Origami House

SHARE ARCHITECTURE AWARDS 2025

The Origami House

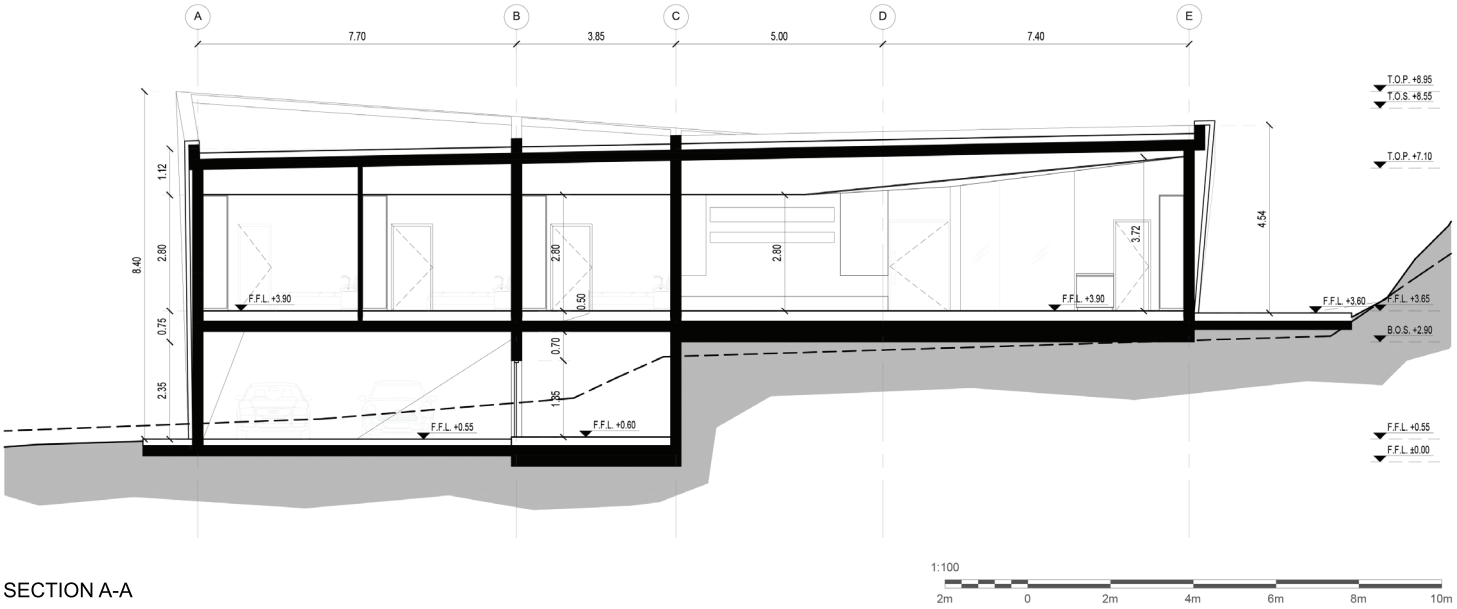
Inspired from the principle of “origami”, the residence design intent was to stand out as an iconic house for the particular newly-developed area.

The site is located on the verge of a residentially developing area in the west suburbs of Nicosia. With the form of an origami structure, the internal spaces are wrapped within a morphologically complex, but simple in plan, structure.

Internally, the aim is to highlight the unobstructed view on the south-west side by using a long glazed openable facade, where all the primary spaces have been allocated along. On the contrary, the north-east facade with small discreet openings, accommodates all the secondary facilities, all in a longitudinal order, maintaining the desired privacy between the communal and private spaces of the house.

1st Floor	Master Bedroom	Kid's Bedroom 1	Kid's Bedroom 2	Living Room	Kitchen / Dining

Ground Floor	Parking	Store room	Mechanical room



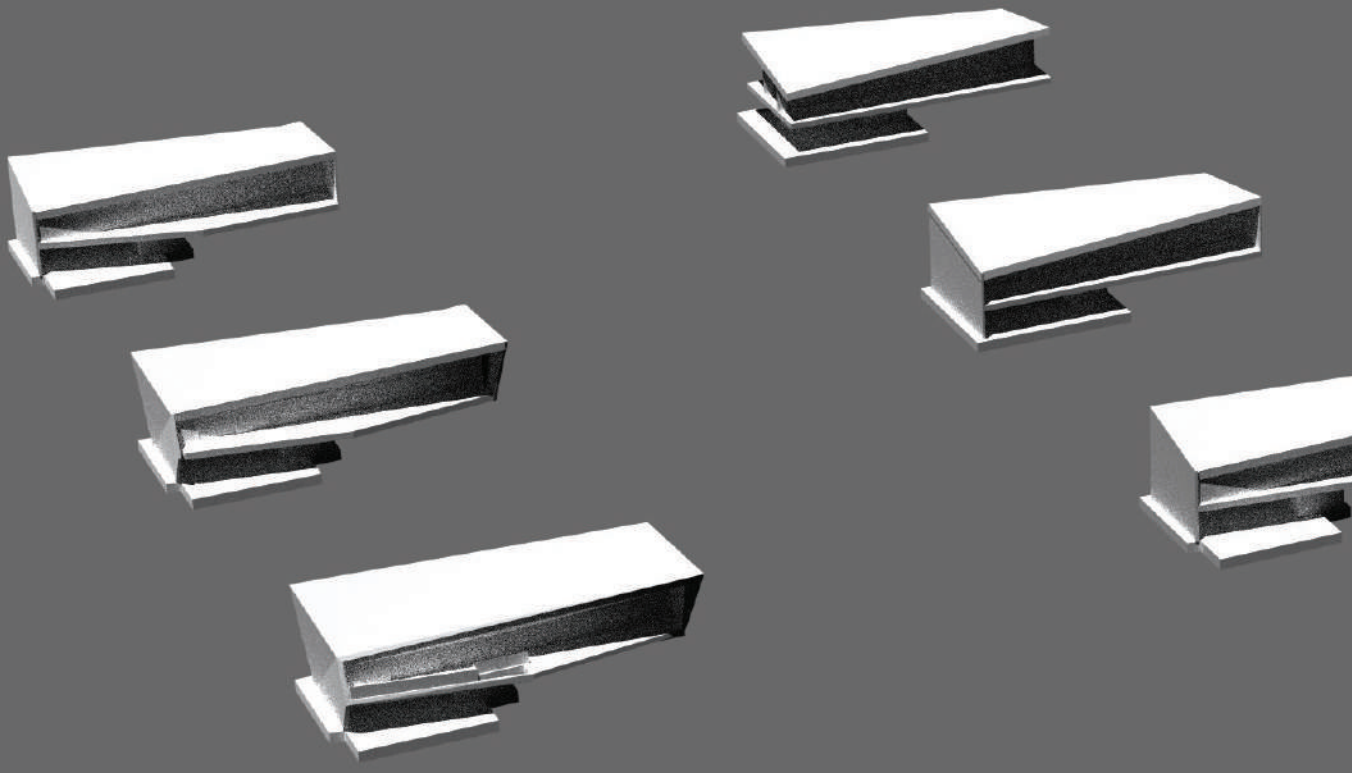
SECTION A-A

1:100

2m 0 2m 4m 6m 8m 10m

The architectural design is driven also by the intention to protect the large glazed surface with the use of “smart” cantilevers and external metal panels, which prevent the undesired sunlight during summer, while allowing the gentle winter sun rays to fill in the internal space. Moreover, thermal comfort is enhanced with the attempt to achieve natural cross ventilation for each space.

Based on the origami principle of triangulation, the building itself is, in essence, a cluster of diagonally interconnected surfaces, which highlight the reflections of the environment and the contrast to the geomorphology of the terrain. All these, along with discreet natural vegetation, come to articulate a “functional” sculpture in nature.



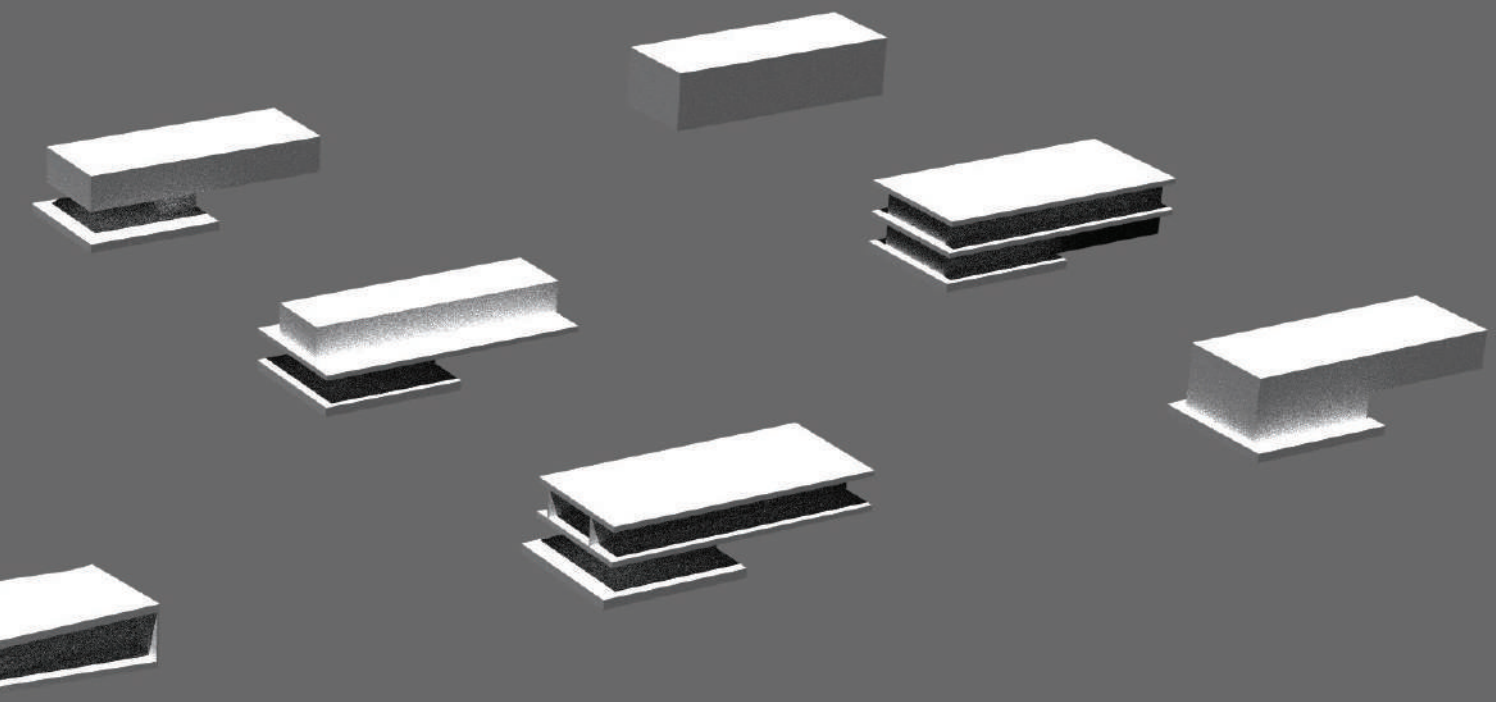
The initial gesture was to identify the most convenient setting out of the house within the plot. Although it is a fairly large piece of land (about 1600m2), the owners expressed their desire to keep the outdoor area as uninterrupted as possible.

For this reason, the building was placed perpendicular to the street, on the higher of the two existing levels, thus forming a unified exterior space, laid out on two levels connected by a slope.

The various folds in the outer envelope of the building create voids with the inner surface of the shell, which significantly contributes to reducing the energy load of the building.

Despite the particular form of the building, the layout of the interior spaces is simple;

an element that is a fundamental principle in Japanese architecture. It is worth noting that the pleated surfaces that make up the main idea continue, both in the landscaping and inside the spaces, resulting in an overall coherence in the project.



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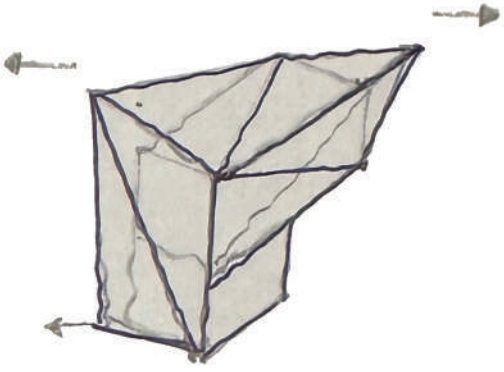
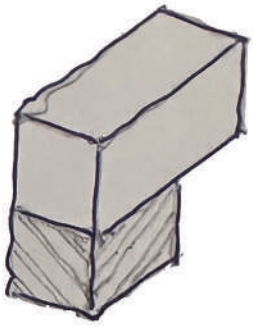




All the main spaces are oriented towards the large single exterior space (main courtyard) and all the auxiliary spaces towards the north-eastern border of the plot. The main interior spaces have a southwest orientation, thus covered by considerably larger cantilevers, while the auxiliary ones face the northeast, thus having smaller openings.

On the south-west side, the extent of the overhangs increases and decreases according to the direction of the sun in order to prevent unwanted solar radiation.

In addition, external sliding shading panels are used for the same purpose. With the aforementioned passive design systems, as well as the use of photovoltaic panels, the thermal comfort of the building is significantly enhanced.

The main interior spaces of living room, dining room and kitchen are located in an open space, along and parallel to the main courtyard outside. By using sliding glass surfaces, a great interconnection between inside and outside is achieved.

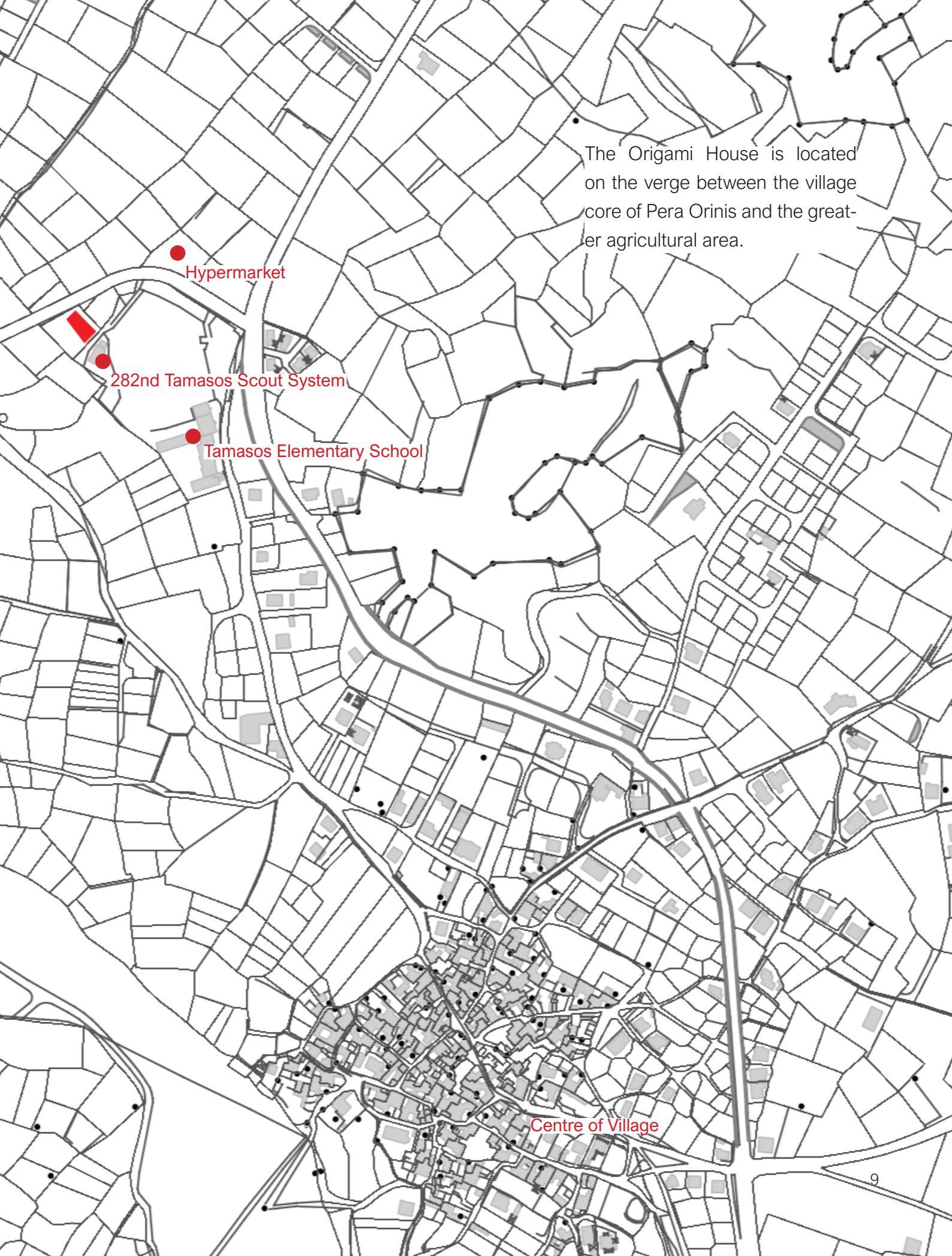
Despite the strong presence of the building in the wider built environment of the area, its pleated surfaces are distinctive enough to make the project a sculpture, which harmonizes with the morphology of the natural environment and the scattered hills of the area.

Particular aesthetic value is enhanced by the play of light and its reflections when it hits the white coloured folded surfaces of the building. This interplay between the building and the natural elements, takes place throughout the entire day, thus providing a great experience to the owners, as well as passers-by.

The proposal is inspired by the Japanese philosophy of “Origami”, which is mainly based on the creation of three-dimensional forms with the help of multiple folding surfaces of paper. There were multiple reasons why the main idea was based on this philosophy. Due to the fact that the owners are lovers of austere Japanese culture, combined with the fact that the sculpting of the volume manifests an architecture of such a philosophy, they were decisive for the design to turn in such a direction.

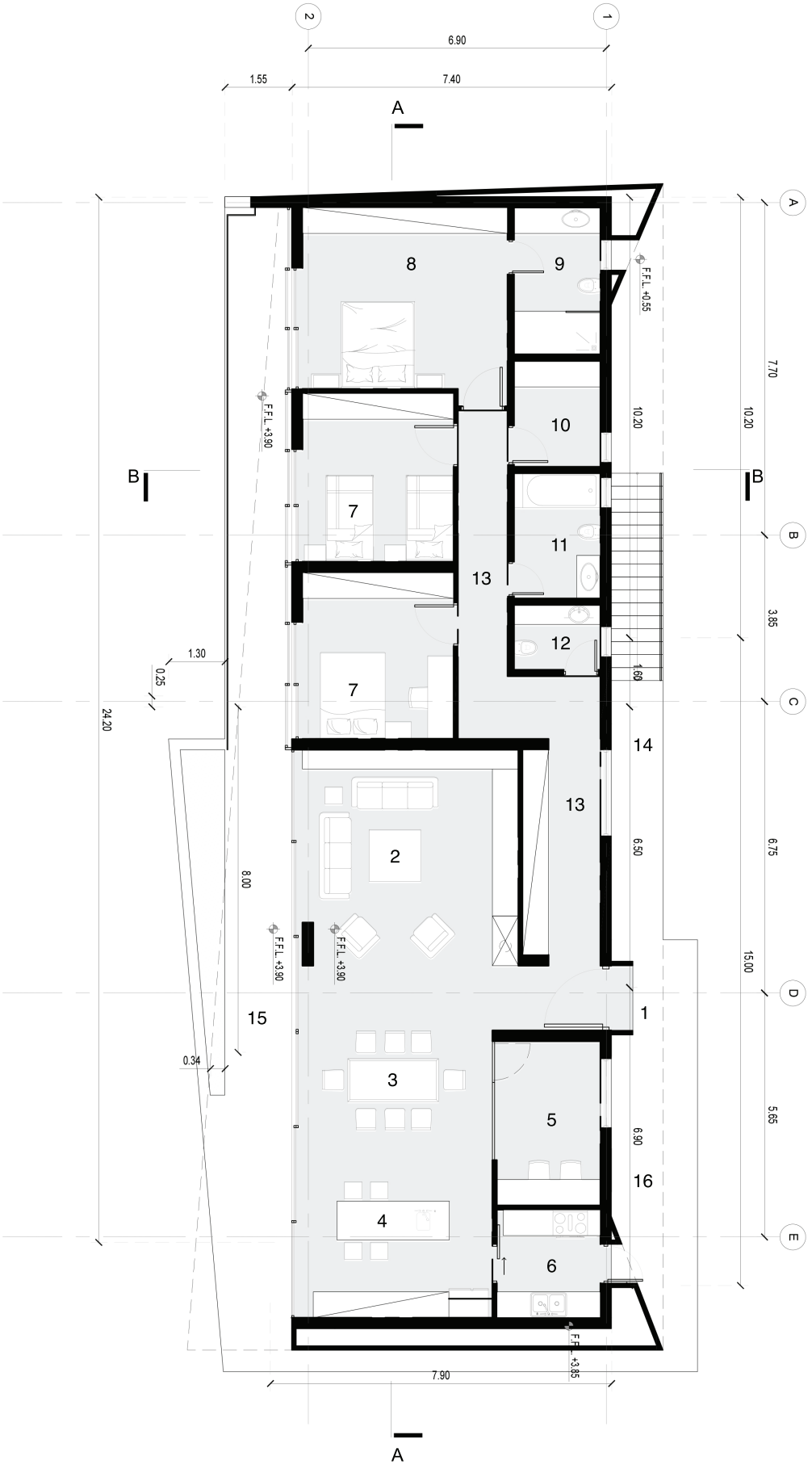
The approach of having a single storey house, while simultaneously acquiring their private spaces on a higher from the ground level, mainly for security reasons, was something that triggered the clients’ interest for a unique design. Their requirement was to have their house in the main topic in the entire neighborhood.

After the initial draft presentation, they immediately loved the design approach and space articulation.


The Origami House is located on the verge between the village core of Pera Orinis and the greater agricultural area.
Hypermarket
282nd Tamasos Scout System
Tamasos Elementary School
Centre of Village

The area's topography consists mainly of a combination of small hills and vast valleys. Within the scenery scattered small-scale houses are distinguished, enhancing its rural character .

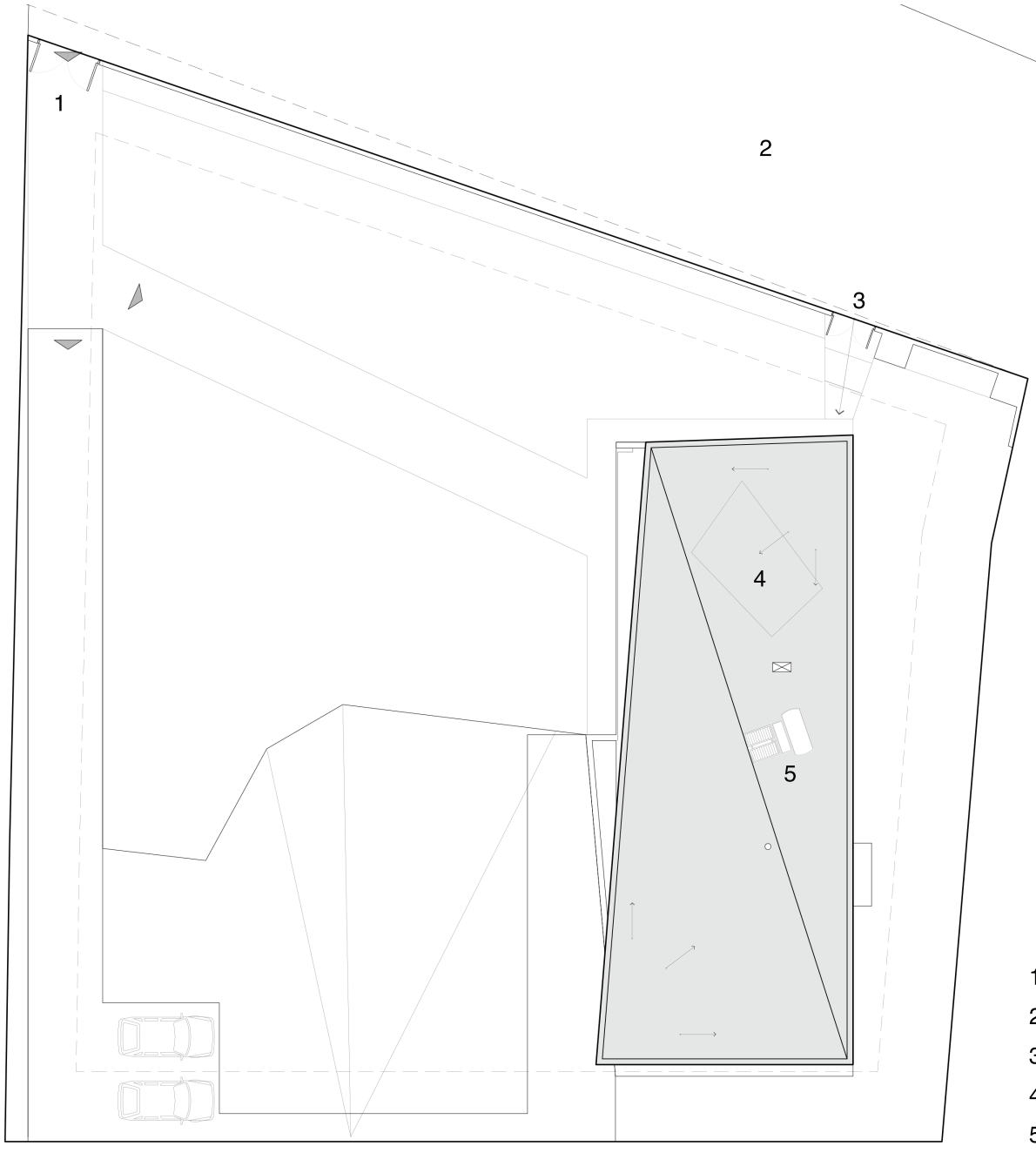
1. Main Entrance
2. Living room
3. Dining space
4. Kitchen
5. Working area
6. Kitchenette
7. Bedroom
8. Master Bedroom
9. Master Bathroom
10. Laundry room
11. Com. bathroom
12. Guest WC
13. Corridor
14. Outdoor stairs
15. Front terrace
16. Back terrace



GROUND FLOOR PLAN

1:100

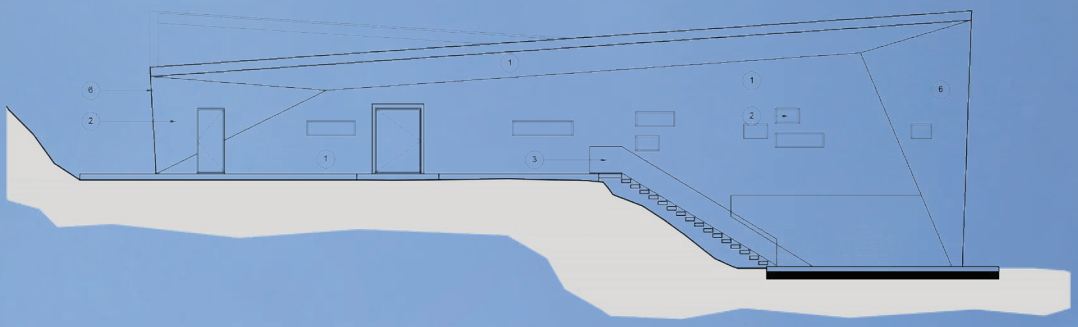
2m 0 2m 4m 6m 8m 10m



1. Vehicle entrance
2. Street
3. Pedestrian entrance
4. Photovoltaic panels
5. Solar panels

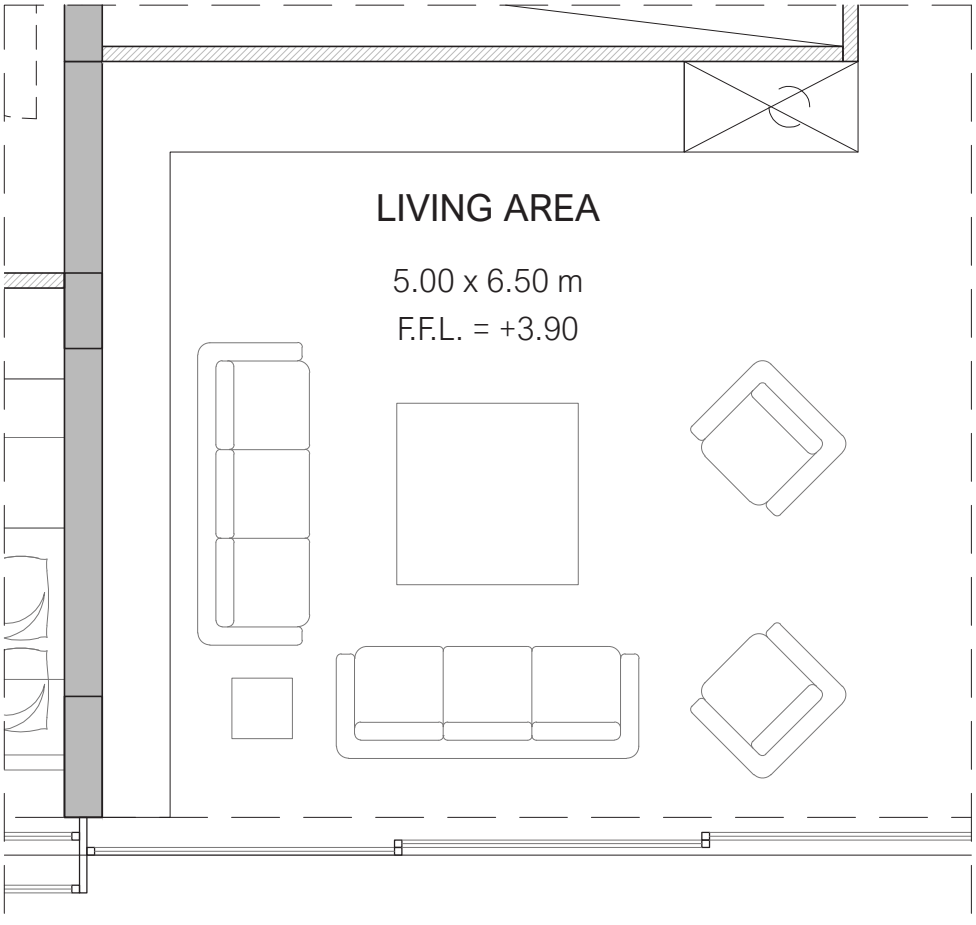
1:200
2m 0 2m 4m 6m 8m 10m

SITE PLAN

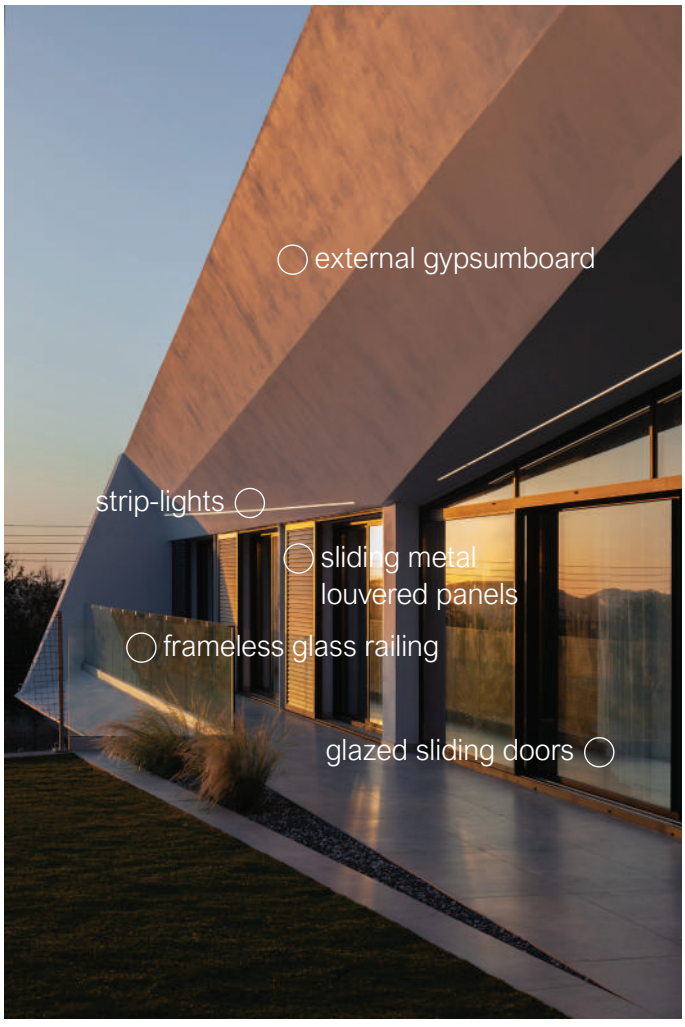


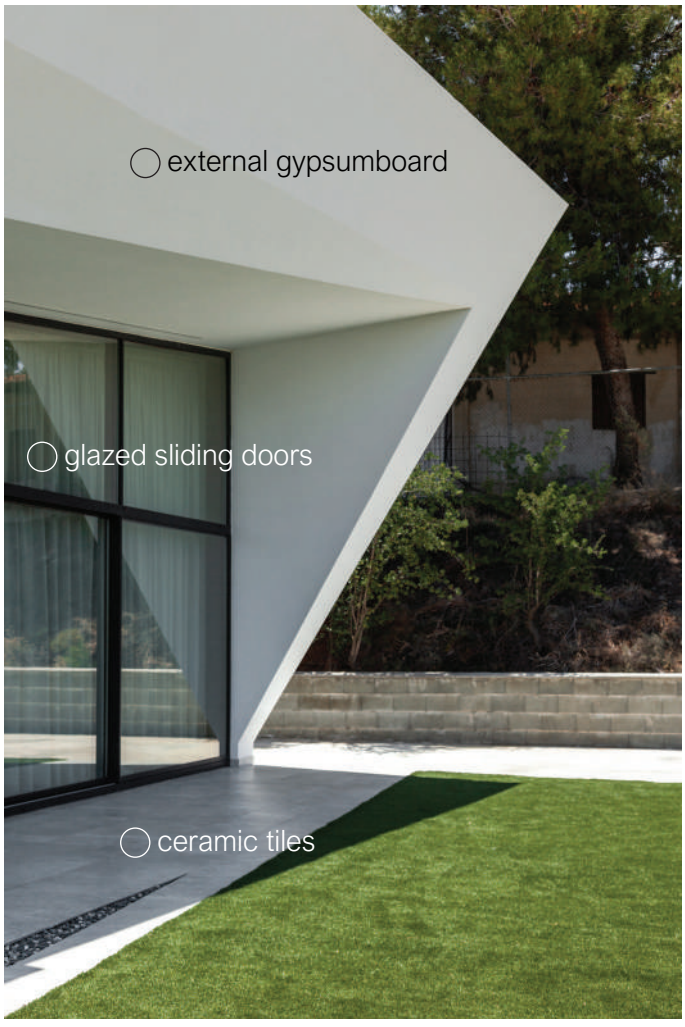
NORTHEAST ELEVATION

1. White colour plaster
2. Aluminium openings
3. Glass railing
4. Cement type plaster
5. Sliding metal panels
6. Gypsumboard for external use


LIVING AREA
5.00 x 6.50 m
F.F.L. = +3.90


KITCHEN / DINING AREA
4.40 x 5.65 m
F.F.L. = +3.90


external gypsumboard
strip-lights
sliding metal louvered panels
frameless glass railing
glazed sliding doors


external gypsumboard
glazed sliding doors
ceramic tiles


external gypsumboard
external glass door
polished concrete

Materials of high thermal conductivity index.

Materials of light colours to reflect the intense sun radiation.

Captivity walls between main structure and gypsumboard. Additional thermal insulation on walls.

Cantilevered roof at south facade / Small openings at north facade.