



REALISATION OF CONCEPTS

## DESIGN THEORY

GLOBAL  
INFLUENCE  
THROUGH MEDIA

Previously in the chapter on Islamic Architecture, the mosque was described in detail both in terms of geographical situation as well as symbolic influence. Today through the use of mass media, the diffusion of ideas on a global scale has made it impossible to build or design in a 'purely regional mode', architects are influenced by both international trends and local traditions. (Frishman & Khan 1994; 254)

IDEA OF  
ASSIMILATION

Furthermore the current context of the Islamic world today; its political and social status quo, has not yet been considered. Today within the western world, as well as other parts of the non - Muslim world, the idea of **assimilation** has developed. Governments feel that Islam and Muslims are a hindrance to progress, they feel the religion as well as its adherents need to be changed, assimilated, diffused into their particular cultures and way of life. It is now common for the architectural brief of a mosque to state that the **building should not look like a mosque.**

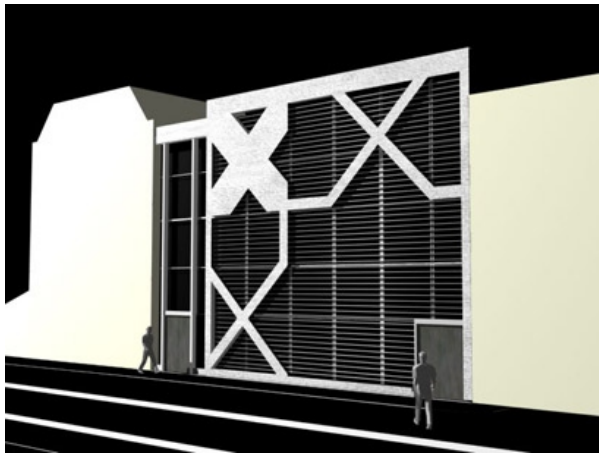
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realisation of concepts



147 - The Assyafar Mosque (cited April 2007 [www.archnet.org](http://www.archnet.org))

The image to the left - The Assyafar Mosque in Singapore, was designed by Forum Architects. The architect states that the design of the mosque had to fit comfortably in a multi cultural and multi religious country, according to the architect the Cities high population density and ethnic complexity called for a mosque that did not really resemble a mosque, but yet at the same time **signaled** to the Muslim community.



148 - The Hackney Mosque (cited April 2007 [www.archnet.org](http://www.archnet.org))

The image is Hackney Mosque in London, 'Makespacearchitects' chose to enlarge and abstract a geometric tiling pattern from the Al-Hamraa<sup>1</sup> in Grenada, and use it as a decorating device for the facade, according to them '*thus maintaining a connection to Islamic Architectural History*'.

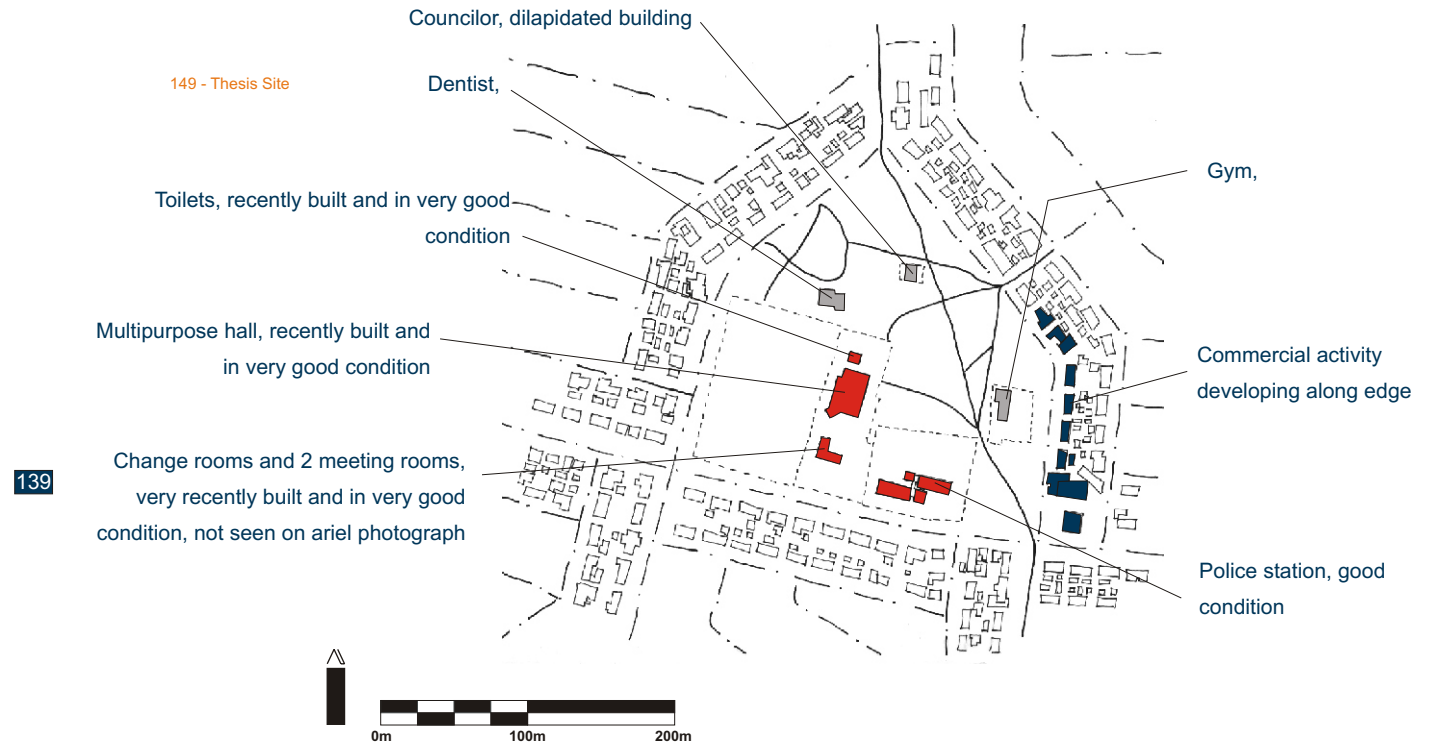
Contemporary Mosque architecture is dominated by this idea of assimilation, this thesis is of the opinion that a mosque needs to be a mosque, it should not have to hide behind a confusing form somehow signaling to its users its function. We have already seen the importance of the Arabic language in Islam, and its ability to unify Muslims across the globe. A mosque is not merely an architectural expression, it has historical, political, social, and moral undertones.

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This thesis identifies two fundamentals in Mosque architecture; *architectural identity*, and *contextual relationship*. The primary role of its architecture should be legibility, the mosque should explain to its users the **unity of society** (no division between secular and religious aspects) which Islam achieves, something that the west has been unable to manage. It should present religion as part of daily life and not detached from the everyday. It needs to express its function allowing views into its different spaces. Uplifting its community both socially and financially.

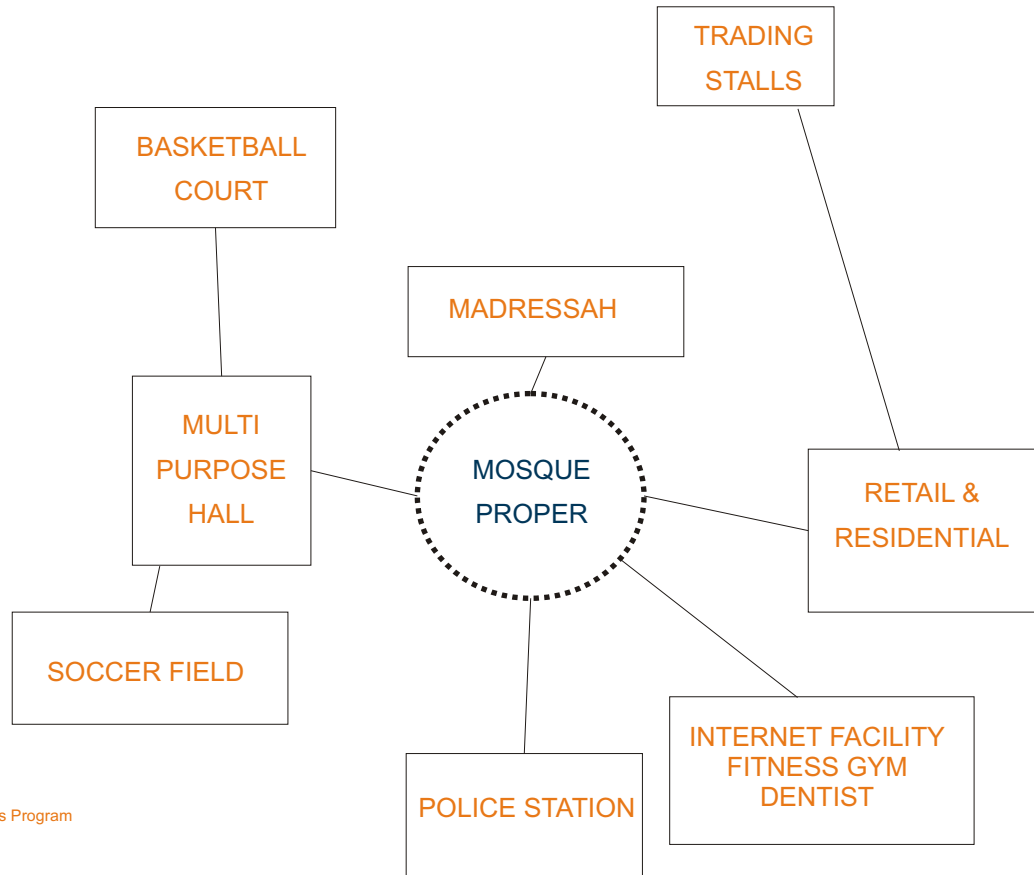
1. *Al Hamraa*: Often spelt as Alhambra, however the Arabic name has no 'b'.

## PROGRAM & ARCHITECTURAL RESPONSE



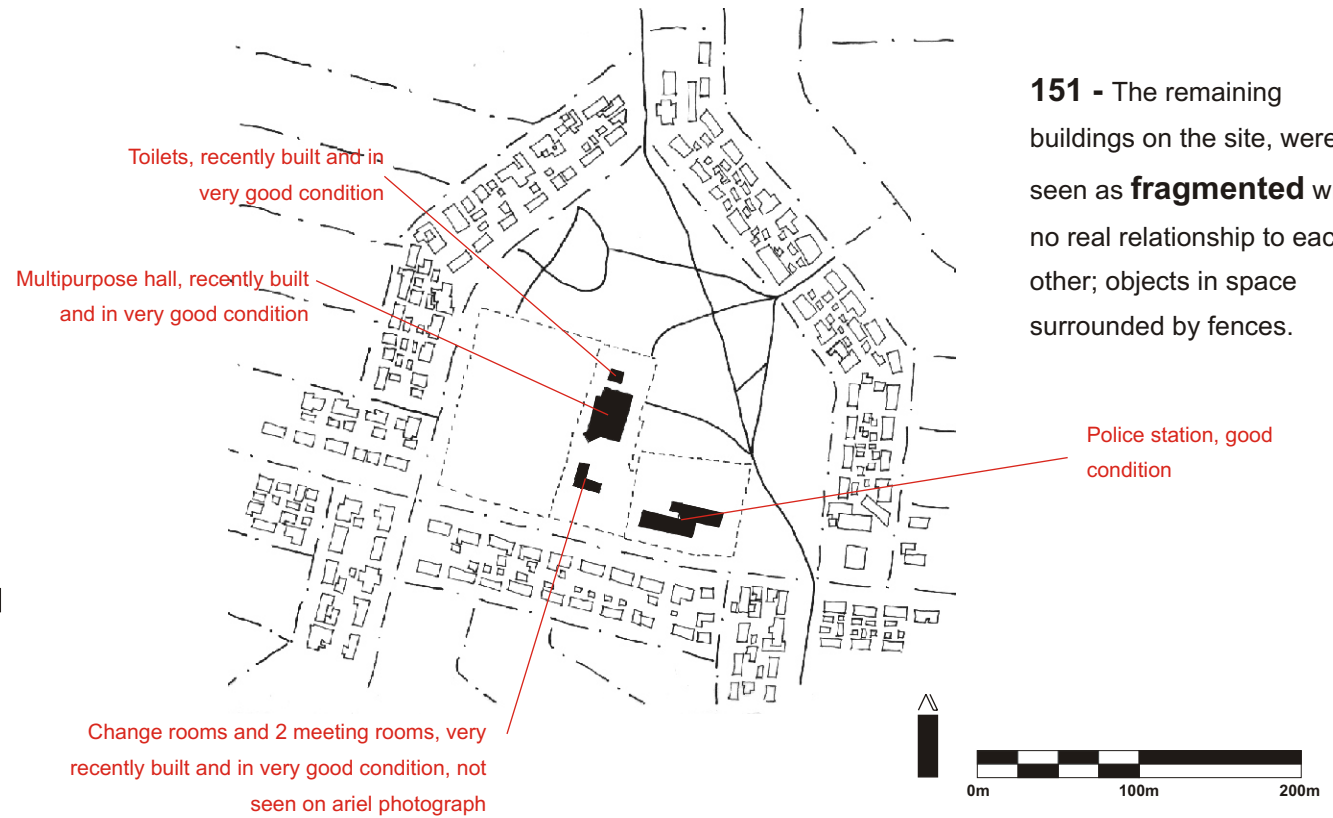
The mapping above shows the site chosen and the existing buildings on site. The dentist building, the gym, and the councilors house are in bad condition and in need of repair. This thesis has chosen to demolish the above mentioned buildings and incorporate their functions within the program, the buildings in good condition have been kept. Also a commercial component to the program has been included so as to **mirror the existing condition** on the adjacent plots.

The diagram below shows the site program, with the Mosque at its **center**. The Mosque and Madressah complex being the **anchor** of this site, will be addressed in greater detail than other buildings on site. However the entire site is to operate as a unified whole, **independent** in terms of building function but **interdependent** in terms of spatial and architectural configuration.



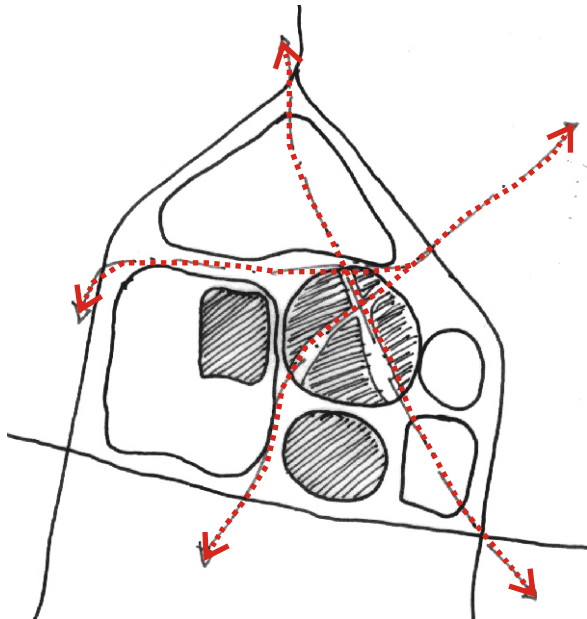
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realisation of concepts



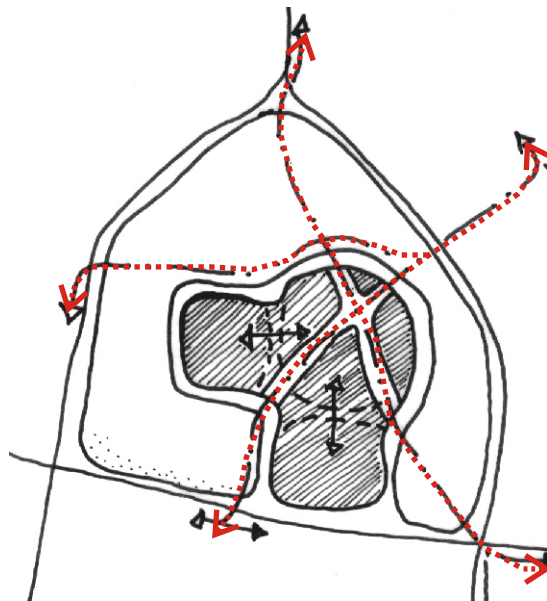
**151** - The remaining buildings on the site, were seen as **fragmented** with no real relationship to each other; objects in space surrounded by fences.

Using the concept of **Unity** in Islamic architecture, as well the principle of **Ubuntu**; *the community as priority over the individual*, the placement of any new buildings on the site would need to create a **unified whole**. The importance of buildings would be seen by their **placement** and relation to the whole.



152 - The current situation on site is that of pockets of space, criss-crossed by footpaths. These spaces are detached from each other as well as the surrounding residential fabric.

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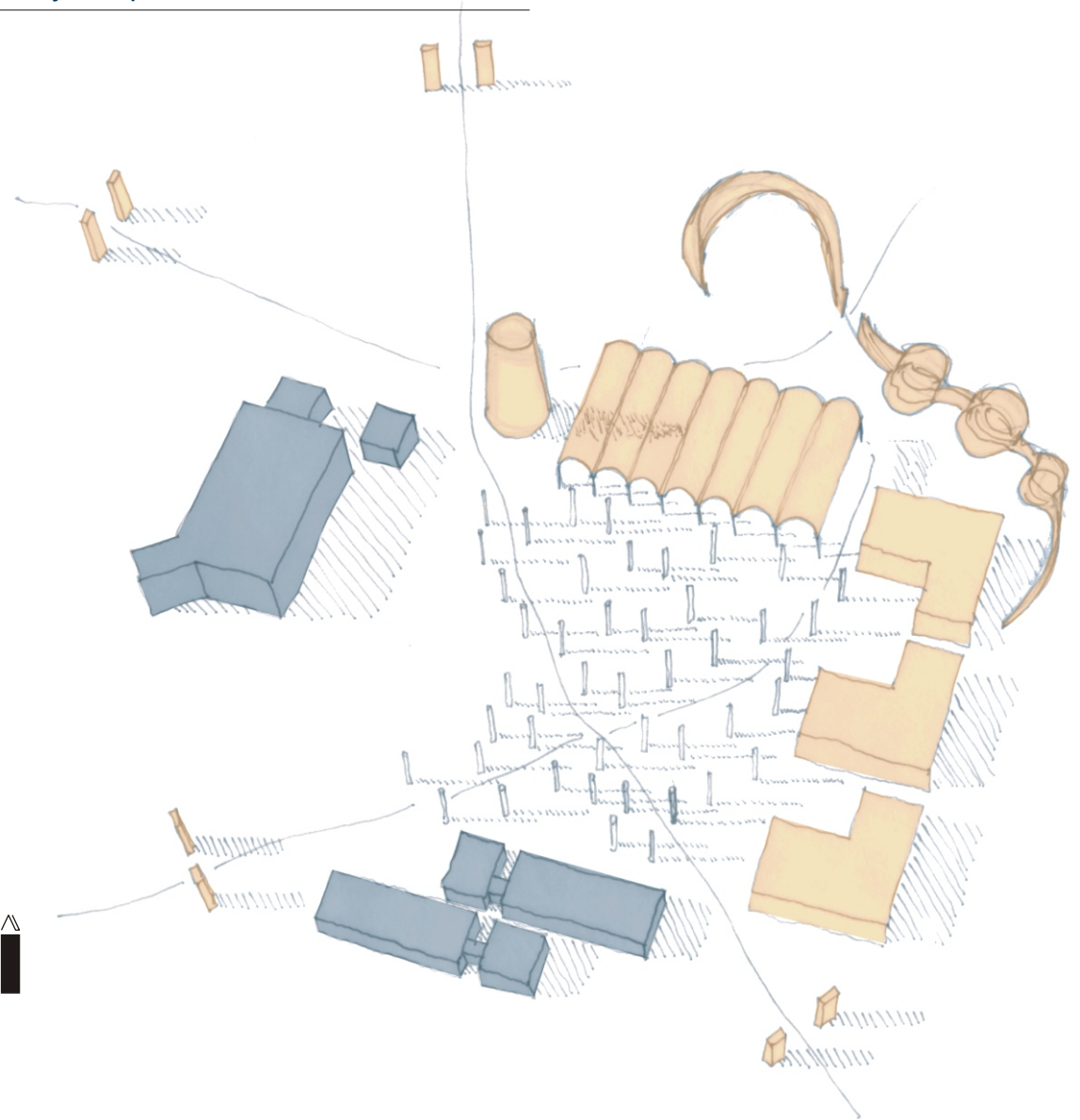


153 - This thesis aims to combine these spaces in a meaningful way creating a community complex accessible to a variety of users. The existing movement lines will also be respected as far as possible.

realisation of concepts

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The gray buildings to the left indicate what is existing, and the orange what is proposed. The pathways that exist on the site have been retained, and are accentuated by gateways.

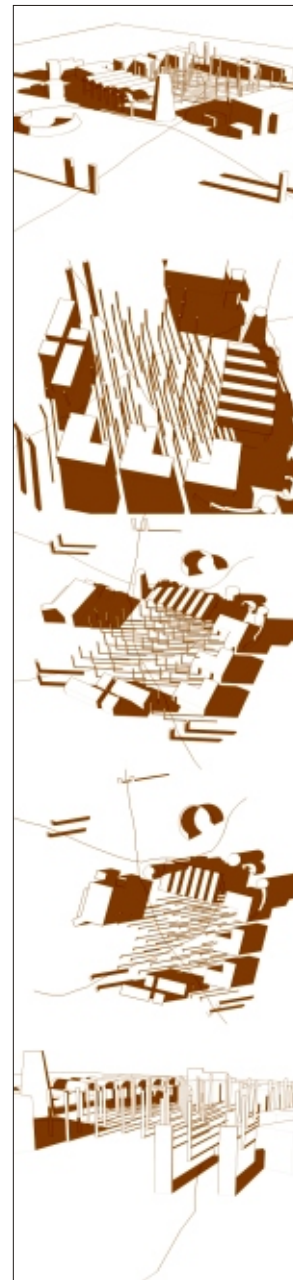
The initial concept shows a vertical element; landmark that recalls Walter Sisulu Square in Kliptown and the Credo Muthwa Village in Orlando, to be used as a minaret.

The mosque proper will have 7 vaults symbolising the seven heavens above, over a raised platform used as a prayer area.

The courtyard space in the center is dotted with free standing columns on the same grid as the Mosque structure, their shadow indicating the times of prayer as well as the forbidden time of prayer; noon. They also represent the number 1 and the letter *alif* of Arabic script, symbolising the oneness of God.

The three buildings to the east will be where the gym, dentist, and internet café are housed. The space between these buildings will frame views into the central courtyard.

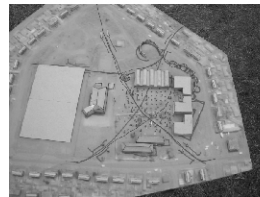
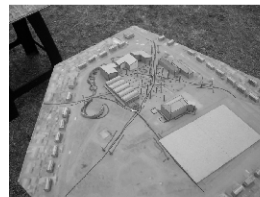
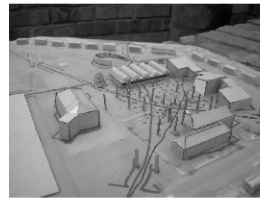
Informal Traders will be allowed to trade along the paths up until and not including the central courtyard, taking advantage of days like Friday where numbers of worshippers will be high.



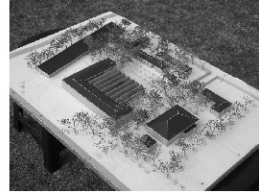
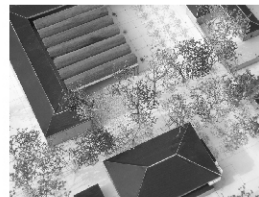
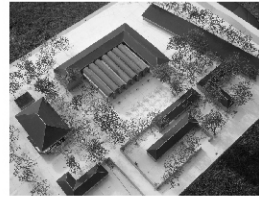
## DEVELOPMENT OF THE ARCHITECTURAL RESPONSE

The following section outlines the growth and refinement of the initial concept, and has been divided into 5 stages. Each stage will be discussed, describing its development from the previous model, thus providing an account of the journey this thesis took in reaching a final solution.

Stage 01.



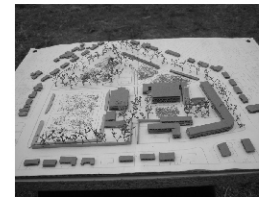
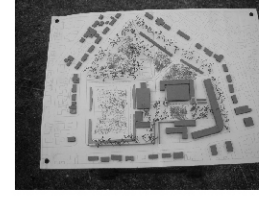
Stage 02.



Stage 03.

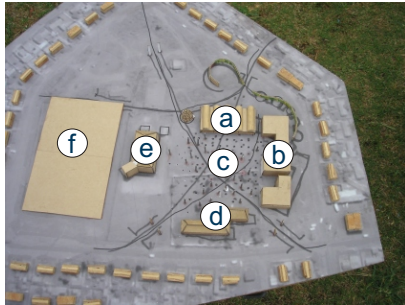


Stage 04.

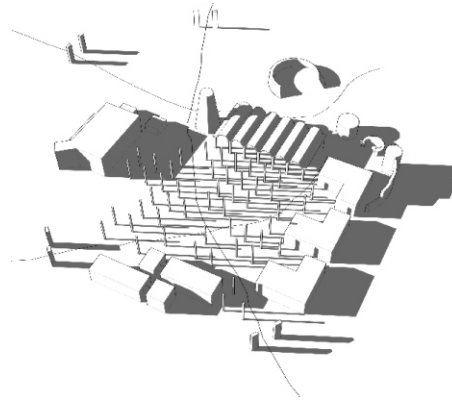


Stage 05.

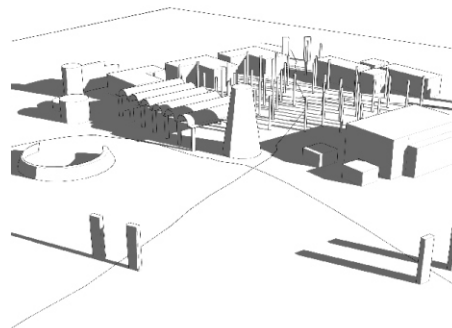




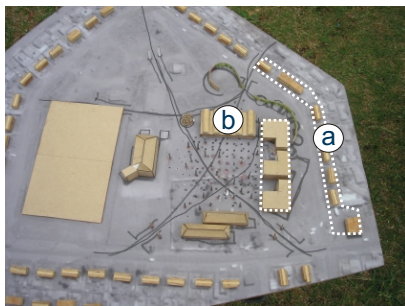
- a . Mosque
- b. Dentist, Shops, and Gym
- c . Courtyard
- d. Existing Police Station.
- e. Existing Multipurpose Hall
- f. Existing Soccer Field



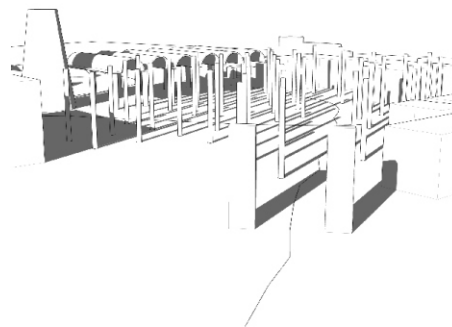
Courtyard used as binding element, with existing and new buildings surrounding it. The courtyard unifies the buildings on site. Existing pathways have as far as possible been respected, with informal trade activating the pathways up until and excluding the courtyard.



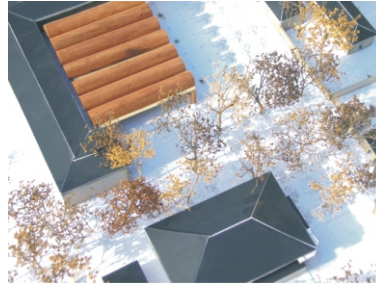
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- a. The commercial activity that has developed along the edge of Bona Street, is mirrored by the new buildings on site.
- b. The mosque is a vaulted structure, contrasting its environment.



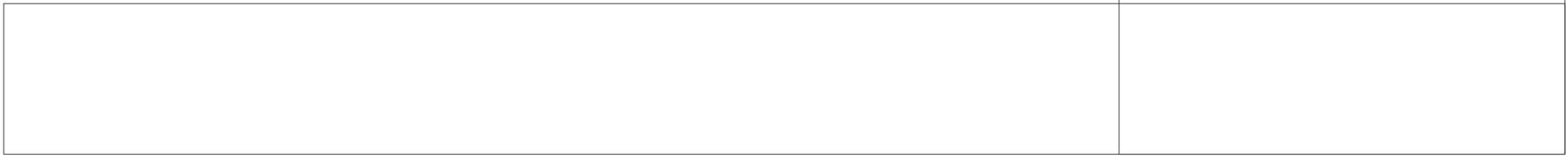
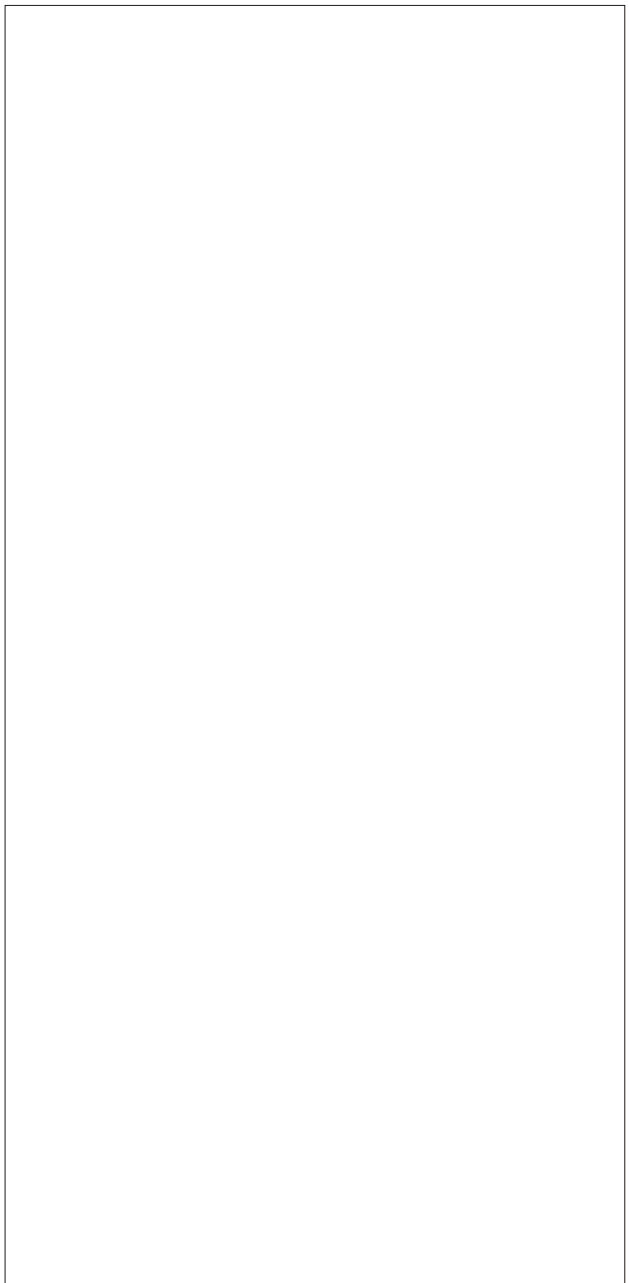
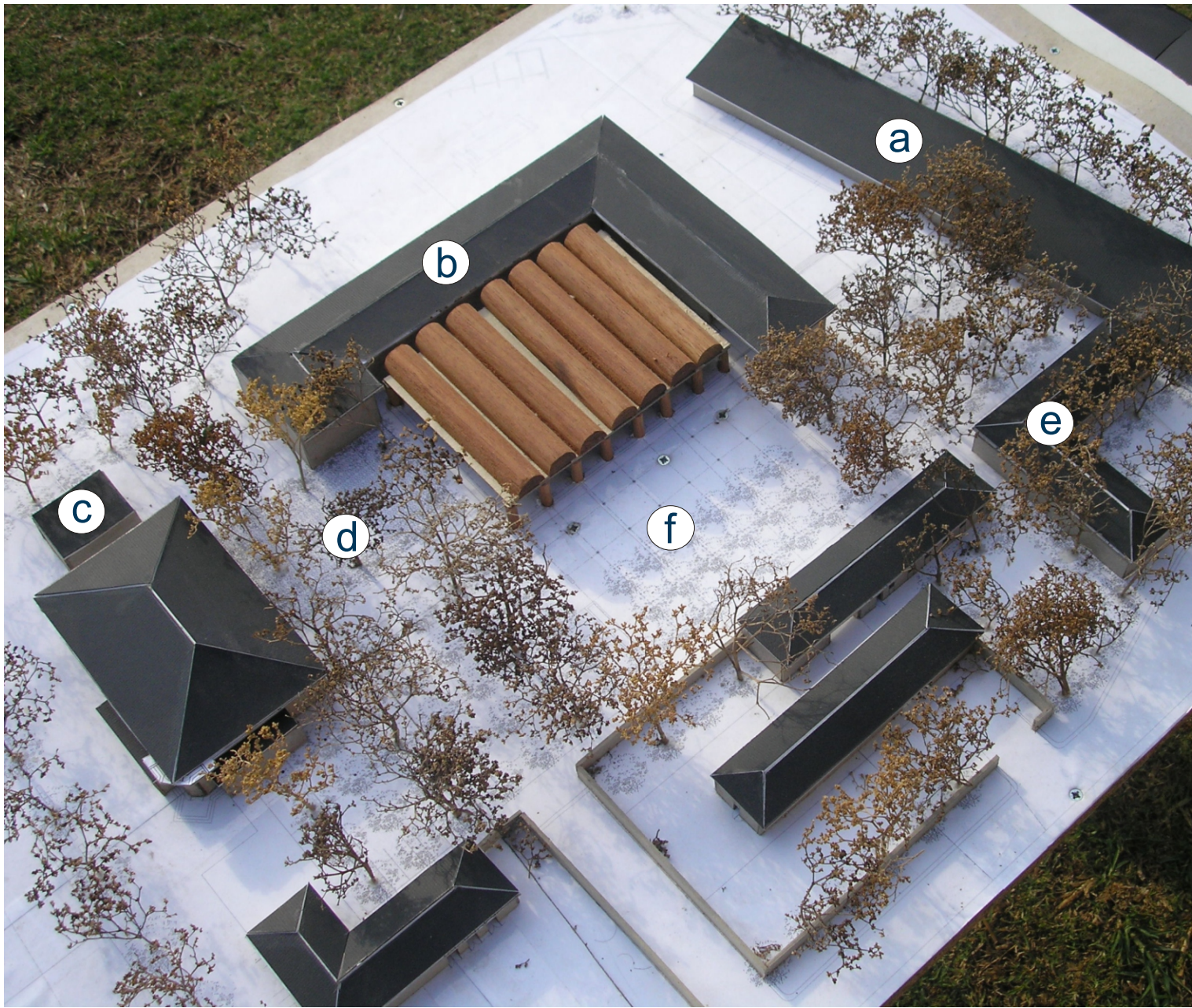
realisation of concepts

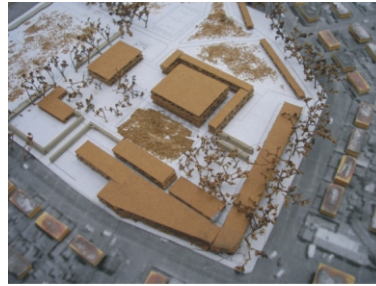


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realisation of concepts

- (a) Edge defined by single story line of retail shops mirroring the situation across the street.
- (b) Introduction of Madressah complex wrapped around the Mosque. The complex is 2 levels high with classrooms on the ground floor and accommodation on the upper level.
- (c) Existing toilets retained, building has just recently been constructed.
- (d) Court between multipurpose hall and mosque acting as spill-over space for sporting functions, weddings, and other activities that take place in the hall.
- (e) Extension to police station
- (f) Courtyard remains binding element of the design, but has now been divided into three, the western most part as a tree lined car park, the central portion as a open grass court, and the eastern most portion characterised by trees, water, and





(a) Introduction of trading stalls that flank a paved pathway from the north of the site down towards the south.



(b) The width of the Madressah complex is narrower, but still remains 2 levels high.

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(c) The retail component of the site is taken around the bend on to Legwale Street. The building is no longer a single story structure but now has apartment units on the second floor.

realisation of concepts

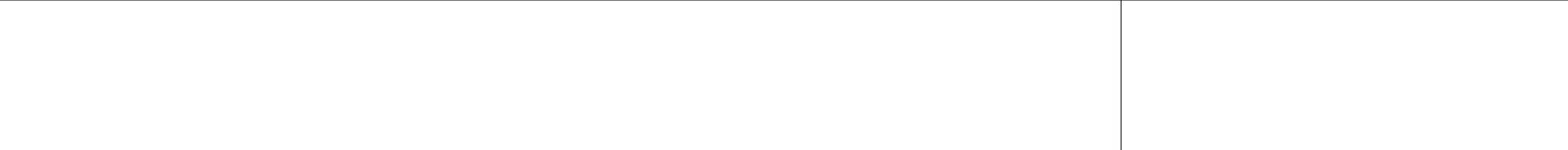
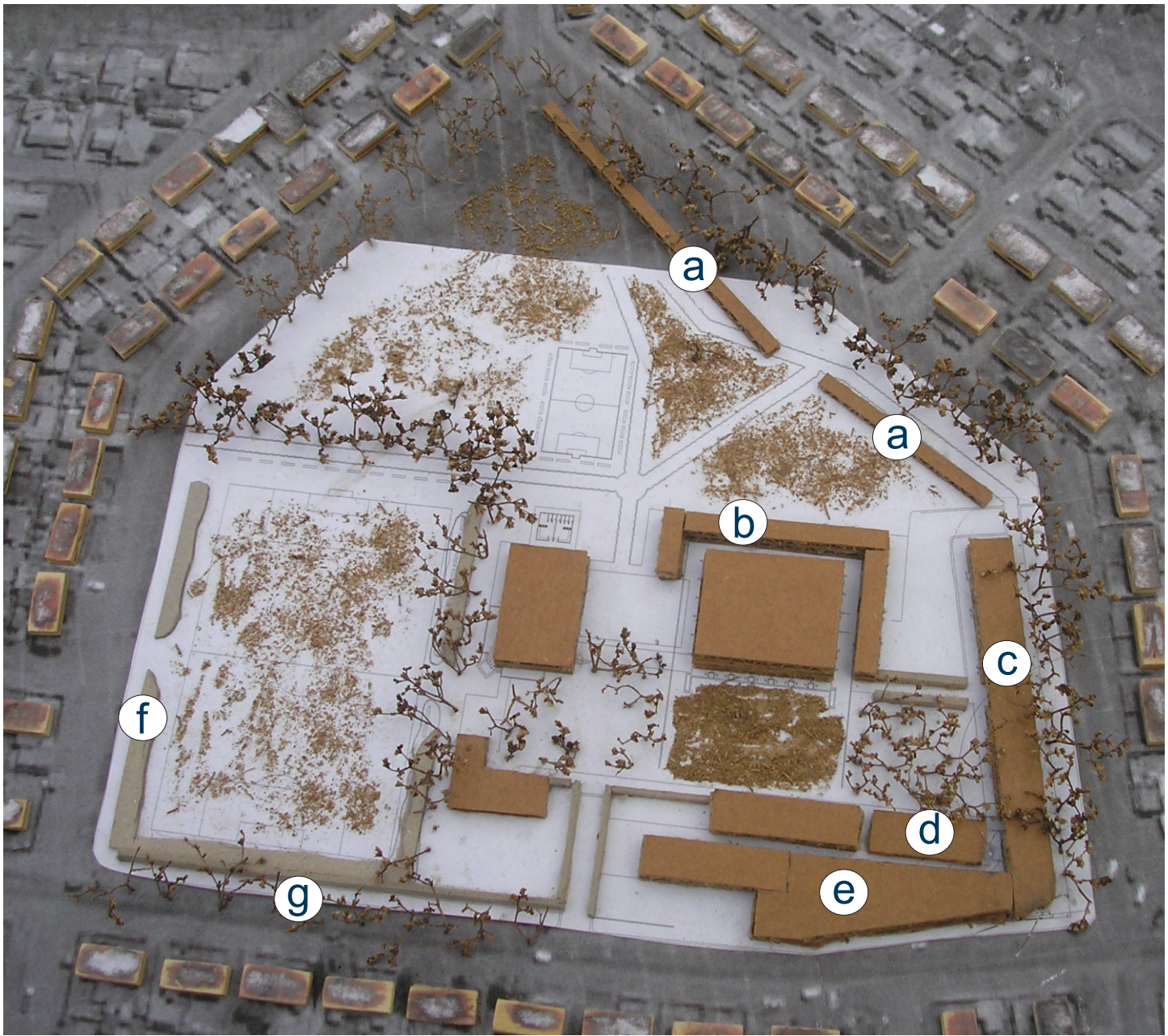


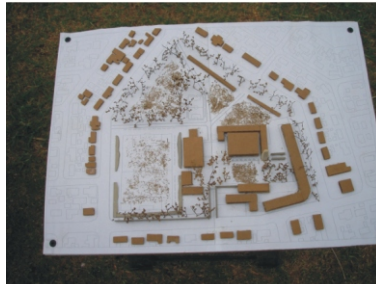
(d) Single story building housing classrooms

(e) A hard edge to the street is created, with shops on ground floor and apartments above.

(f) Embankments used as seating for supporters.

(g) Street edge activated by informal traders operating against wall, with pedestrian movement along tree lined pavement.





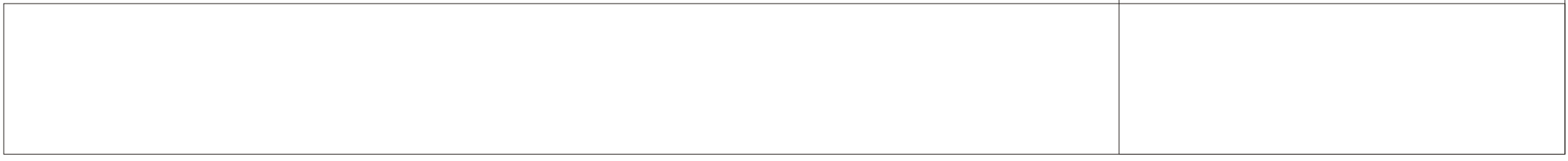
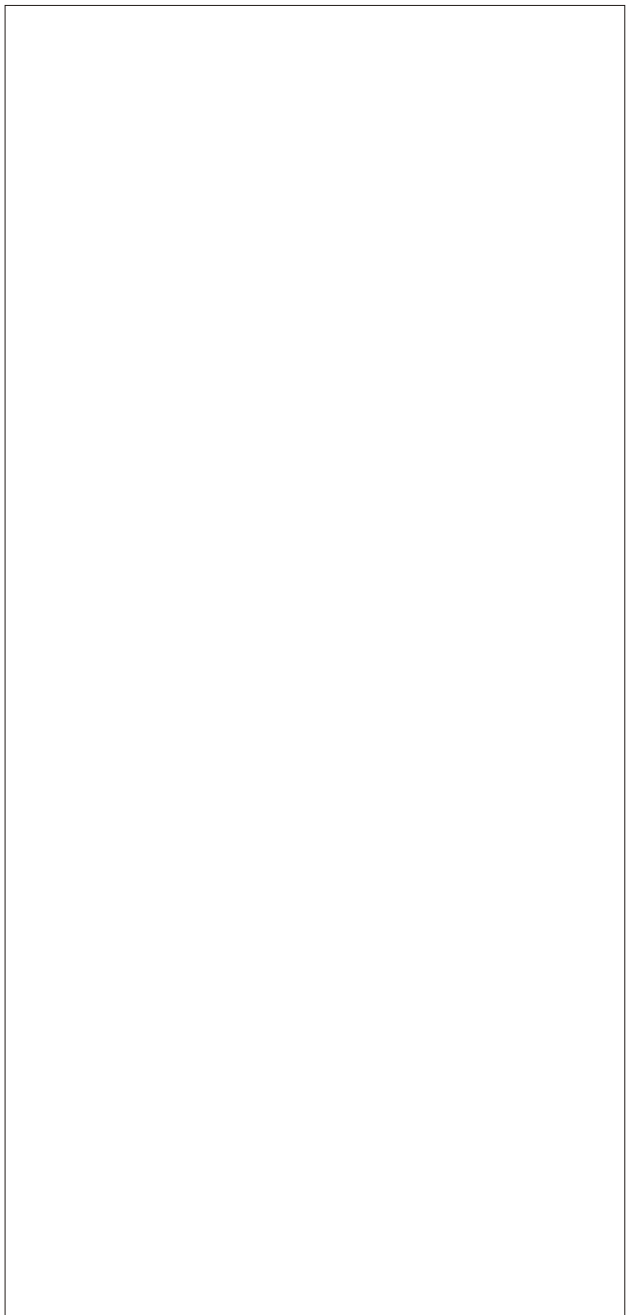
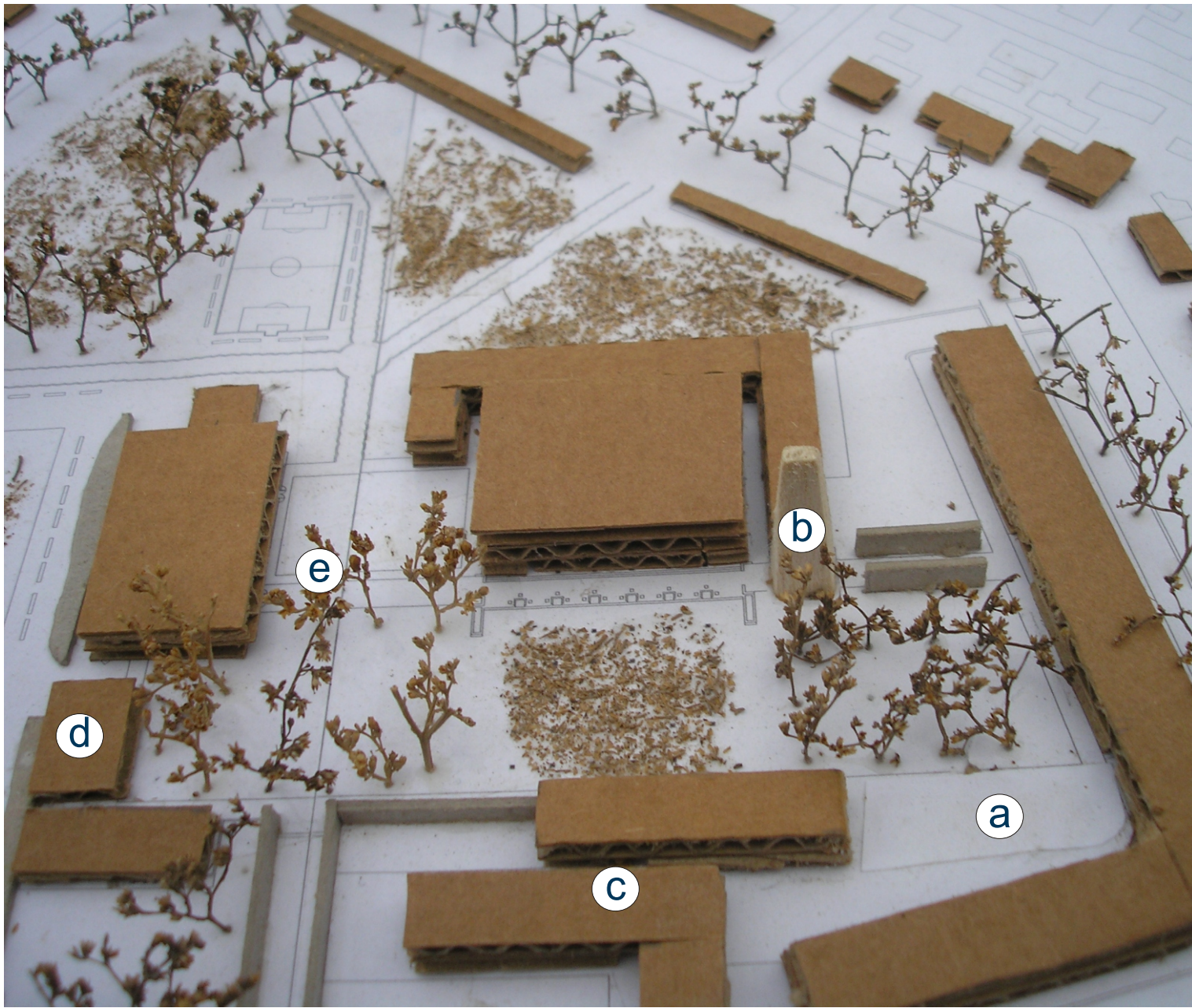
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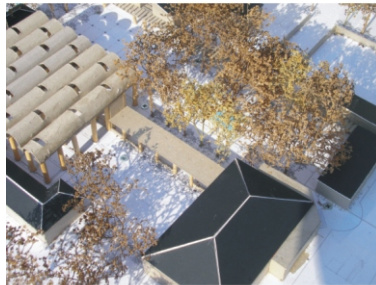


realisation of concepts



- (a) Classrooms removed and replaced by a court, a continuation of the main courtyard.
- (b) Introduction of a Minaret, as a visual landmark.
- (c) Police station raised to two levels, and extended towards Legwale Street
- (d) Existing change rooms and meeting rooms renovated, allowing the walkway to the south of the courtyard to lead right through to the soccer field.
- (e) Walkway leading up to entrance of multipurpose hall.

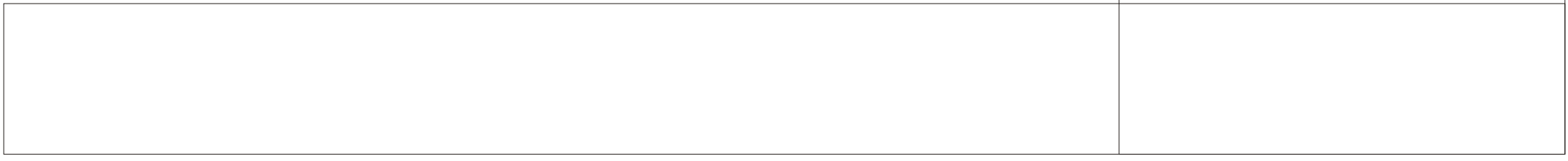
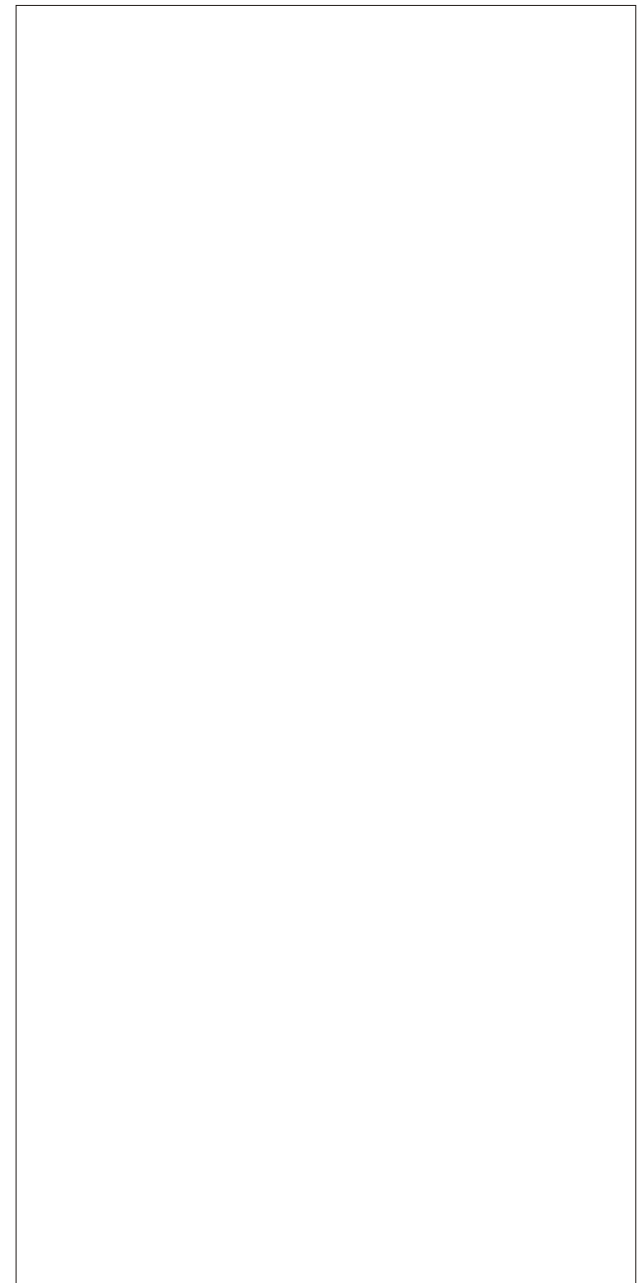
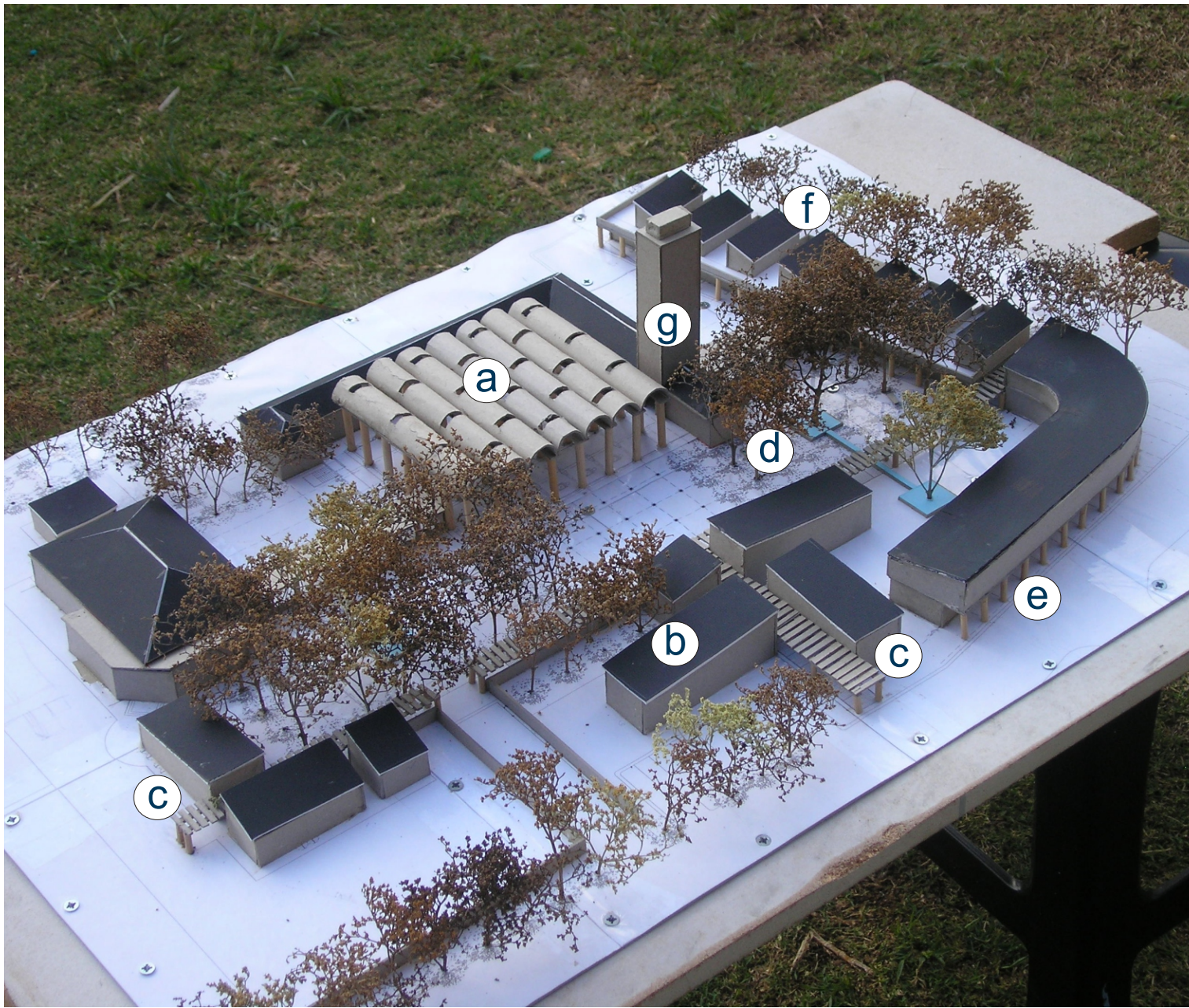




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realisation of concepts

- (a) Height of mosque raised and introduction of skylights.
- (b) Roof of police station articulated.
- (c) Light roof structure of steel and timber introduced over walkway.
- (d) Introduction of water features within the courtyard.
- (e) Pedestrian colonnaded walkway under second floor of building.
- (f) Mono pitched roofs over residential units.
- (g) Minaret articulated further.

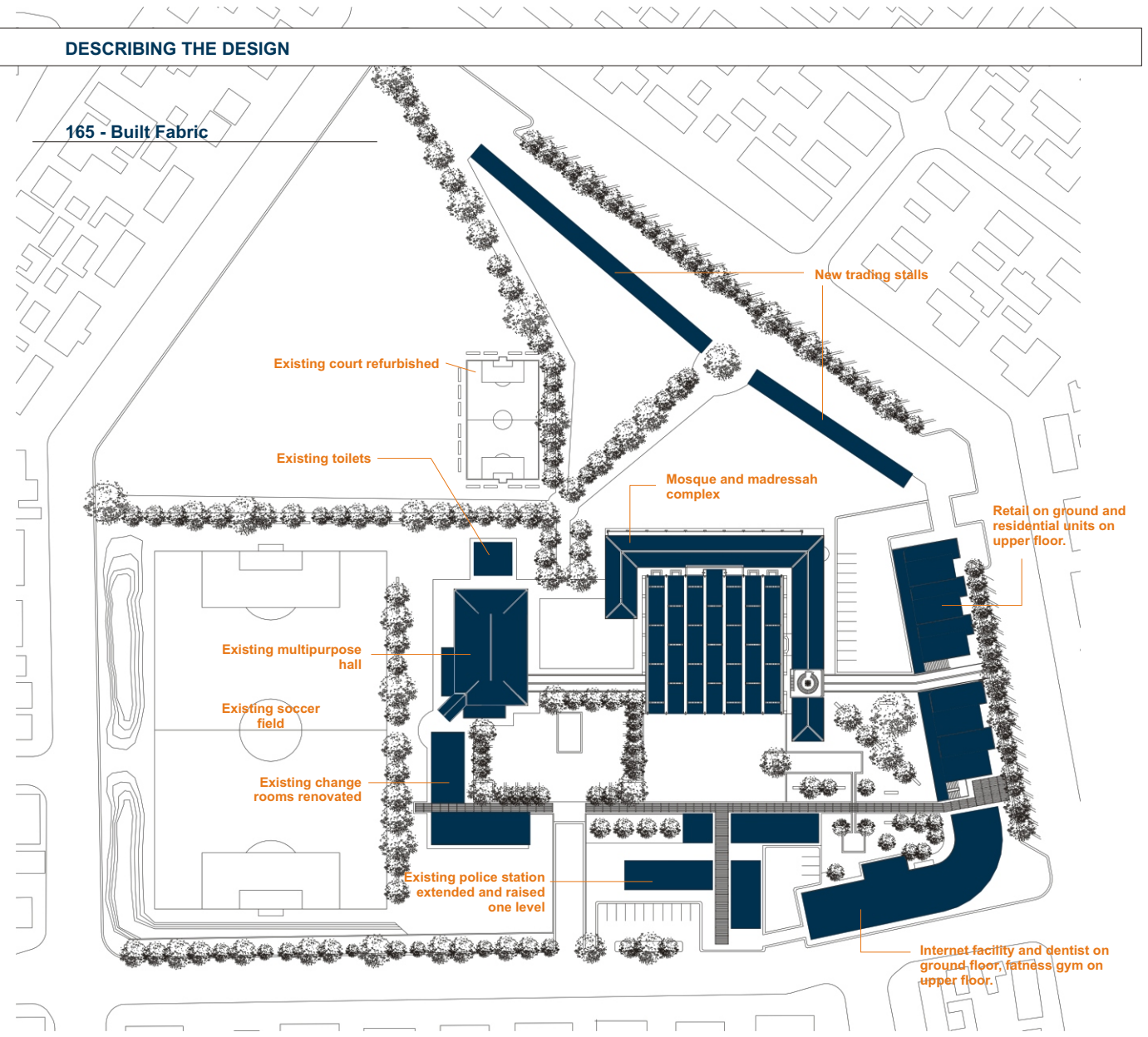


DESCRIBING THE DESIGN

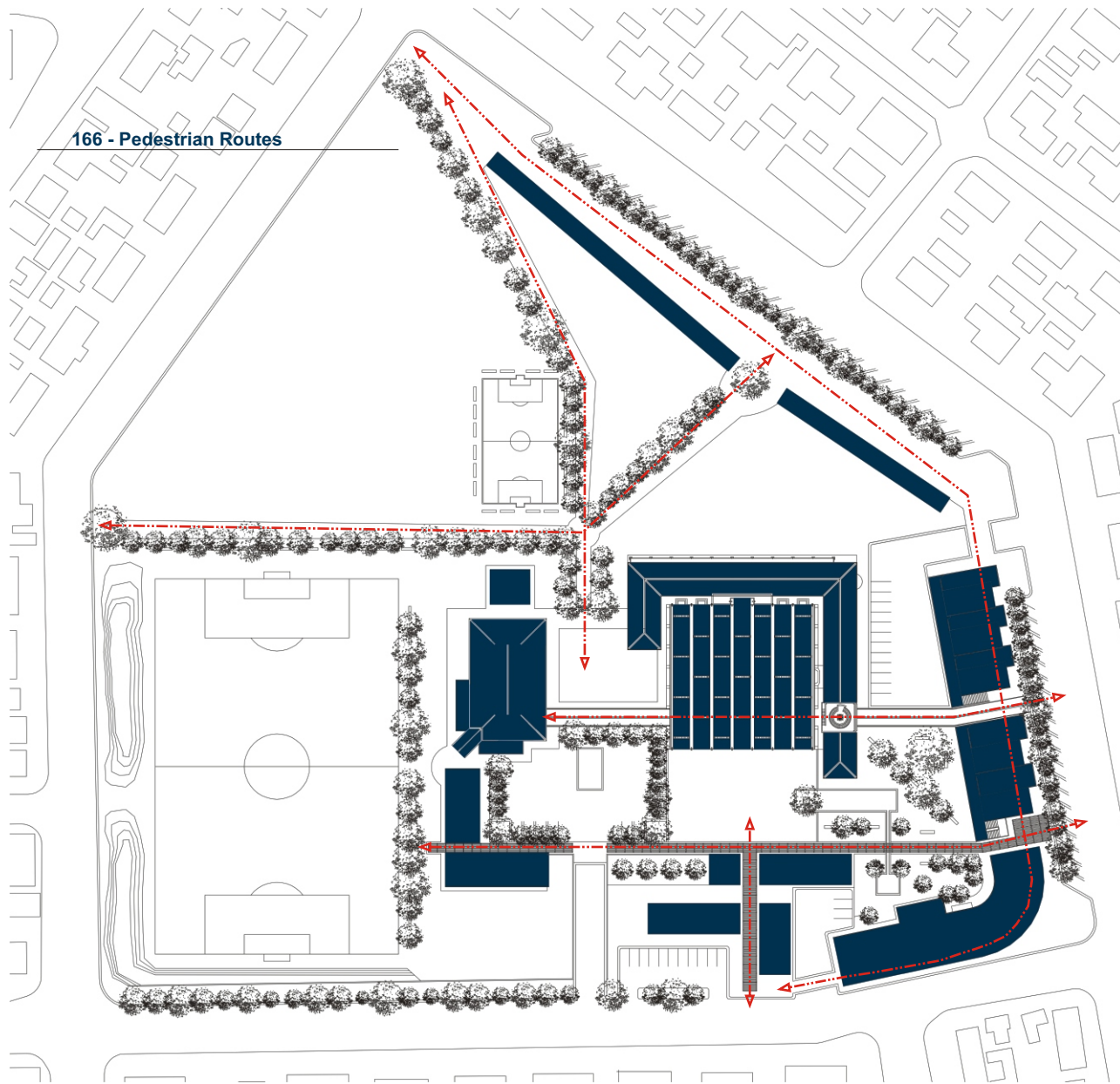
165 - Built Fabric

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166 - Pedestrian Routes



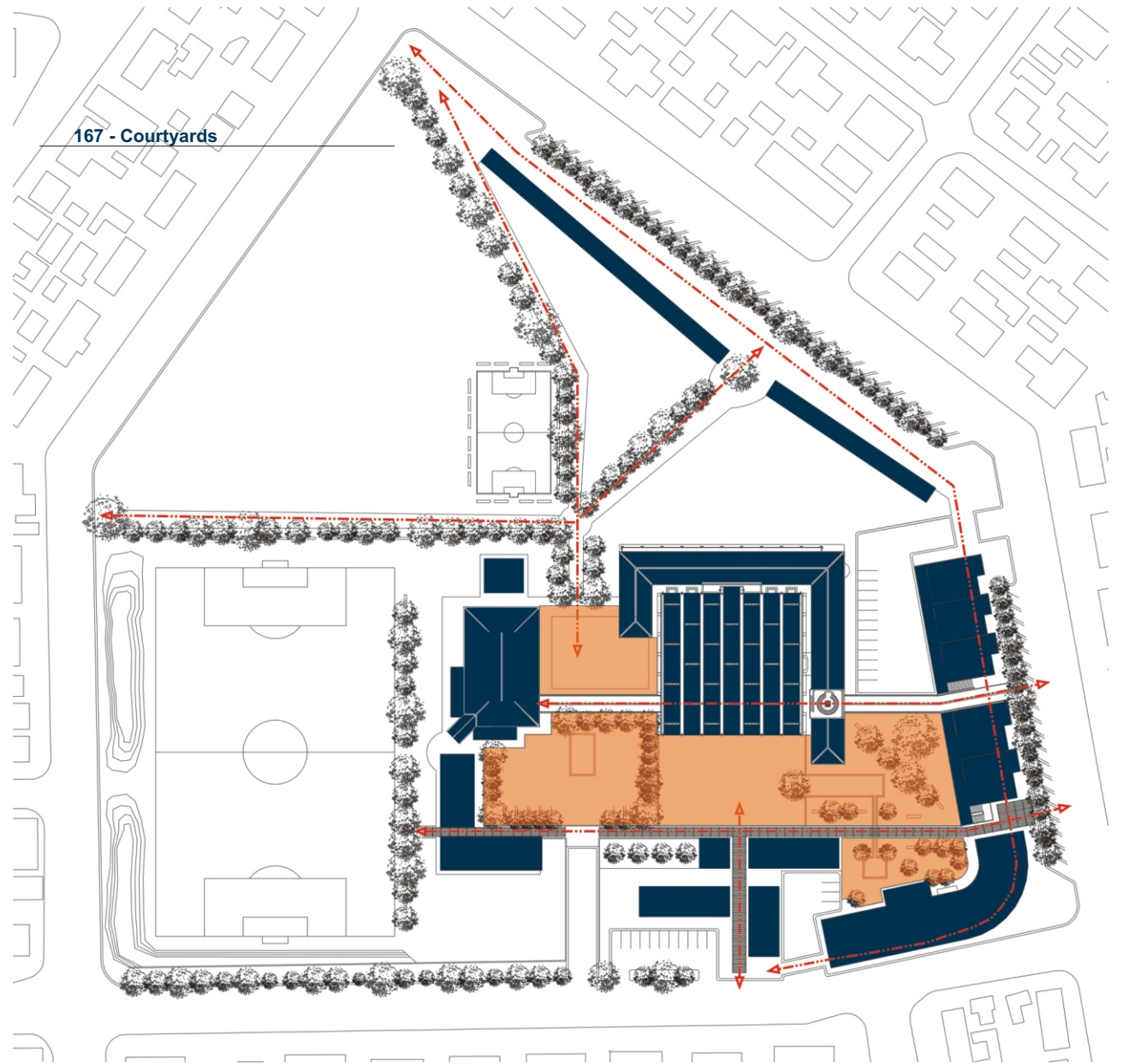
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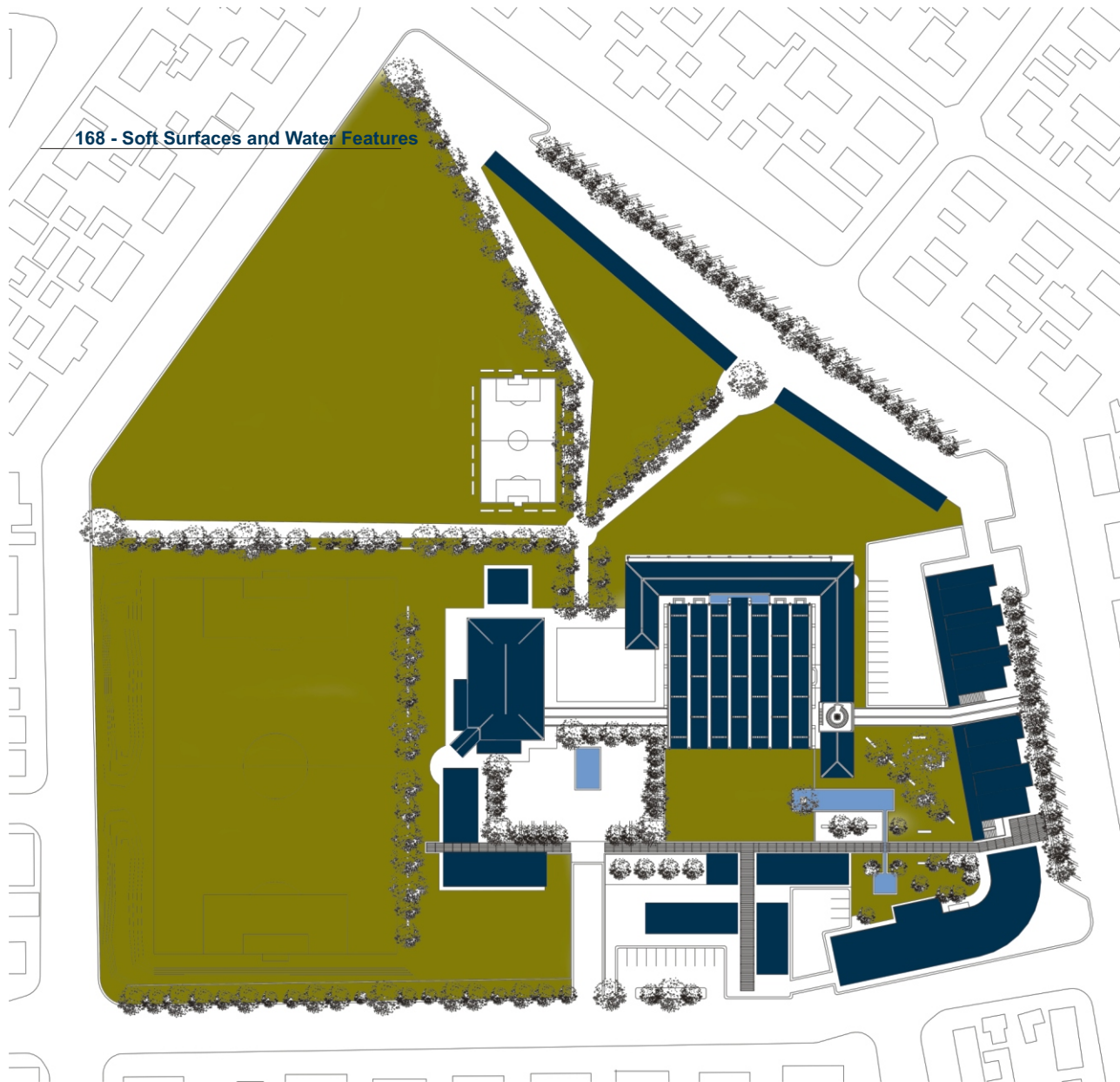
167 - Courtyards

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168 - Soft Surfaces and Water Features

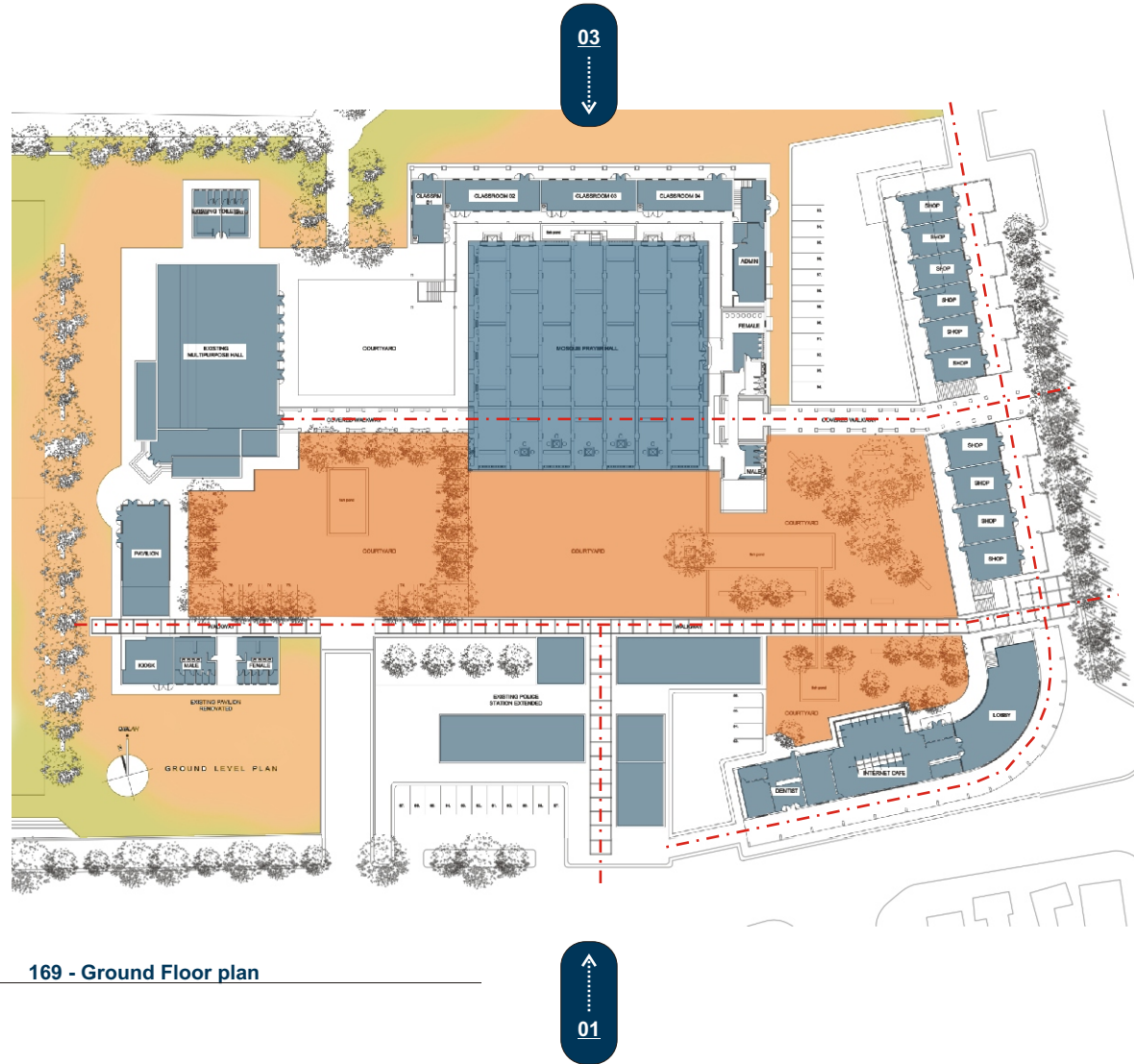


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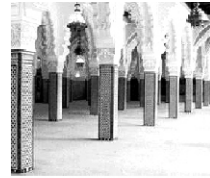
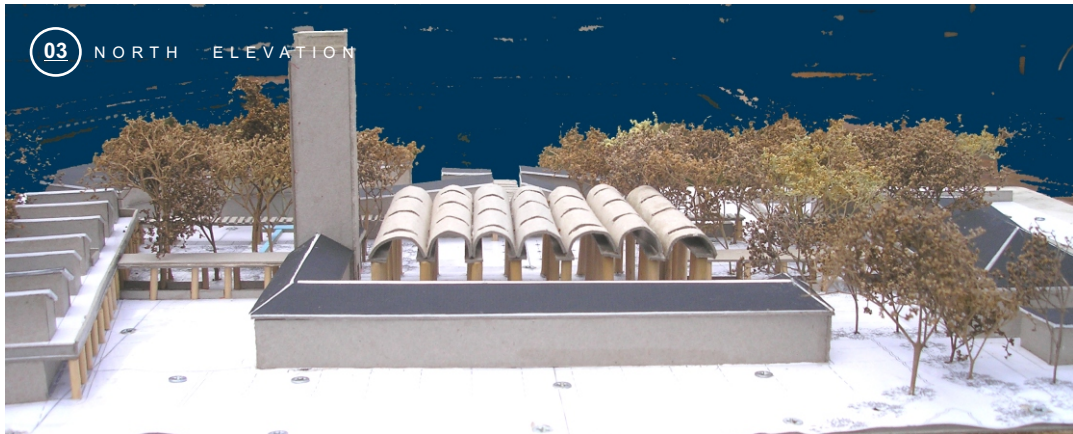
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169 - Ground Floor plan

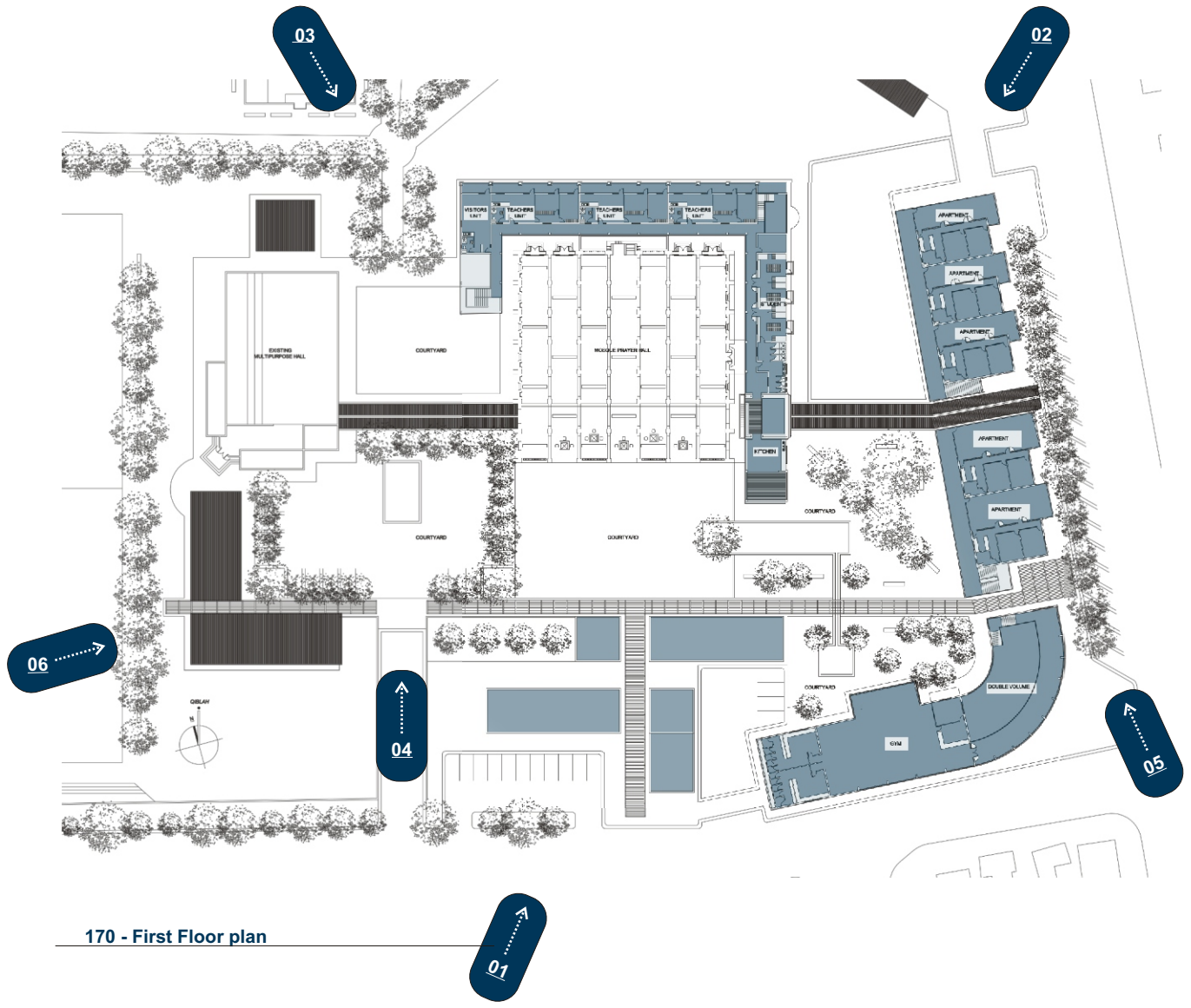


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170 - First Floor plan



01 VIEW OVER POLICE STATION TOWARDS MINARET.



02 VIEW OVER RESIDENTIAL UNITS TOWARDS MINARET.



01 VIEW OF COURT BETWEEN MULTIPURPOSE HALL AND MOSQUE



01 VIEW OF PARKING COURTYARD.

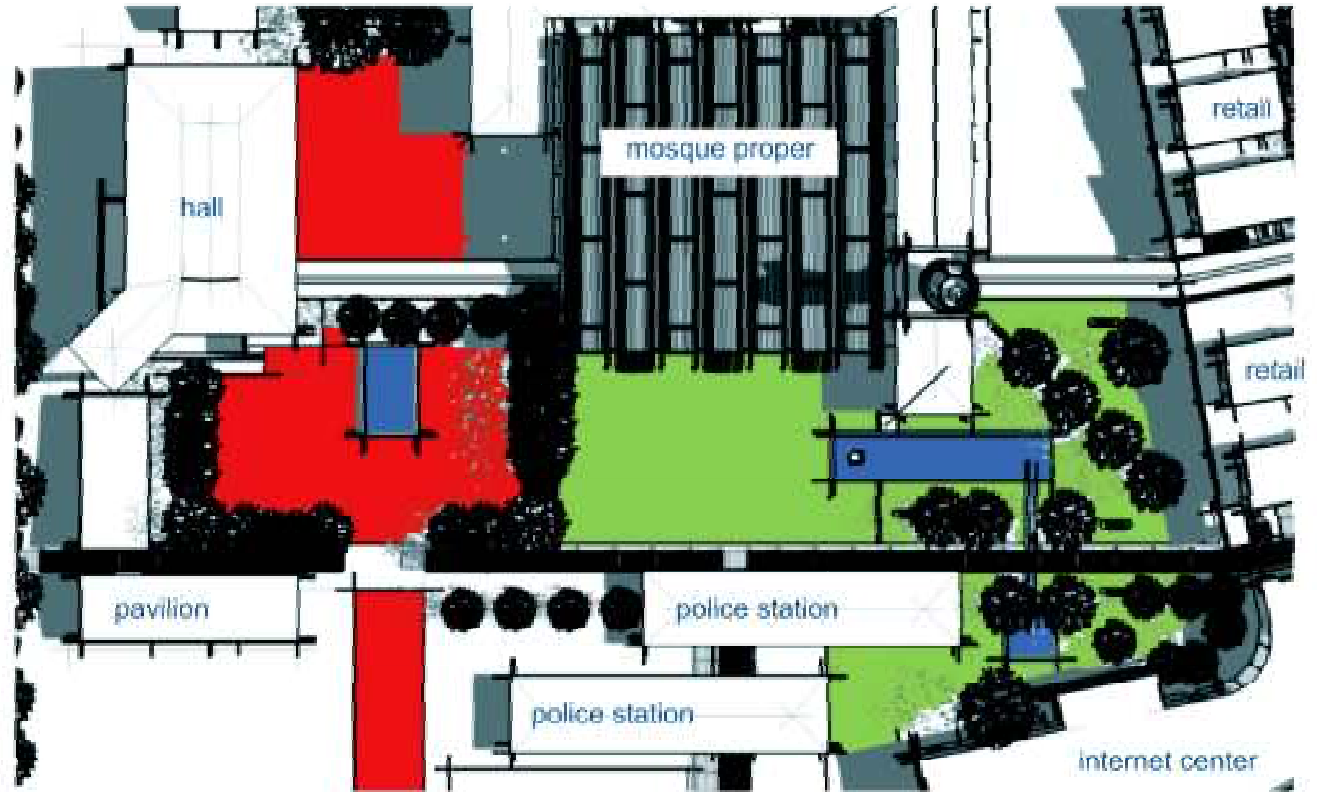


01 VIEW OF SOUTH EAST CORNER OF SITE



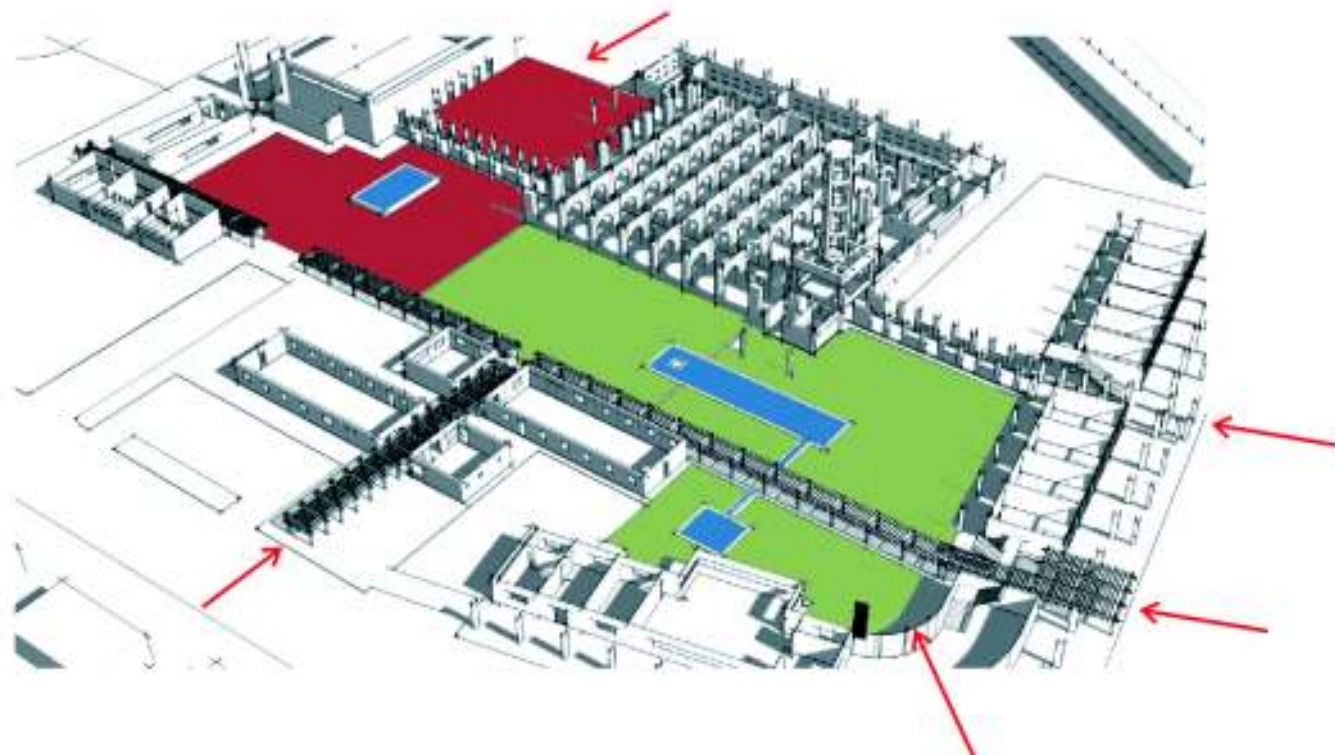
01 VIEW FROM SOUTH WEST CORNER OF SITE.

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171 - Courtyards

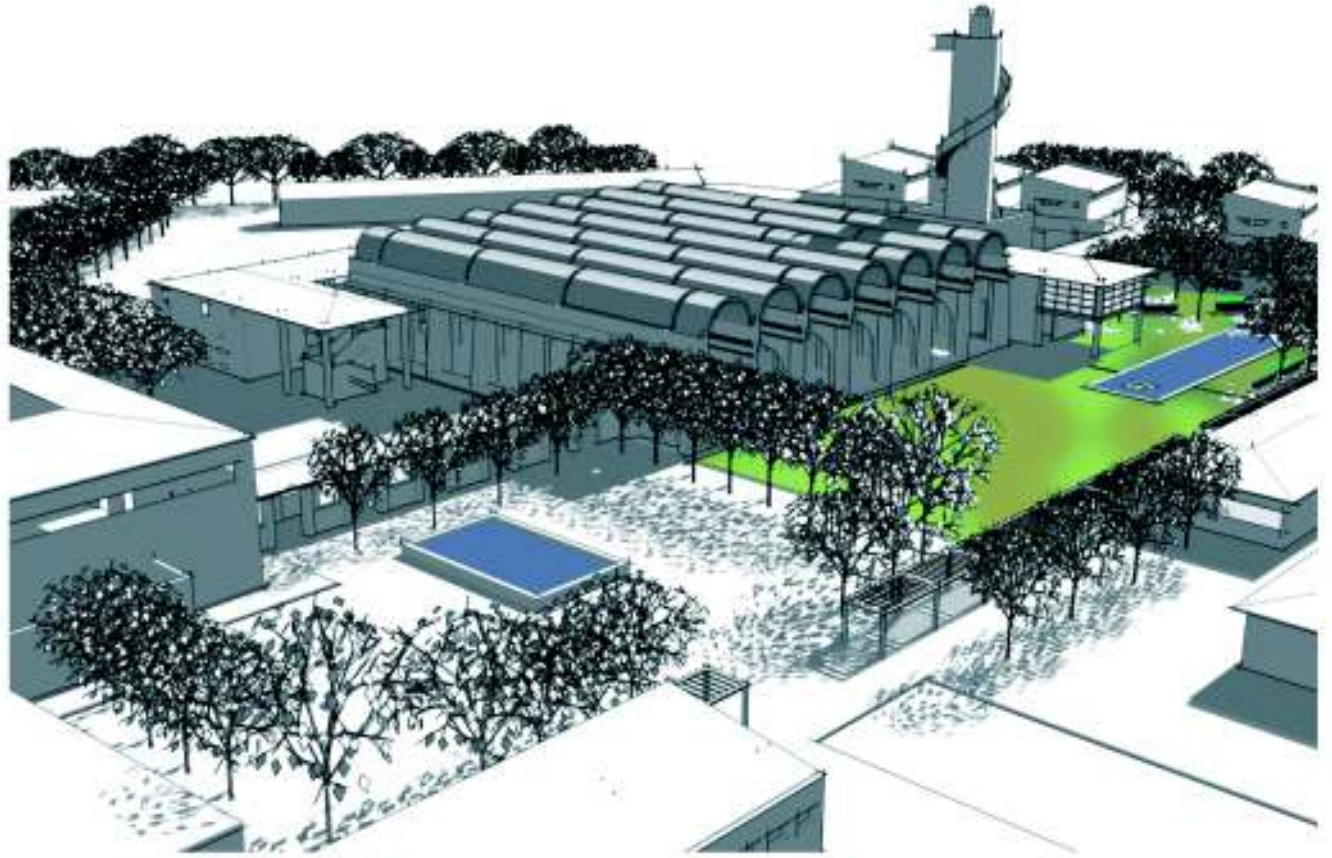


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171 - Courtyard Edges

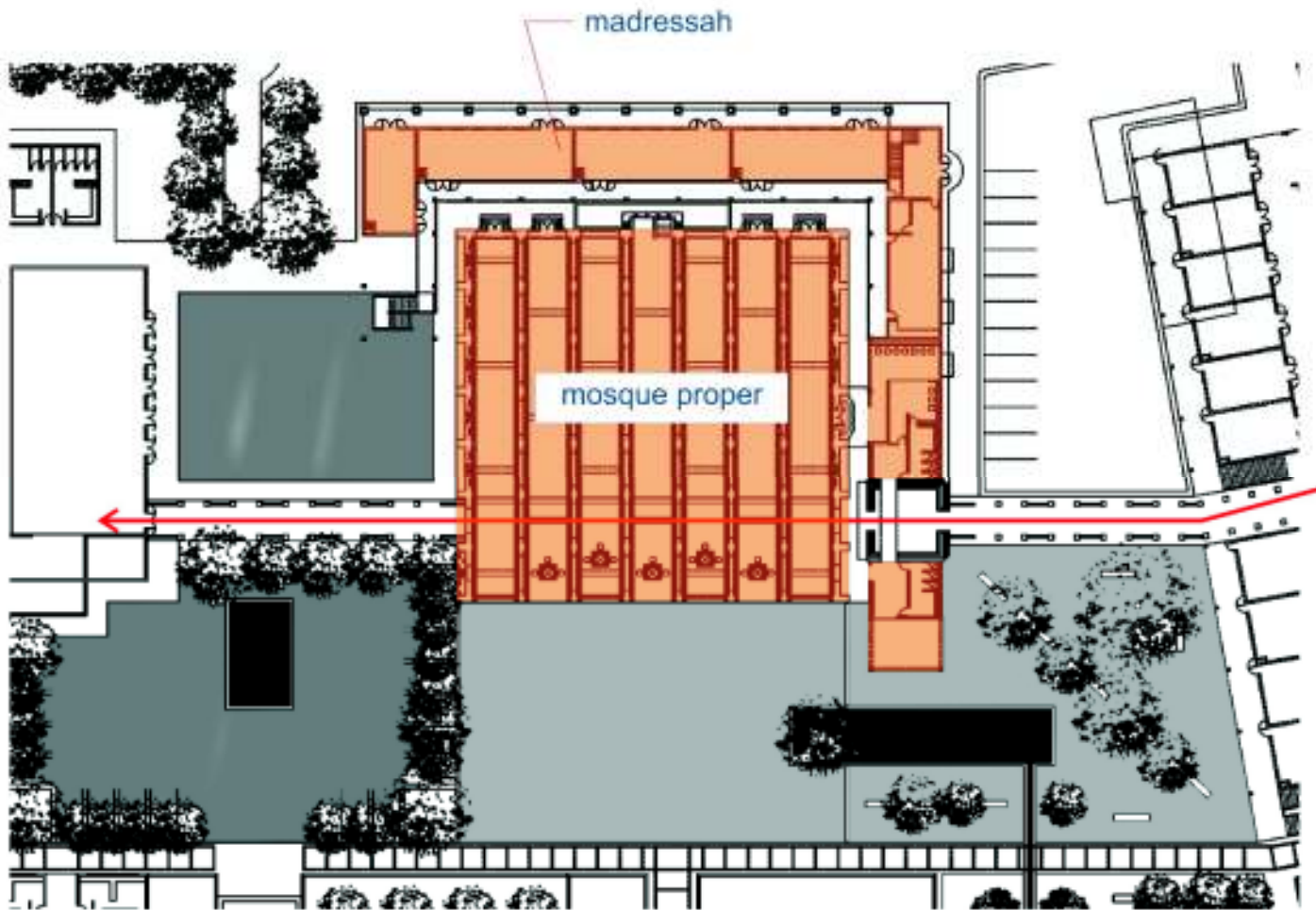
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173 - Main Courtyard



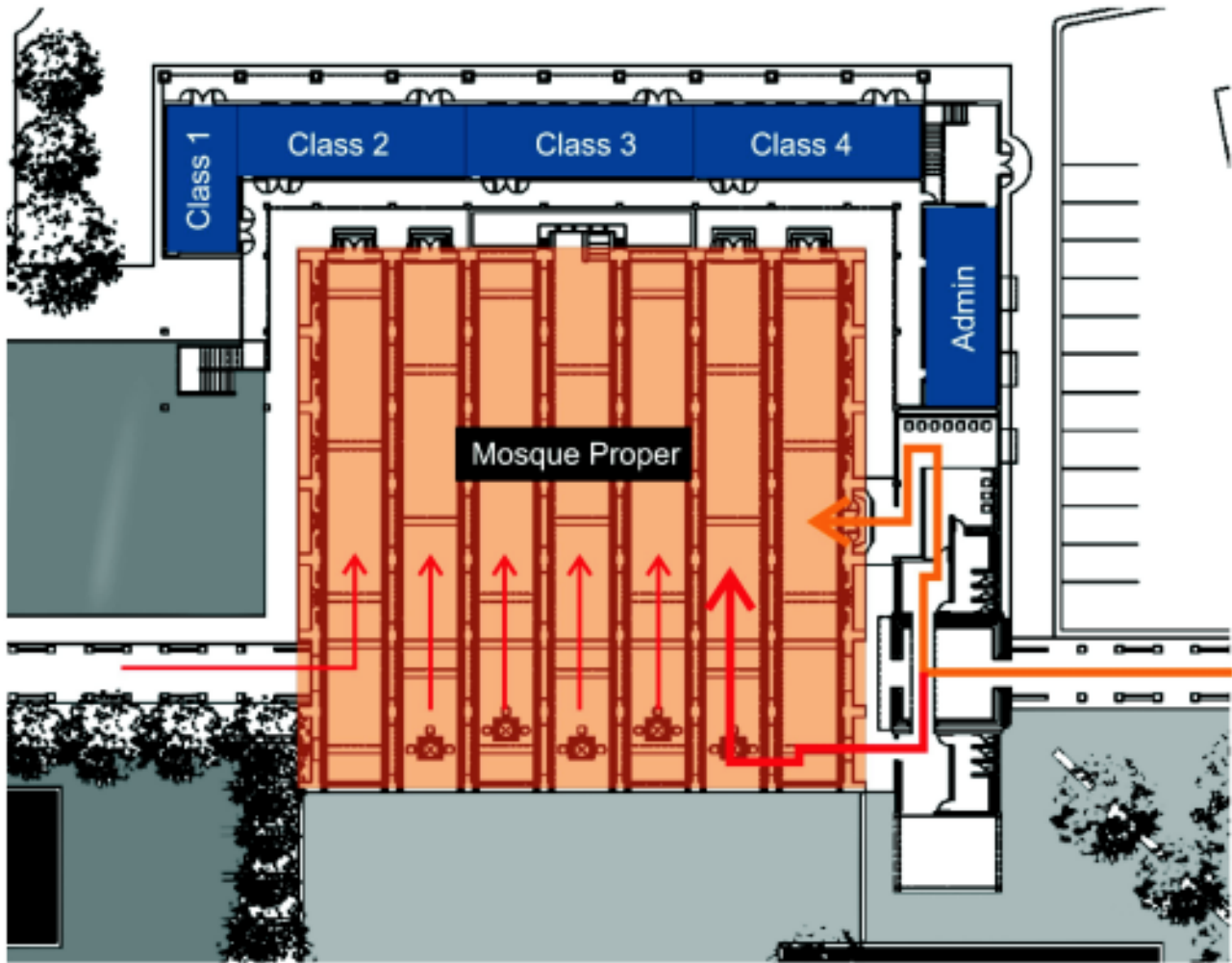
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174 - Mosque & Madressah Complex

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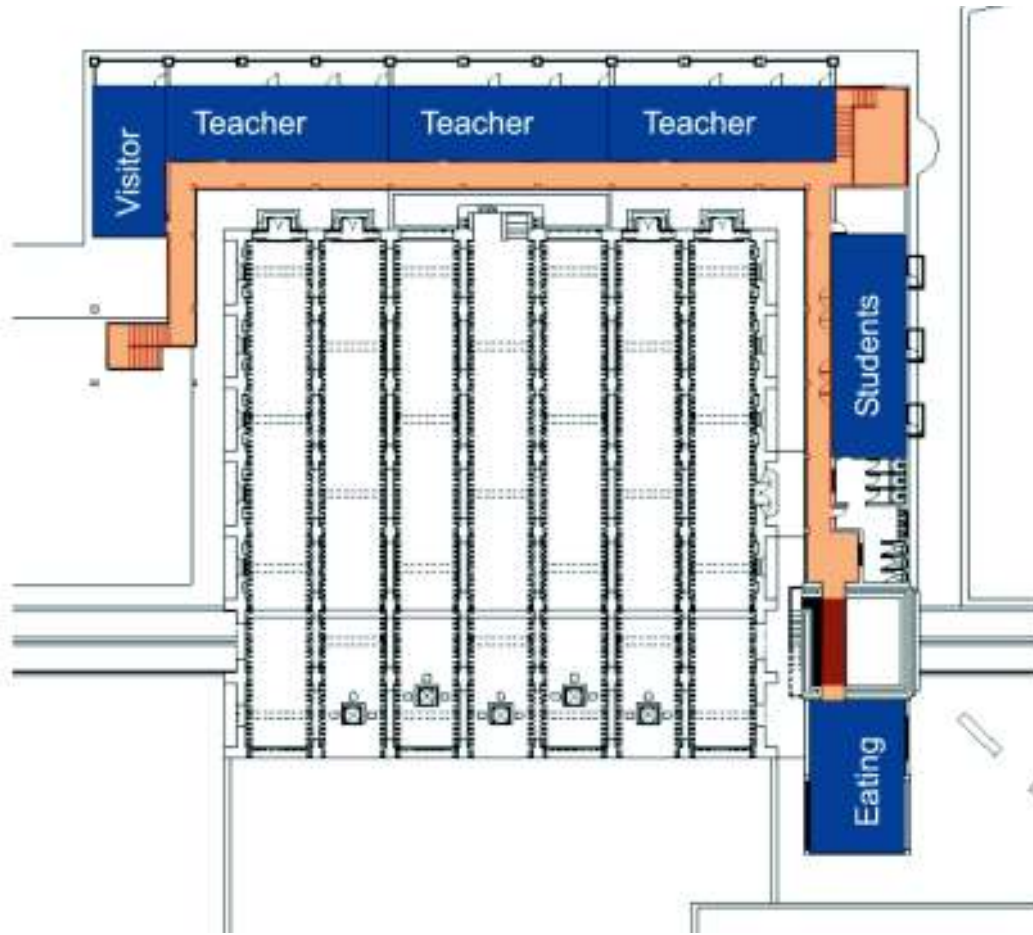
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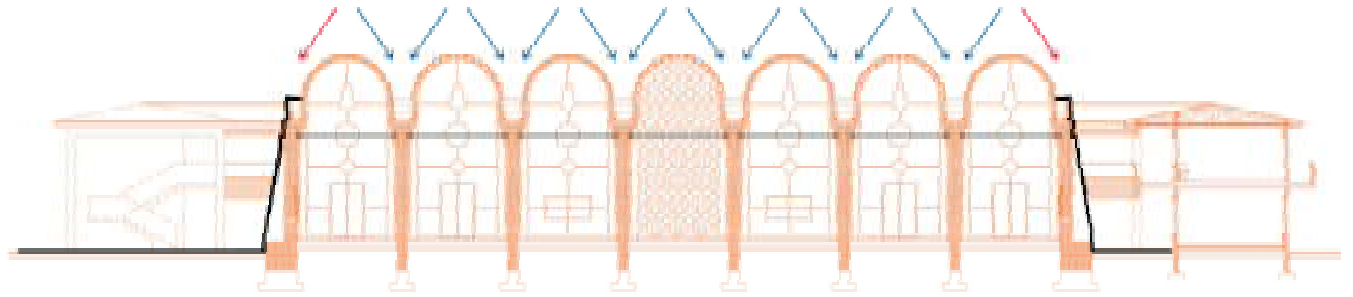
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175 - Mosque & Madressah Complex: Ground Floor

176 - Mosque & Madressah Complex: First Floor



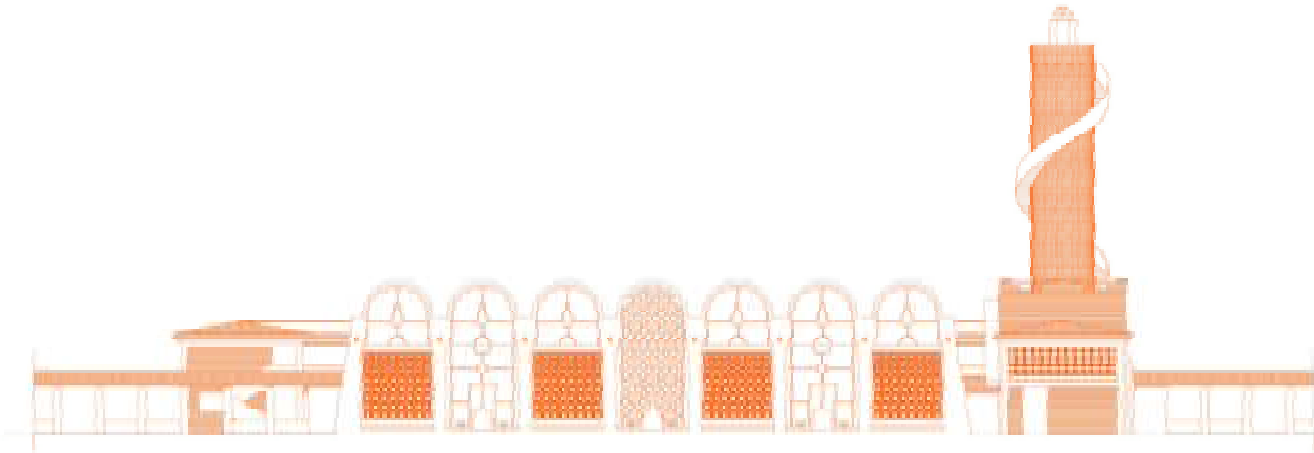


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177 - Mosque & Madressah Complex: Structure of Mosque Proper

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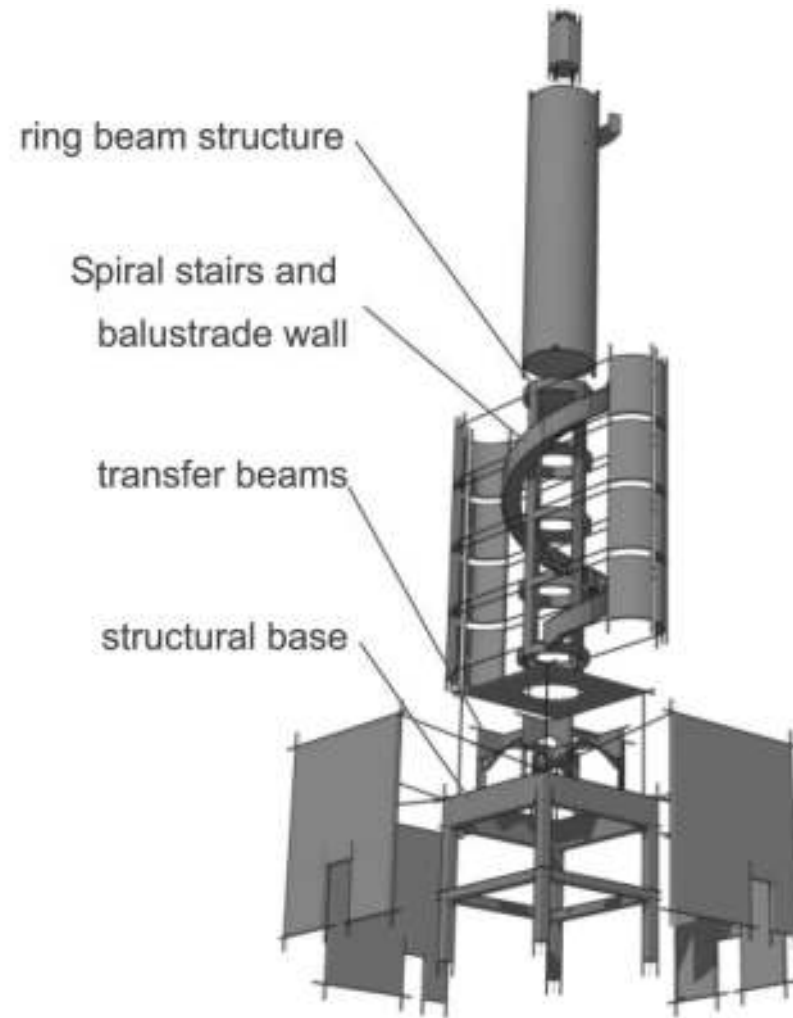
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178 - Mosque & Madressah Complex: Courtyard Elevation

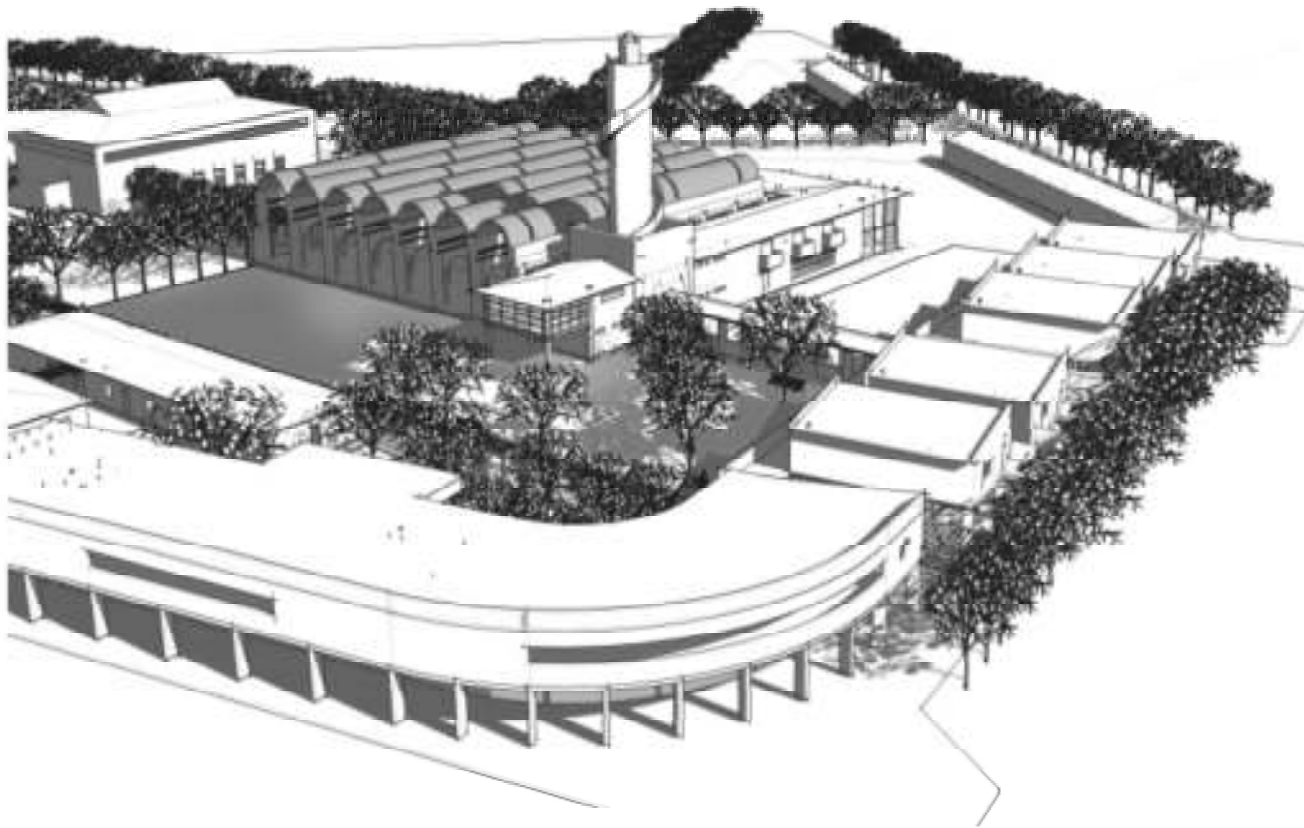
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179 - Mosque & Madressah Complex: Minaret Structure



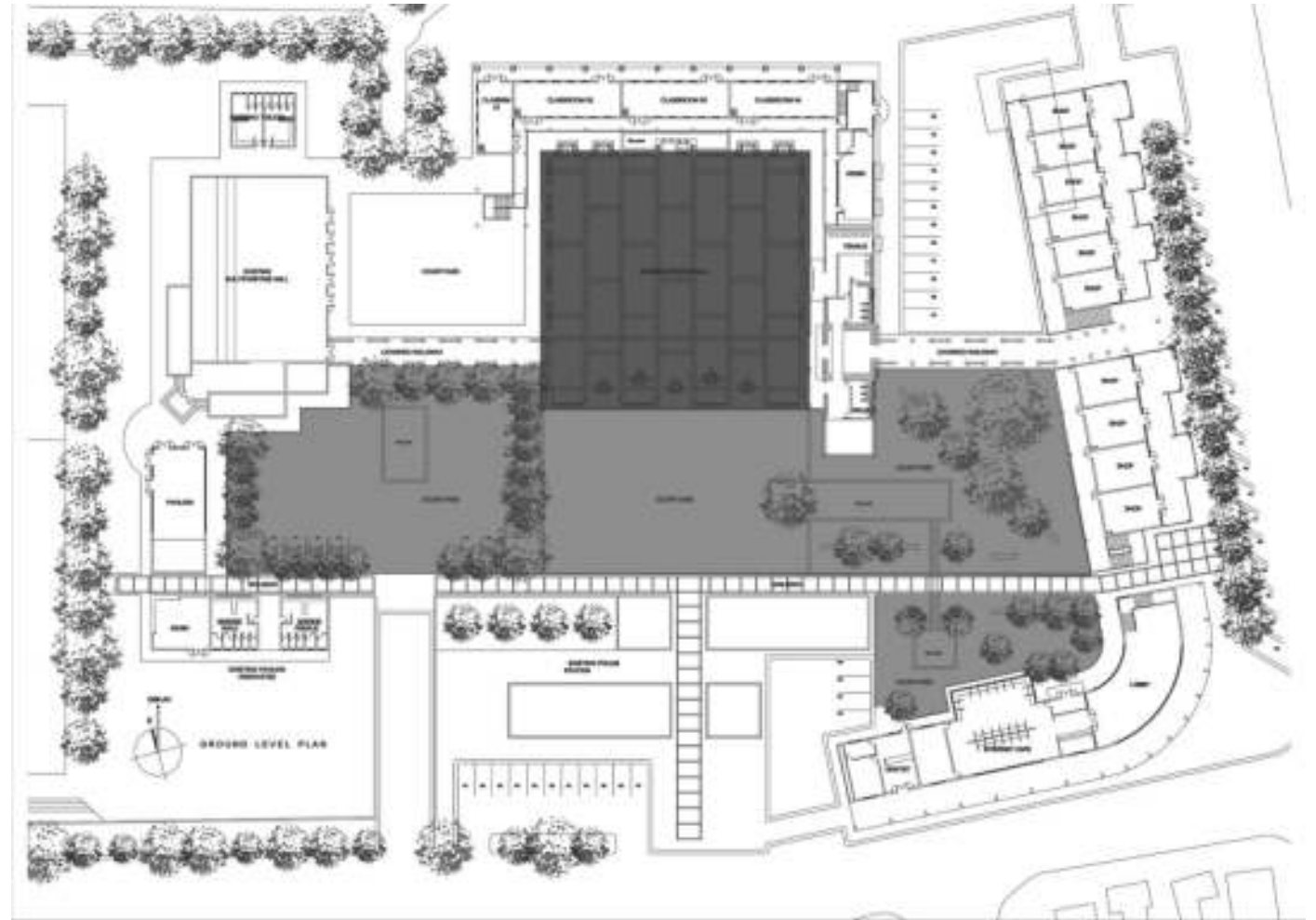
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180 - Mosque & Madressah Complex: Minaret in Context

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181 - Mosque & Madressah Complex: Ground Floor



182 - Mosque & Madrasah Complex: First Floor



NORTH ELEVATION



ELEVATION FROM COURTYARD

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SOUTH ELEVATION

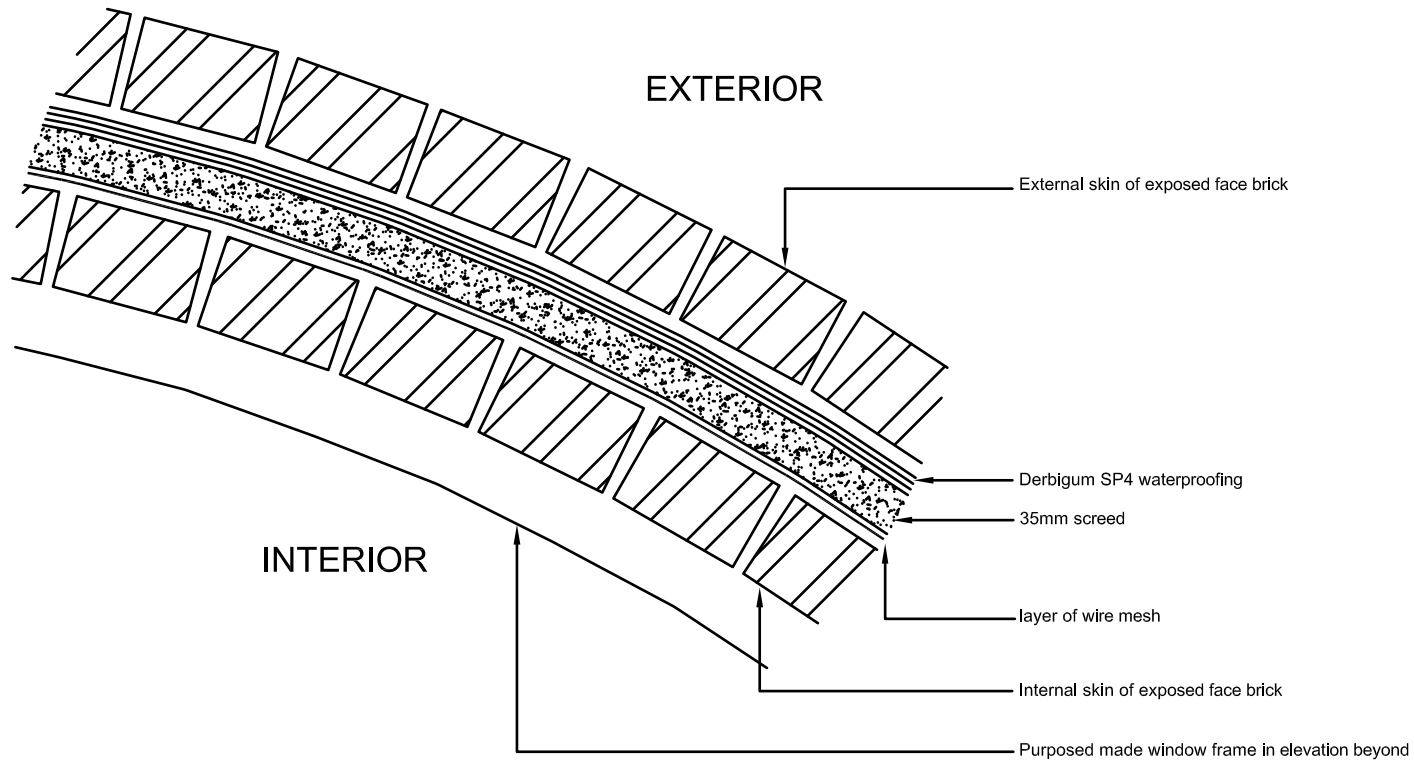


EAST ELEVATION

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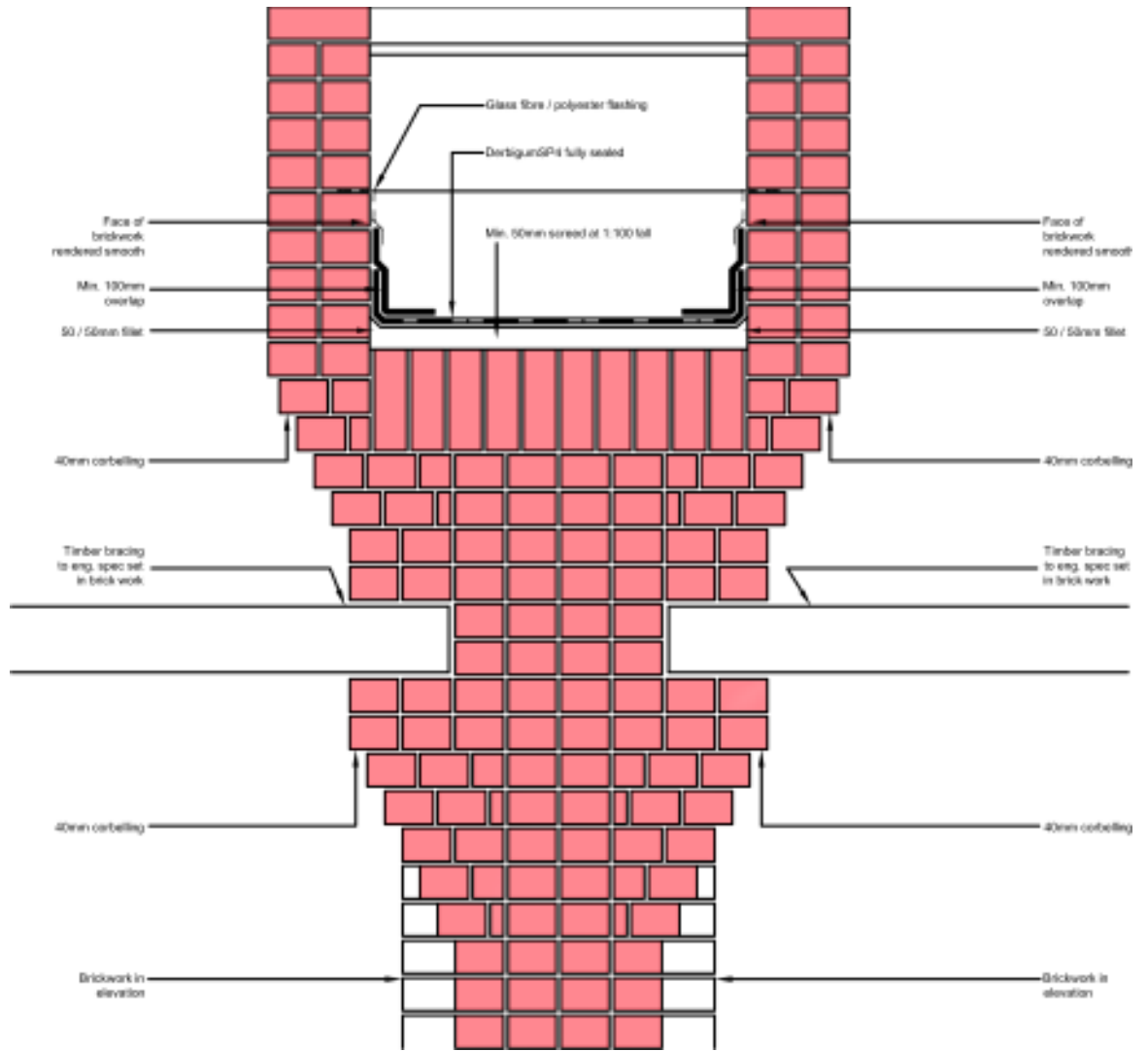
177 - Example of a groin vault built locally, designed and built by Lewis Levin Architect (Images Courtesy of Nick Mallandain)



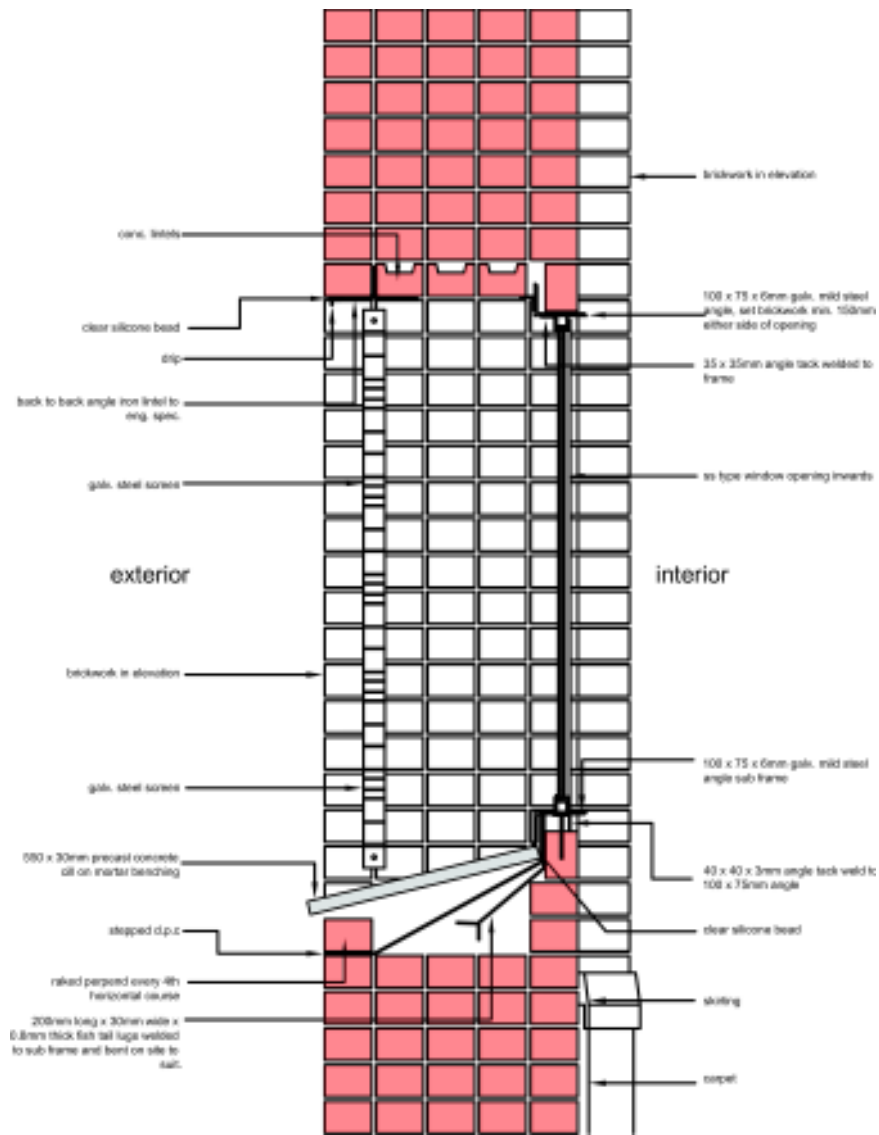
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184 - Mosque & Madressah Complex: Brick Vault Detail

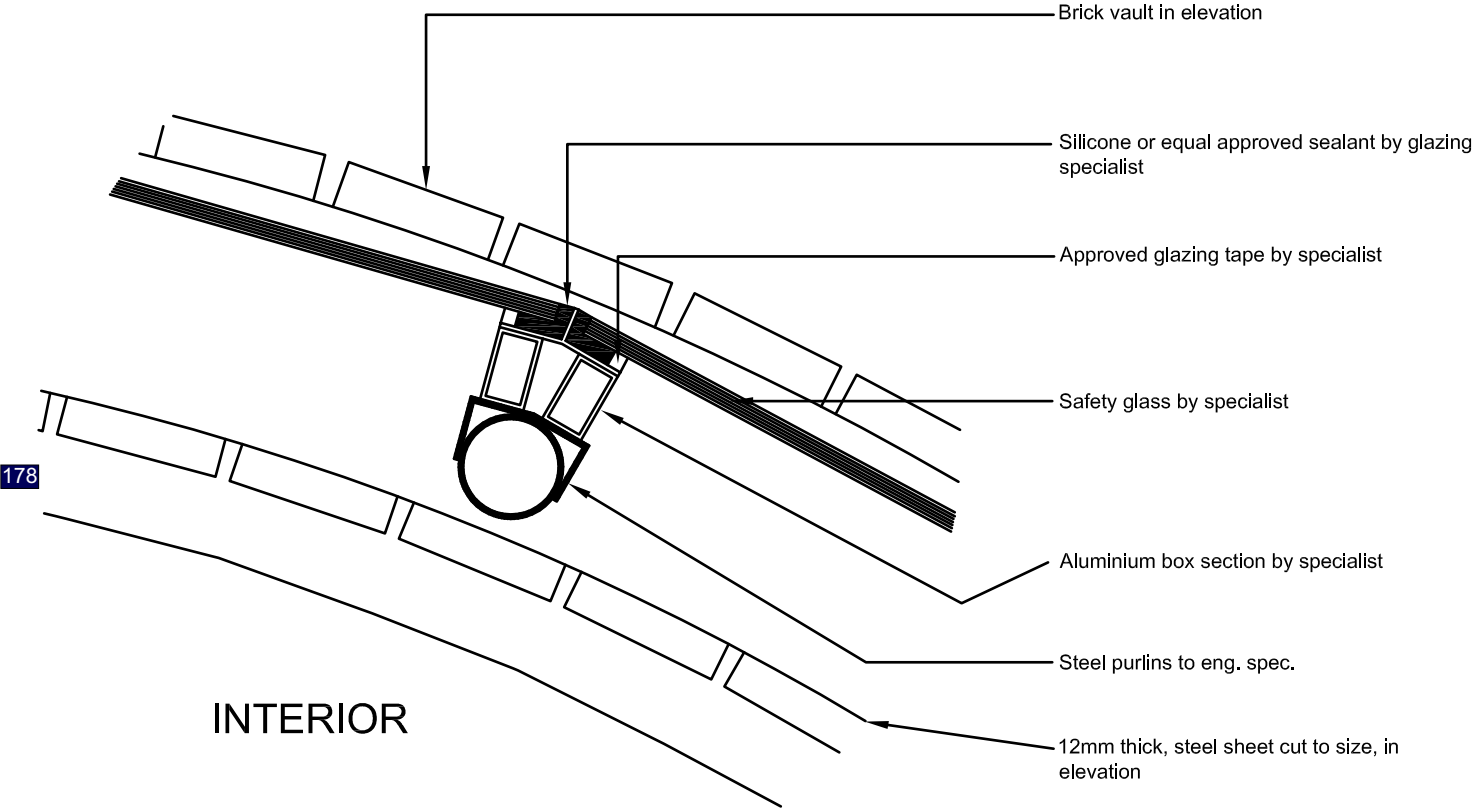


185 - Mosque & Madressah Complex: Vault Gutter Detail



186 - Mosque & Madressah Complex: Window Detail

EXTERIOR



- Brick vault in elevation
- Silicone or equal approved sealant by glazing specialist
- Approved glazing tape by specialist
- Safety glass by specialist
- Aluminium box section by specialist
- Steel purlins to eng. spec.
- 12mm thick, steel sheet cut to size, in elevation

INTERIOR

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187 - Mosque & Madressah Complex: Skylight Detail

INTERIOR

EXTERIOR

12mm thick, steel sheet cut to size, in elevation

Safety glass by specialist

Steel purlins to eng. spec.

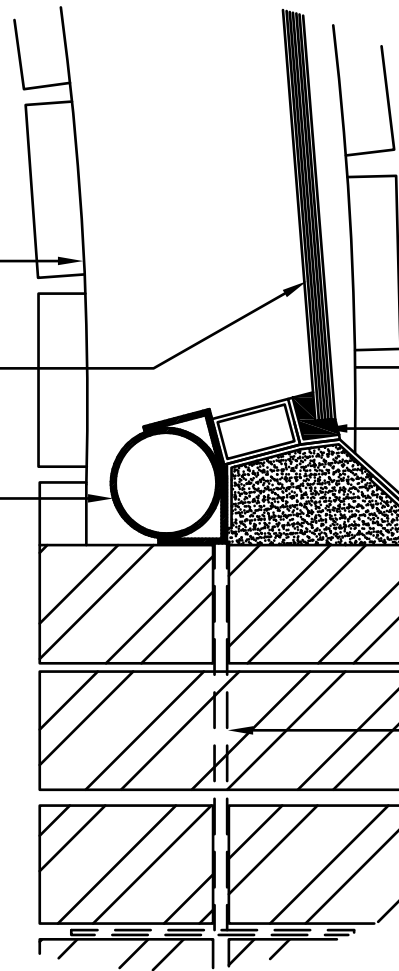
Brick vault in elevation

Silicone or equal approved sealant by glazing specialist

Purpose aluminium cill on benching mortar

Aluminium flashing

Steel purlin anchored into brickwork 3 courses down



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188 - Mosque & Madressah Complex: Cill Detail of Skylight

realisation of concepts