

Traditional Architecture of Abu Dhabi: The Summer House of Sheikh Shakhbut

by Jakub Czastka

Introduction

The island of Abu Dhabi, in its modern setting, has few monuments to its long and eventful history. The architecture of the 'arish, coral or stone built house has long since been superseded by that of the modern high rise. This change has gone hand-in-hand with that of a shift in the economic base of the Emirate. Forty or so years ago, the inhabitants of the islands and coastline of Abu Dhabi were mainly participants in a subsistence economy based on the bounty of the Gulf waters, namely fishing and pearling. Today, the economic base revolves around the bounty of the Emirate's oil and gas reserves. If one is fortunate enough to travel amongst the islands of Abu Dhabi, one can still catch glimpses of traditional architectural forms, from the sophisticated examples of the Pearl Merchant's House and Mosques on Dalma, to the simple but perfectly adapted wooden and stone domestic and religious structures on islands such as Merawah.

There remains, however, a single, but little known, example of traditional domestic architecture on the island of Abu Dhabi, between the Eastern Corniche road and Bateen Airport.

Most inhabitants of Abu Dhabi island are familiar with two architectural reminders of Abu Dhabi's past: the Watch Tower by the Maqta Bridge and the Old Fort (*Qasr al Hisn*), adjacent to the Cultural Foundation. Both these structures date from a time when life was very much less secure, as their defensive nature attests. But what of domestic architecture and everyday life? For a rare glimpse into this we must look to the Summer House of Abu Dhabi's former Ruler, Sheikh Shakhbut bin Sultan Al Nahyan.

The building remained little known until recently, since it lay within the security perimeter of Bateen Airport, and, consequently, could neither be seen by, nor visited by, members of the general public. As a result of the shrinking of the perimeter to permit the construction of the Eastern Corniche, however, the building became more easily visible, and both its survival and its significance was recognised by the Abu Dhabi Islands Archaeological Survey.

Location

The structure sits isolated, elevated by a metre or so, above the surrounding terrain on an outcrop of consolidated sandstone that once formed part of an elevated coastal ridge prior to recent land levelling. To the north east is the modern Eastern Corniche, to the south west the airport. Prior to the construction of the Bateen Airport, the building overlooked coastal bays with mangroves to the north east. Until very recently, scatters of oyster shells could still be identified below the building, in some cases accompanied by scatters of Late Islamic pottery, although these have now been covered by landfill. (*P. Hellyer, pers. comm.*).

تقدم الصحيفة وصفاً لفن العمارة التقليدية من خلال أحد المباني التراثية القليلة المتبقية بأبوظبي، وهو البيت الصيفي للشيخ شخبوط بن سلطان آل نهيان بقرب المقطع.

Today the shoreline has migrated several hundred metres to the north, and the old shoreline, visible until 1995, has disappeared.

Description

The building was identified to ADIAS by Sheikh Nahyan bin Mubarak Al Nahyan as a Summer House used by Sheikh Shakhbut and his family. It is a building consisting of three separate rooms, entered from doorways on the north side, which also opened onto a covered veranda, now gone (*Fig. 1*). Unfortunately, there are no direct exposures of the actual foundations of the structure. However, a low wall (the number of courses of which are obscured by rubble and sand deposits) runs the complete outline of the building (*see Fig. 1: the unfilled line*) and probably represents a foundation wall. All the subsequent columns and walls are built directly on top of this wall.

The building is a maximum of 19m long by 3.75m wide, where the walls stand on average to a height of 2.5m, moving up to 3m at the east and west facing walls (representing coursing which would have been laid over the walls and roof supports). Each room is approximately 6m long, while the thickness of the walls and columns is in the range of 0.40-0.45m.

None of the rooms are adjoining, all are separated by off-set columns placed perpendicular to the main walls (*Fig. 2a*) and roughly equidistant from the eastern- and western-most facing walls. Two of the doorways (to the easternmost rooms) are clearly distinguished because all other gaps between the columns have the upper half of their length blocked by plastered beachrock panels supported on wooden palm trunk lintels, both on the north and south facing walls. This is augmented by the fact the outward facing corners of these 'doorways' have been squared off by plaster as if to allow a large panel or doorway to be placed there. No grooves, however, are apparent at the top or bottom of these squared plaster corners from which permanent wooden door hinges could be placed, although this may be a product of poor preservation (only part of the plaster

work on these corners still survives).

The westernmost room is in the poorest condition, and presents a problem regarding the identification of the entrance (Fig. 2b). The columns at the south western corner of the room have fallen leaving only the bases, whilst the north facing wall columns are clearly unstable, visibly leaning southwards. Of the four gaps between the columns, only the easternmost example is blocked, by a wooden lintel supporting beachrock panels. The other three are open, with only recessed ruts either side of these gaps immediately below the upper door-frame lintels, some seven to eight centimetres square (not that both the other room's doorways have these squared recesses just below the door-frame lintel). The function of these recesses is probably similar to that of examples from summer houses in the mountains of Ras Al Khaimah where these recesses support-

ed the upper frame of the actual doorway and secured the door frame to the columns, the gap between these and the next lintel being left open to allow air to circulate (see for example Photo 4, p 53 in Dostal, 1983).

In addition to the room, the structure once exhibited a covered veranda on the north side. Although no longer clearly visible today, it reveals itself through several clues. Firstly, there is the fact that the north facing wall at its east and west ends has the remnants of a platform projecting some 2m outwards, although this platform is obscured within the central area. Secondly, the north facing columns have small recesses placed c.0.30m down from the top of the walls, all plaster lined, c.0.06-0.08m square (not present on the south facing wall). These were almost certainly placed there so wooden supports could be suspended from these recesses, allowing for roofing to be overlaid. Following on

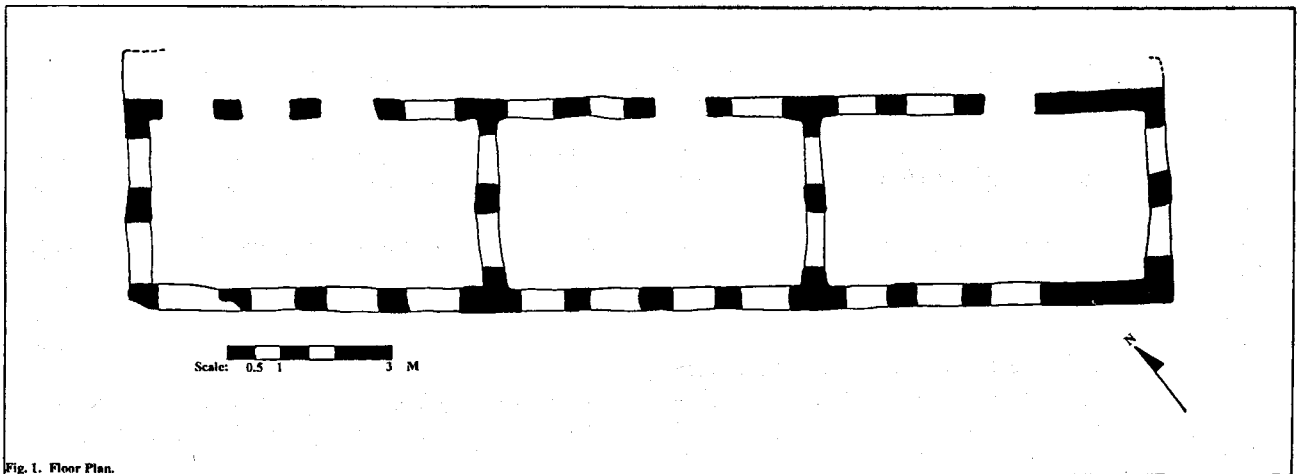


Fig. 1. Floor Plan.

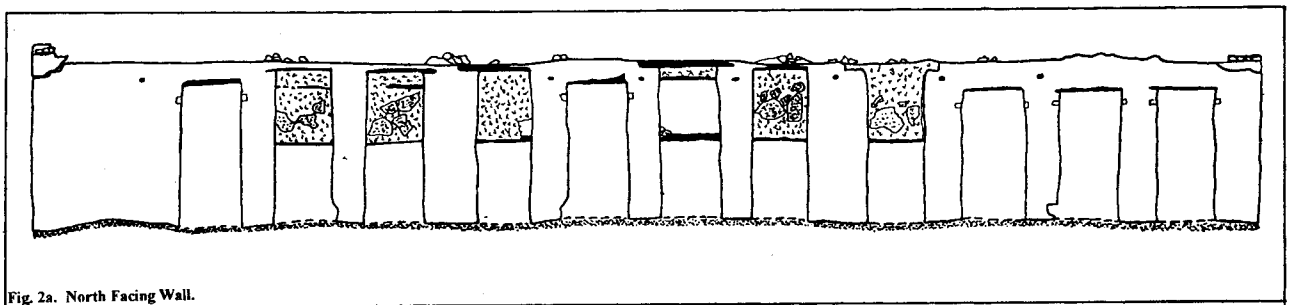


Fig. 2a. North Facing Wall.

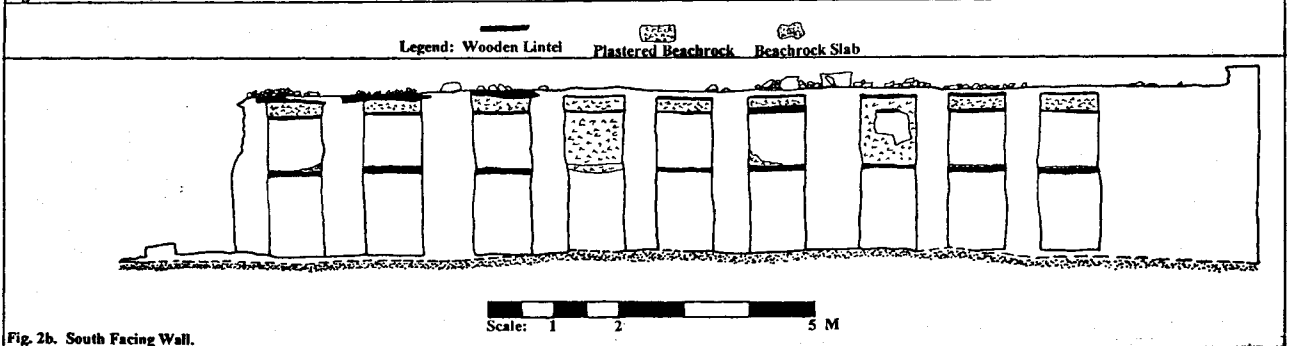


Fig. 2b. South Facing Wall.

from this is the observation that several fallen columns are found on the north facing side. All look as if they fell leaning towards the south, besides which there is no evidence that these columns were part of an additional room, suggesting these columns supported the wooden supports projecting from the still standing north facing wall. The north facing placement of a veranda would have made optimal use of the prevailing north to north westerly winds.

The standing walls and columns are constructed of roughly hewn blocks of sandstone coursing. These blocks form the face of the walls and the edges of the columns which have been 'squared' by using larger, more regular blocks. The facing and squaring blocks vary between 0.11-0.22m in length and 0.11-0.15m in width. The core of the walls and columns can be described as a rubble one, since far smaller and more irregular blocks are used, 0.05-0.10m long and wide. This primary constructional method reveals a line of blocks, regular on the outside, moving towards irregular and smaller forms within the core, perched on top of a light buff brown mortar.

All columns are free standing and are built directly on top of a 'foundation' wall running around the outline of the building. They stand to a height of c.2.5m, varying in width between 0.8-0.5m. These columns are linked together by wooden lintels placed on top of the coursing which was subsequently plastered. The only areas which can be described as walls are found at the corners of the building, except the south western one where this has fallen down. These walls square off the corners of the building and act as the first recipients of abutting lintels linking columns.

The mortar (or plaster) is an aggregate of ground gypsum and medium coarse sand acting as the basic matrix, plus very frequent inclusions of gypsum flecks through to fragments, with occasional medium to small fragments of charcoal. This mortar acts both as a foundation upon which blocks are placed, as well as a capping deposit upon which other courses are laid. The joints between blocks are very irregular in thickness, varying between 5-45 millimetres. Where it is still visible, the face of the walls and the coursing was evenly rendered with plaster. Courses are between 0.14-0.18m in thickness (measured from the base of the underlying plaster to the base of the overlying plaster).

At least two, or more usually three, wooden lintels are set directly into (and between) the walls of the columns at various heights. These occur mid-way up the columns on non-doorway columns, roughly 1.10m from the base of the columns. All gaps between columns have lintels at 0.40m below the top of the column walls, as well as overlying the columns at the very top. These uppermost lintels are directly overlain by plaster, over which the roofing is laid (see below). The wood used for these lintels is palm trunks sawed into fairly regular forms, usually 1.5m long by 0.12 metres wide. To allow for the thickness of the columns, three lintels are usually laid adjacent to one another, the overhang into the walls being incorporated into the coursing.

The lintels placed roughly halfway up the length of the columns all had beachrock panels set up between them and the next set of lintels above, although not all have

survived. These beachrock panels consist of four or five beachrock slabs selected for a close fit, filling a space c.0.90 by 0.80m. These slabs were bonded by gypsiferous plaster, later rendered by the same plaster, both on the inner and outer face. The gap between the bottom of this supporting lintel and the coursing running along the base of the columns seems to have been left open since no evidence exists of any constructional features to suggest any lining or panelling. However, the fact that these gaps may at one time have been lined with some form of cover cannot be discounted. Further north, in Ras Al Khaimah, summer houses are known to have had such open panels, but in reverse. Here, the lower part of these "windows are covered with a lattice-like wickerwork of sticks of date-palm branches above which further large, rectangular or square spaces are left in the walls (Dostal, 1983; p. 24)." This form of open construction allowed for the circulation of cooling winds during the hot summer months.

Only the east facing wall has any evidence of roof construction. This consists of a split bamboo frame (c.35 millimetres wide) laid in a criss-cross lattice pattern, over which a closely woven palm mat was laid. This roofing was laid directly over the uppermost plastered wooden lintels adjoining the columns and subsequently overlain by a coursing of rough hewn sandstone blocks, which was again plastered. This overlying coursing is only clearly visible at the east facing wall, although other areas of the columns and walls still show the remains of this roof coursing in the form of rubble.

Discussion

The structure as a whole is in need of urgent repairs to most areas. At the request of Sheikh Abdulla bin Zayed Al Nahyan, Minister of Information and Culture, an architectural / archaeological report on the building has been prepared by the author, on behalf of the Abu Dhabi Islands Archaeological Survey, for submission to the Abu Dhabi Municipality, which is responsible for the area in which the building is situated. The intention is that the building should be restored, although at the time of writing, work, other than a fencing of the site, had not been commenced.

The full extent of the distribution and the architectural variety of buildings on the island of Abu Dhabi from the pre-oil era is currently visible only through an examination of old photographs, which date primarily to the period from the 1940s to the 1960s. The fact that the Summer House of Sheikh Shakhbut is one of only three such buildings left on the island, (the others being the Maqta Tower and the Qasr al Hisn), is, alone, sufficient to justify its preservation.

References

Dostal, W. 1983. *The Traditional Architecture of Ras al Khaimah (North)*. Wiesbaden: Reichart.

J. Czastka,
Abu Dhabi Islands
Archaeological Survey, ADIAS,
P.O. Box 45553,
Abu Dhabi, U.A.E.