

Lighthouse

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District of Erdek, Karşiyaka Neighbourhood, Fener Adası Locality	Construction period/date: Second half of the 19th century – Beginning of the 20th century
	Current status: Not in use
GPS: 40°27'42.6"N 28°03'58.9"E	Ownership status: Private ownership
Registration date and number: Unknown	

History

The building was identified as the Agios Andreas Lighthouse and the Fener Island Lighthouse in *Fener Risaliyesi* ("the Booklet of Lighthouses") in 1911, and its construction/repair date is given as 1910. The building's projects, prepared by the French, are in the archives of the General Directorate of Coastal Safety and Ship Rescue Operations. It is known that the lighthouse was repaired in 1946 (Ay 2000, 192).

Architecture

The lighthouse on Fener Island was built to facilitate the passage of ships between the Cyzicus Peninsula and the Mola Islands, which are approximately 3.5 km east of the peninsula (Fig. 1). The lighthouse, which consists of a masonry residence for the lighthouse keeper and a light pole in its courtyard, is located on the northeastern slope of the island, approximately 43 m above sea level (Figs. 2-3).



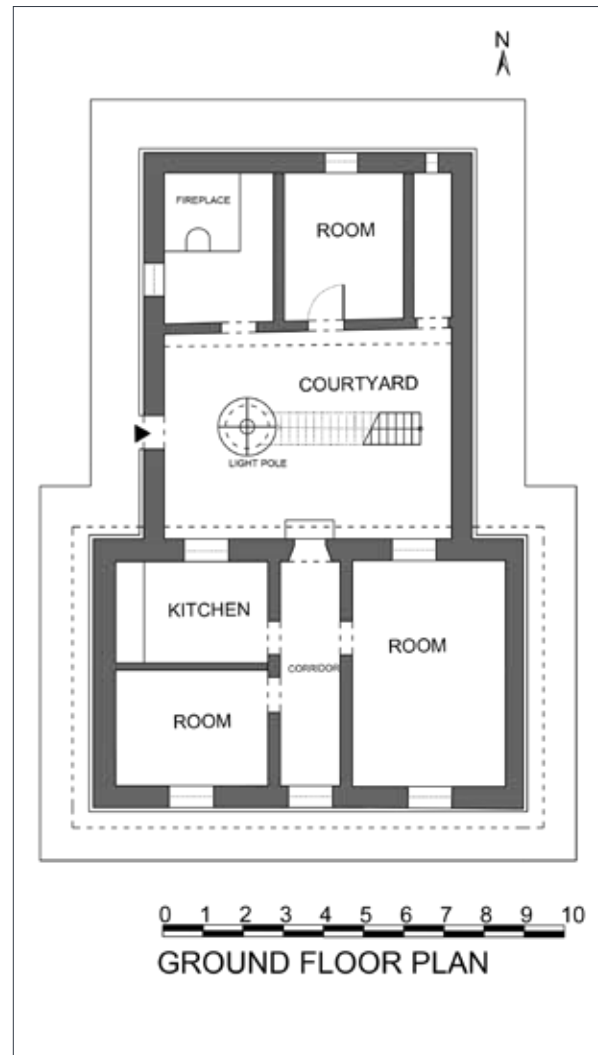
Fig. 1: General view of the lighthouse on Fener Island



Fig. 2: Southwestern façade

The northwestern façade is fairly plain with a view of the hipped roof and blind façade of the residential section, as well as the courtyard wall and the shed roof of the auxiliary unit. There is a door with a depressed arch in the centre of the façade, providing access to the courtyard. A wall base that protrudes by 10 cm runs along all the façades; it is meant to protect the building from external factors. Moulding also runs along the façades at the level of the iron anchors and ties. The south-eastern façade has a similar character to the northwestern one, but it does not have any openings. The southwestern façade has a symmetrical arrangement with three depressed-arched openings. The wall base and moulding horizontally divide the façades. The northeastern façade is on the side of the auxiliary unit; there are not any noteworthy architectural elements apart from two small rectangular windows of the storage and toilet.

The building consists of a rectangular courtyard in the centre, which is flanked by the residence of the keeper and the auxiliary unit (Figs. 4). The residential part slightly extends from the courtyard wall both in the northwest and southwest. The light pole is in the courtyard, 1.5 m away from its door. Upon entering the courtyard through the door on the northwestern side of the building, the residence of the lighthouse keeper is to the south of the courtyard. To the north, there is a fireplace, depot, and toilet (Figs. 4-5). The residential part, accessed by two steps from the courtyard, consists of a long corridor opening to the entrance, kitchen, and two rooms. The kitchen, which is approximately 9.3 m², is in the northern corner of the house with a window overlooking the courtyard. The fireplace



and counter are attached to the northwestern wall. The small room, approximately 10.6 m², is separated from the kitchen by a partition wall. The large room with a size of 20.6 m² is to the west of the corridor. The rooms and the corridor each have only one window to the southwest. Every room on the northern edge of the courtyard has a separate entrance (Fig. 5). All spaces are elevated by a step from the courtyard.

The building's main walls are 50 cm thick and covered with a thick layer of plaster. As it is observed from the damaged area in the western corner, the walls are rubble masonry. The partition walls are 28 cm thick. Solid brick is used in the windows and doors with depressed arches. Continuous iron ties are seen near the level of the eave in the residential section. Ties are fitted to the main walls with anchors. Horizontal cracks seen on the upper parts of the façades and interior walls are caused by the corrosion of the iron ties. The



Fig. 3: Northeastern and southwestern façade



Fig. 4: Courtyard, southwestern façade

cracks indicate the level at which the ties were placed. The steps and the floor of the corridor are made of terrazzo. The residential part has a timber, hipped roof covered with Marseille tiles. The interior spaces have timber ceilings. The auxiliary units have a timber lean-to roof that is also covered with Marseille tiles. All the window and door joineries are made of timber.

The light pole is approximately 12 m high. The iron pole has a hollow cross-section and is about 20 cm in diameter at the floor level; however, its diameter slightly decreases towards the upper end. The pole is supported by a circular plate with a thickness of 55 mm, this plate is anchored to the flooring of the courtyard at eight points. Floor-plate connection is made with bolts that have a diameter of 40 mm. Moreover, four profiled plates of 20 mm thickness are welded to the main plate and the pole to strengthen the plate-pole connection. The pole shaft is composed of two pieces that are interlocked and bolted. At the level of the light there is a circular platform, which is accessed by an iron ladder on the southeastern edge of the courtyard.

Current Condition

In parallel with the automation of lighthouses and the developments in satellite communication systems, the family that kept the lighthouse abandoned the site, which resulted in the deterioration of the building due to negligence. The light pole preserves its original details to a great extent but it is under the threat of irreversible destruction due to severe corrosion, unless repaired soon. Damages are



Fig. 5: Courtyard, northeastern façade

noted on the masonry walls and timber roofs of the lighthouse structures.

Risk Assessment and Recommendations

The lighthouse, which partially preserves its original installations, should be considered as industrial heritage due to its historical, technological, and architectural value, and should be protected accordingly. The building, dating between the second half of the 19th century and early 20th century, is of importance since it reflects the French influence in the design and construction of supplementary structures for navigation, especially in maritime transportation. It is quite surprising to see that the projects prepared in the middle of the 19th century were implemented just as they were designed. The architectural quality and the organization of the residential unit are beyond their age. Furthermore, the original light pole is unique; it is among the rare architectural examples of its type that have survived. The iron light pole should urgently be taken under protection.