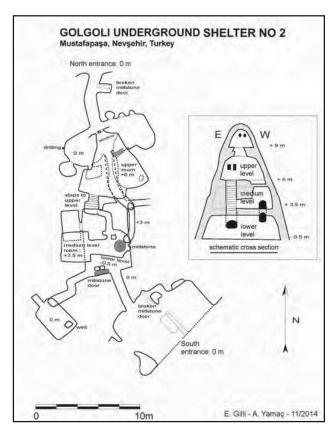


Fig. 10 - Plan of Golgoli rock-cut shelter No. 2 (survey E. Gilli, A. Yamaç).

Fig. 10 - Planimetria del rifugio rupestre di Golgoli n. 2 (rilievo di E. Gilli, A. Yamaç).

GOLGOLI VILLAGE SETTLEMENT AGE

Golgoli is now occasionally visited by tourists and some fields are still cultivated. Farmers use the rock-cut-dwellings as temporary shelters.

Paintings in the churches (fig. 14) and texts engraved on the walls indicate that Golgoli was inhabited or used



Fig. 11 - Exit of first tunnel to the west of main chamber in Golgoli rock-cut shelter No. 2 (photo C. Cankirili).

Fig. 11 - Uscita del primo tunnel sul lato ovest della camera principale del rifugio rupestre di Golgoli n. 2 (photo C. Cankirili).



Fig. 12 - Millstone door to close the tunnel reaching the last room of first floor and above, the entrance of upper floor tunnel in Golgoli rock-cut shelter No. 2 (photo E. Gilli).

Fig. 12 - Una porta macina nei pressi del tunnel che porta al-l'ultima camera del primo livello ed in alto l'entrata al livello superiore del rifugio rupestre di Golgoli n. 2 (foto E. Gilli).

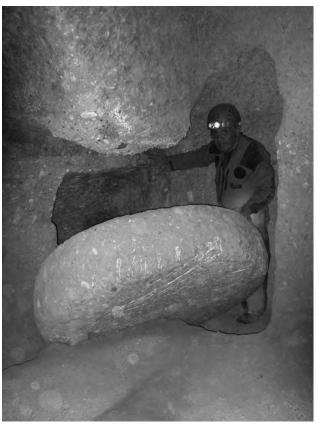


Fig. 13 - A huge millstone door on the entrance of third and highest room of Golgoli rock-cut shelter No. 2 (photo E. Gilli). Fig. 13 - Un enorme porta macina all'ingresso della terza e più elevata camera del rifugio rupestre di Golgoli n. 2 (foto E. Gilli).



Fig. 14 - Illustrations in the pinted church of Golgoli (photo E. Gilli).

Fig. 14 - Pitture in una chiesa ornata a Golgoli (foto E. Gilli).

for religious purpose from the $12^{\rm th}$ to $20^{\rm th}$ centuries. However, like most of the cave dwellings in Cappadocia, the history of Golgoli is certainly much older than the $12^{\rm th}$ century.

Some pinnacles are very affected by erosion that cuts through the rock-cut dwellings which tends to prove their age. Unfortunately, erosion is very active and it is quite impossible to give an age from studying the external aspect of the pinnacles but cosmonucleid dating could be helpful (Gosse & Phillips, 2001). Architectural features may give valuable information but as new

inhabitants usually modify previously inhabited places, they erased most of the usable information. Roman tombs are present in a few places (JOLIVET, 2015; figs. 15-16).

During the Roman period, cemeteries were always outside settlements. Depending on their wealth, people used to place the bodies in large and well-decorated graves or the ashes in columbarium niches carved in collective tombs.

It is possible that Golgoli was first a Roman cemetery related to the nearby settlement of Sinasos, and that it was then transformed into a Byzantine religious place. An hypothesis is that the niches for cremation urns were then used as pigeon columbaria to collect guano for local agriculture.

The rock-cut shelters at Golgoli were probably dug between the 7th and 12th centuries, like very many other underground settlements in Cappadocia, in order to protect people against the Arab invasions or local raids.



Fig. 15 - An eroded pinnacle at Golgoli with small, collapsed rooms. Possibly a hermitage with columbaria or dovecotes (photo E. Gilli).

Fig. 15 - Un pinnacolo eroso e parzialmente collassato che mostra alcune camere che erano al suo interno. Probabilmente si trattava di un eremo con una piccionaia (foto E. Gilli).

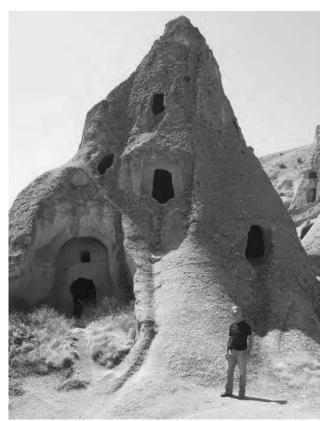


Fig. 16 - A pinnacle with some dwellings. The room on the left is a Roman tomb (Jolivet, 2015; photo E. Gilli). Fig. 16 - Un pinnacolo con alcune abitazioni. La camera sulla sinistra e una tomba romana (Jolivet, 2015; foto E. Gilli).

Conclusion

A Roman site is present in the nearby Sobesos, 3 km southward, where archaeological excavation have found remains of thermae and mosaics of 4th century (Yenipinar, 2003) and a masonry church of 6th century (Jolivet, 2015).

However there are very few studies of Sinasos so that it is impossible to know if the village already existed in Roman times. Likewise, there are to date no archaeological or other academic studies about the Golgoli dwellings.

Thus, we do not have any information about the history and the relationships of the two different underground settlements. It is now impossible to say if Golgoli was the old Sinasos or, if both places were only connected for religious purposes.

This problem concerns several places in Cappadocia and dating the beginning of the first underground settlements remains a challenge.

References

- Balta E., 2007, Sinasos, Mübadeleden Önce Bir Kapadokya Kasabası. Istanbul.
- Bixio R. (ed.), 2012, Cappadocia: Schede dei siti sotterranei/ Records of underground sites. British Archaeological Reports, Oxford, S2413, 278 p.
- Bixio R., Castellani V., 2002, Dispositivi di difesa nei sotterranei cappadoci. Bixio R., Castellani V., Succhiarelli C. (eds.), Cappadocia. Le Città Sotterranee. Istituto Poligrafico e Zecca dello Stato, Roma, pp. 265-278.
- Gosse, John C., Phillips, Fred M., 2001, Terrestrial in situ cosmogenic nuclides: Theory and application. Quaternary Science Reviews, 20, pp. 1475-1560.
- Jerphanion G. de, 1912, Les églises de Cappadoce. In: Comptes rendus des séances de l'Académie des Inscriptions et Belles-Lettres, 56-5,3 20-326. DOI: 10.3406/crai. 1912. 73046.
- $\label{eq:control_control_control} \mbox{Jolivet-Levy C., 2015}, \mbox{\it La Cappadoce. Un siècle après G. de Jerphanion (tome 1 \& 2)$.} \mbox{ Geuthner \'edit., Paris, 382 p.}$
- ${\it Ilbars Z., Temren B., 2003, K\"{u}lt\"{u}rel\ Boyutuyla\ Mustafapaşa\ (Sinasos).\ Ankara.}$
- Kivilleim F., 2011, A Research on the Conservation of the Spirit of Place. Case study: Mustafapaşa (Sinasos) in Cappadocia. University of Rome, unpublished PhD Thesis.
- Pekar M.S. 2008, *Mustafapasa (Sinasos) ve Aziz Nikolaos Manastırı*. Hacettepe University / Journal of Faculty of Letters, vol. 25 No. 1, Ankara, pp. 26-33.
- Yenipinar H., 2003, Chantier de fouille et de conservation d'un site de mosaïques au lieu-dit Örenci, village de Sahinefendi, près d'Ürgüp. Dossiers d'Archéologie, Faton édit, Dijon, 283, pp. 8-9.