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New semi-underground house models, high density-low rise

Catiana Calcagno (1), Filiberto Lembo (2), and Francesco Paolo R. Marino (2) (1) Potenza, Italy (catiana@live.it), (2) Faculty of Engineering, University of Basilicata, Potenza, Italy (filiberto.lembo@unibas.it - francesco.marino@unibas.it)

The underground and semi-underground construction are a building type whose traces are lost in the past. From Cappadocia to Jordan, man has left us countless testimonials of dug cities that, today, respond more adequately to the climatic problems. It is surprising to see how a building type, which has its roots in the remote past is today able to satisfy the needs of energy saving and of architectural forms which are continuously evolving.

The peculiarity of this type is the capacity to relate to the ground morphology by inserting in a "non-violent way" but adapting to the pre-existent conformity. Therefore, in a local mountainous context like Basilicata, whose building tradition is the underground-construction, a project experience like this can be the cue for a revitalization of the urban contest.

All that ser has served to define the project which is the synthesis of free-form shapes that fit in the land in accordance with the principles of sustainability. The main objective is to fit naturally in the environment. Therefore, the buildings have been partially buried along the northern front using the slope of the site.

In conclusion, a semi-underground building which involves a series of climatic and environmental benefits is obtained. From a bioclimatic point of view the district was designed as a settlement where it is possible to move on foot and take advantage of the system of the roofs of buildings that function as paths. As these "roof - gardens", growing in space, show the development of the land and define the physical nature of residential complexes.

This design experience allows us to understand how to transform our cities into "green cities" with the resources we are given by architectural and engineering studies.