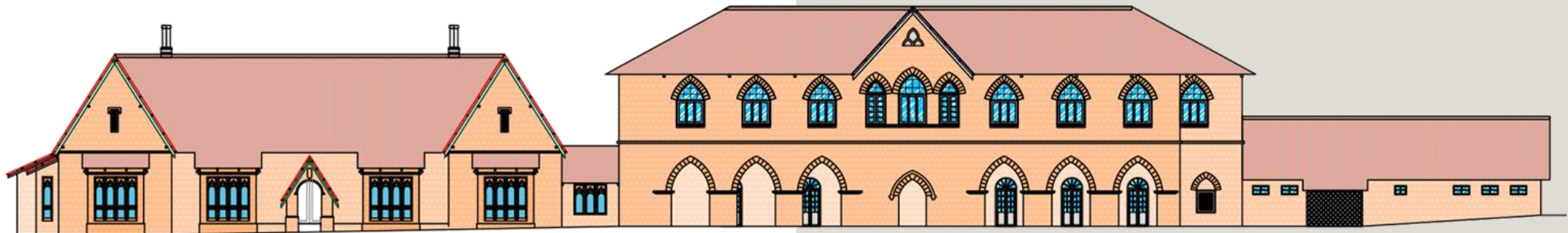


# A Project Report for the repairs & restoration at Blocks A & B



*Original photo of A block from Archive*



*Existing & proposed - A block elevation*



### **Origins and Purpose:**

The Club, Mahabaleshwar was Constructed as a Sanatorium and originally consisted of eight sets of quarters and five detached bungalows. It used to accommodate sick British army officers and their families. Most of the Structures are more than a century old with the Frere hall well above 125 years' old. Govt. of Maharashtra has covered the Frere hall, A & B blocks as Heritage Grade 1 structures casting a responsibility on the Club to preserve them with the heritage character intact and at the same time imposing certain conditions.

### **Frere Hall and Library:**

Public Hall and Library are named after Sir Bartle Frere in addition to Sanatorium. The 'Frere Hall' was constructed in 1865, and is preserved as one of the oldest Heritage Buildings in Mahabaleshwar.

### **Growth & augmentation of facilities:**

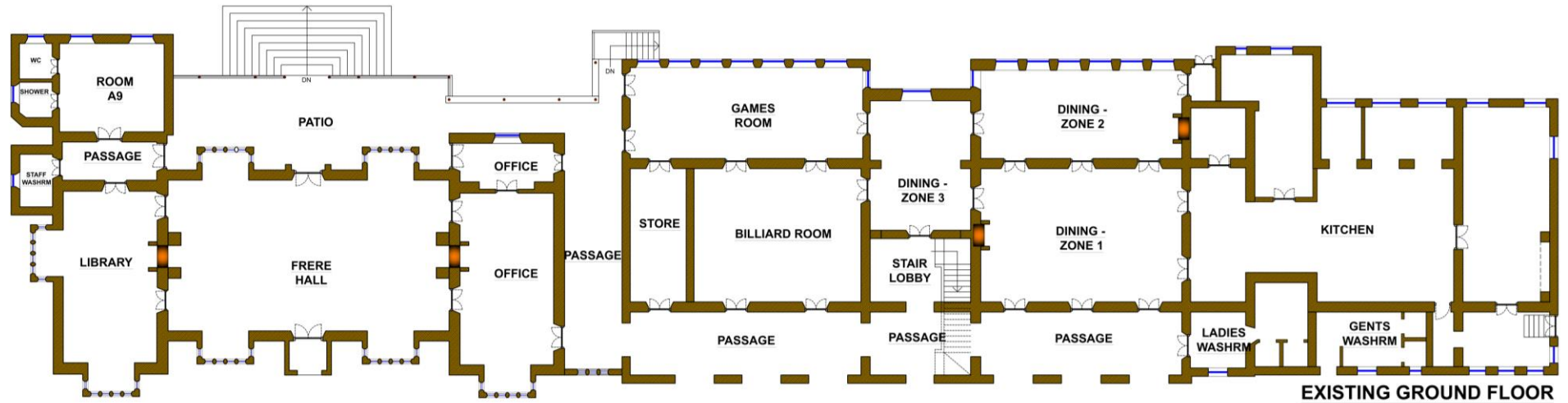
Over the years, The Club has added facilities including the currently available 39 rooms. Over the last decade, the new C block and E block was

added. The D block has also been renovated and refurbished internally. The workmen and staff quarters were fully renovated recently. The Main car park has also been upgraded and all internal roads have been paved with laterite or bitumen. Structural repairs have also been carried out to the Frere hall as well as internal painting and restoration of windows.

### **Current Status:**

The Club is now regarded as an institution preserving heritage and tradition. Currently, the membership stands at around 1800 members who passionately value the Institution's traditions and heritage. Over the last few decades there has been no holistic repairs or restoration carried out to A & B blocks and only piecemeal work has been done. The A block, kitchen and B block are in urgent need of internal and structural repairs and restoration so as to ensure longevity of these structures and better Member experience. Over the years on a piecemeal basis number of interventions have been done which are not in compliance with the heritage character and the same is sought to be restored. It has also been proposed to install a lift in the A block subject to getting approval from the Heritage committee.

## Existing Ground floor: Design Concerns

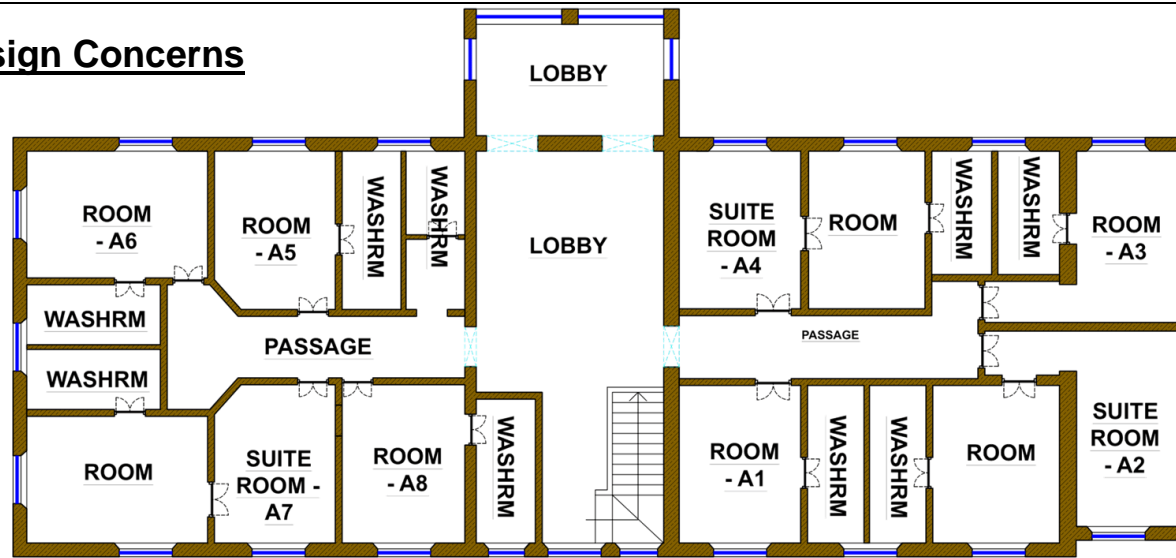


The existing ground floor block exhibits following design concerns.

1. Efficiency, hygiene and Modernization of Kitchen is desired.
2. Dilapidated, uneven & damaged flooring in Dining rooms and passages.
3. Damaged windows along the north side façade and washrooms.
4. Lack of efficient lighting; rooms look dull. Heritage character needed.
5. Haphazard electrical cables running along the north façade & passage besides office.
6. Old cables and wires pose an electrical hazard.
7. Old stoneware pipes of first floor bathrooms routed along the front façade.
8. Damaged wooden false ceiling in Games room, Dining Zone 2 & Patio.
9. Heritage design and aesthetics in Room A9 is desired.
10. Heritage design and aesthetics in Library is desired.
11. Lack of accessibility for physically challenged and senior citizens to first-floor rooms.

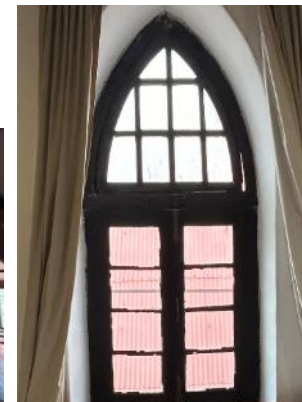
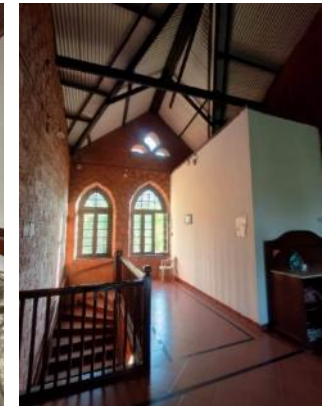


## Existing First floor: Design Concerns



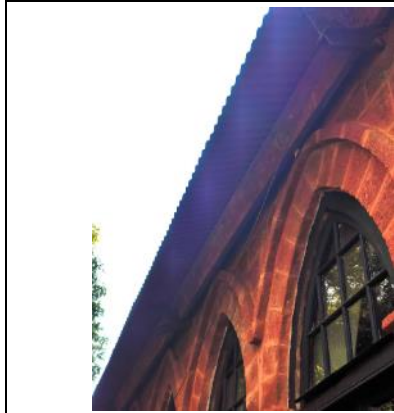
The existing first floor block exhibits following design concerns.

1. Washroom A8 projected into the original lobby space and is distorting the original heritage character of the building.
2. Existing vitrified tiles in rooms, washrooms and passages are not of heritage character.
3. Damaged exterior windows on all sides.
4. Lack of sound insulation between rooms and washrooms.
5. General heritage style lighting of all rooms is desired.
6. Old stoneware pipes of first floor bathrooms currently routed along the front façade.
7. Heritage design and aesthetics in all rooms is desired.
8. Lack of accessibility for physically challenged and senior citizens to the first-floor rooms.



## Existing Ground & First floor: Structural Audit & Concerns

M/S Devang Sutaria and Associates have audited the structure and the following are a few points requiring interventions.



Brackets supporting external purlin are corroded. The wooden rafters and purlins over Games room and Dining block zone 2 shall need repairs/ replacement.



Damage to walls. Leakages in walls at interface with roofing etc observed. Localised efflorescence observed.



Distress in some wall, lot of moss formation, leakages and localized cracking observed in this area. The lower part of the structure is in laterite while upper part in bricks with exposed wooden columns. A Homogenous laterite wall structure is desired.



Some efflorescence, some damage to flooring and deflection of false ceiling is observed.



Some cracks along door opening in wall observed in Library



Leakages, efflorescence and corrosion of supporting structure to kitchen floor observed. Severe leakages in floor and wall observed due to kitchen wet areas and probable plumbing issues. Moss formation. Recommend to get rid of Mild steel floor structure and cast an RCC structure for the floor only.

Following are more concerns;



Some damage to hip rafter at joint observed. Gaps at junctions of windows and wall observed.



Damaged wata/ warped purlin/ moss formation on wall surface observed. Efflorescence in walls observed



Efflorescence in walls observed



Damage to top of wall observed. Cracking and opening of joint observed.

In their Audit report, adequate remedies are suggested by the Structural consultants so as to restore and repair the structure.

## PROPOSED GROUND FLOOR



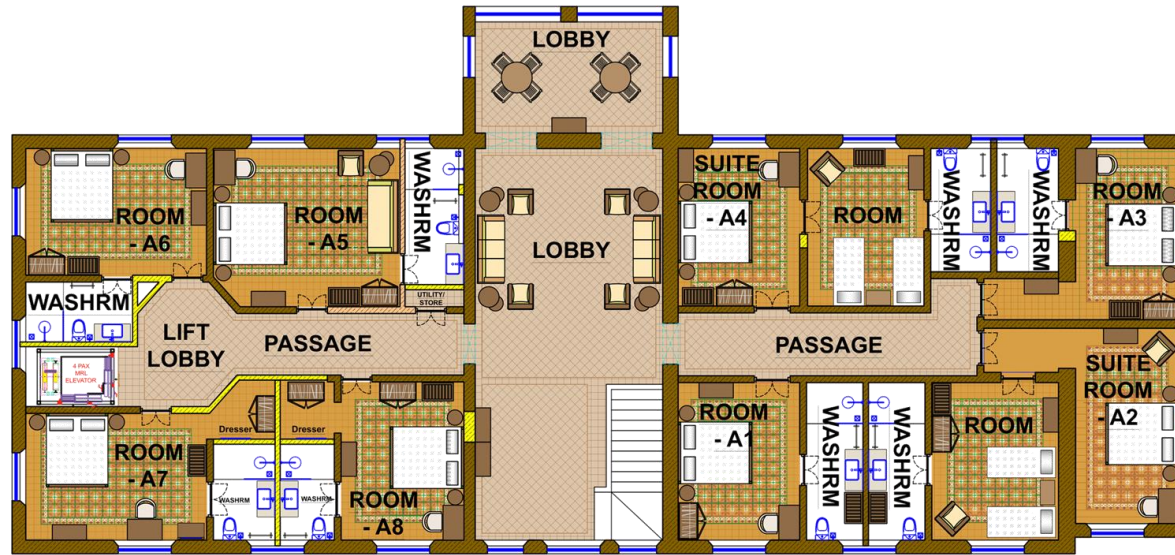
Following are the key proposed interventions;

1. Introducing a 4 pax hydraulic elevator in the current store room.
2. Revamping the entire kitchen block with all modern kitchen amenities and utilities while addressing the fire safety aspect.
3. The Dining block section including loose furniture, lighting, refurbishing flooring tiles, door and window repairs.
4. Addressing haphazard electrical wiring along the service passage. In this process, we shall attempt to restore the flooring tiles. However, a similar flooring tile has been identified in case we are not able to restore the existing tiles. All brown hatched area in passage represent the tiling area to be addressed.
5. Introducing heritage style false ceiling in Billiard room and repairing the leaking roof structure & wooden ceiling over Games room and Dining Zone 2.
6. Door and window repairs as and where applicable.
7. Renovating the office block - staff furniture, lighting, electrical wiring aspect and re-routing of CCTV, etc.
8. Repairing the existing wooden ceiling over the patio behind Frere hall.
9. Renovating the library- flooring, books cabinets, electric fireplace, lighting, loose furniture, etc.
10. Renovating the Room A9 including flooring, loose furniture, bathrooms, door and windows.
11. Cleaning the damaged laterite wall façade and grouting as required.
12. Painting and polishing of all areas under renovation.

*Note:*

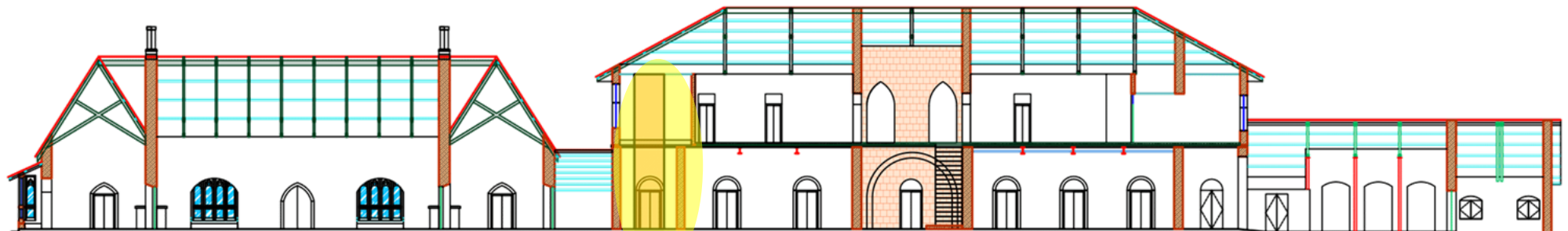
*The entire Frere Hall including all bay windows were recently restored. No works are to be carried out in these areas.*

## PROPOSED FIRST FLOOR



Following are the key proposed interventions;

1. Introducing a 4 pax hydraulic elevator whose shaft opens up into the current washroom A7. It opens up in a lobby space leading to all rooms.
2. Removing the A8 washroom block which is encroaching into the staircase lobby space and hence not abiding by the original heritage aesthetics of the space. The re-alignment of washrooms happens only in the left wing of the first floor.
3. Removing the current powder washroom and providing utility space.
4. Restoring and renovating all rooms A1 to A8- new Bharat heritage flooring, loose furniture, bathrooms, door and windows.
5. Heritage style lobby furniture
6. Providing sound insulation between rooms, bathrooms and passages.
7. Introducing false ceiling in passages on either side of the central lobby.
8. Proposing new heritage style flooring in the passages and lobby.
9. Repairing and restoring the existing wooden staircase.



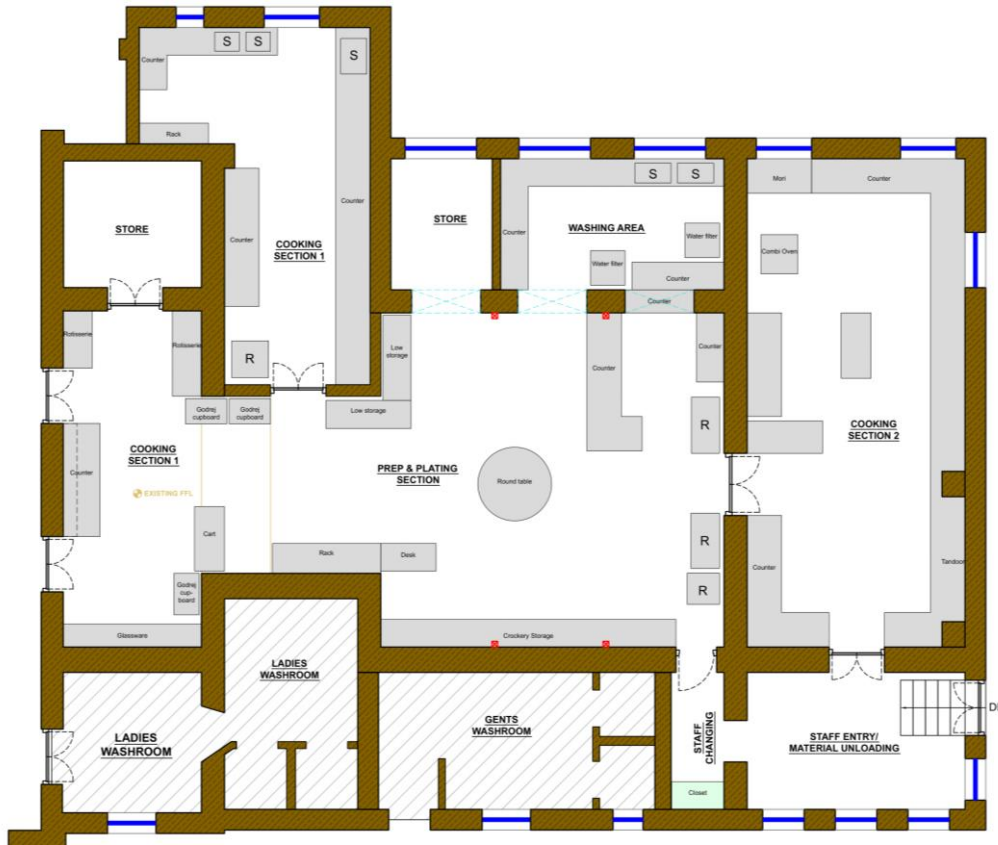
Proposed Lift from Ground to First Floor for easy accessibility

**DHRUTIVAIDYA  
DESIGN STUDIO**

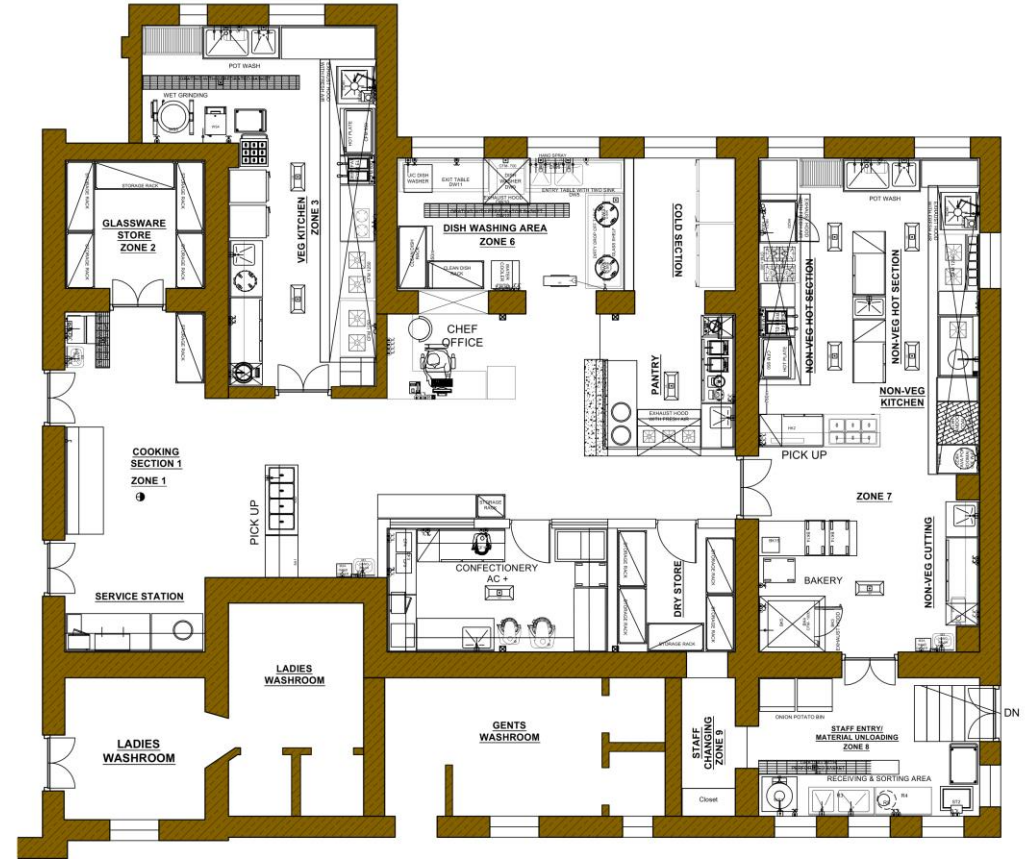
*In the event the proposed lift is rejected by approval committee then we will resort to an alternate plan with the shifted A8 washroom from the lobby and retain similar room configuration.*



# EXISTING AND PROPOSED KITCHEN



Existing kitchen plan



Proposed kitchen plan by Kitchen Krafts



Existing kitchen



Indicative image: proposed kitchen. (without false ceiling).  
The heritage character in the structure will be maintained.

## COMPARISON BETWEEN EXISTING & PROPOSED FINISHES - ROOMS



Typical existing room



Indicative image for proposed rooms decor

1. Bharat tiles Heritage floor
2. Upgraded heritage style furniture
3. A combination of lights on ceilings and walls.
4. Repairing and restoring existing wooden ceiling
5. All damaged windows to be replaced with new wooden windows in same design.
6. All soft furnishing to be replaced.



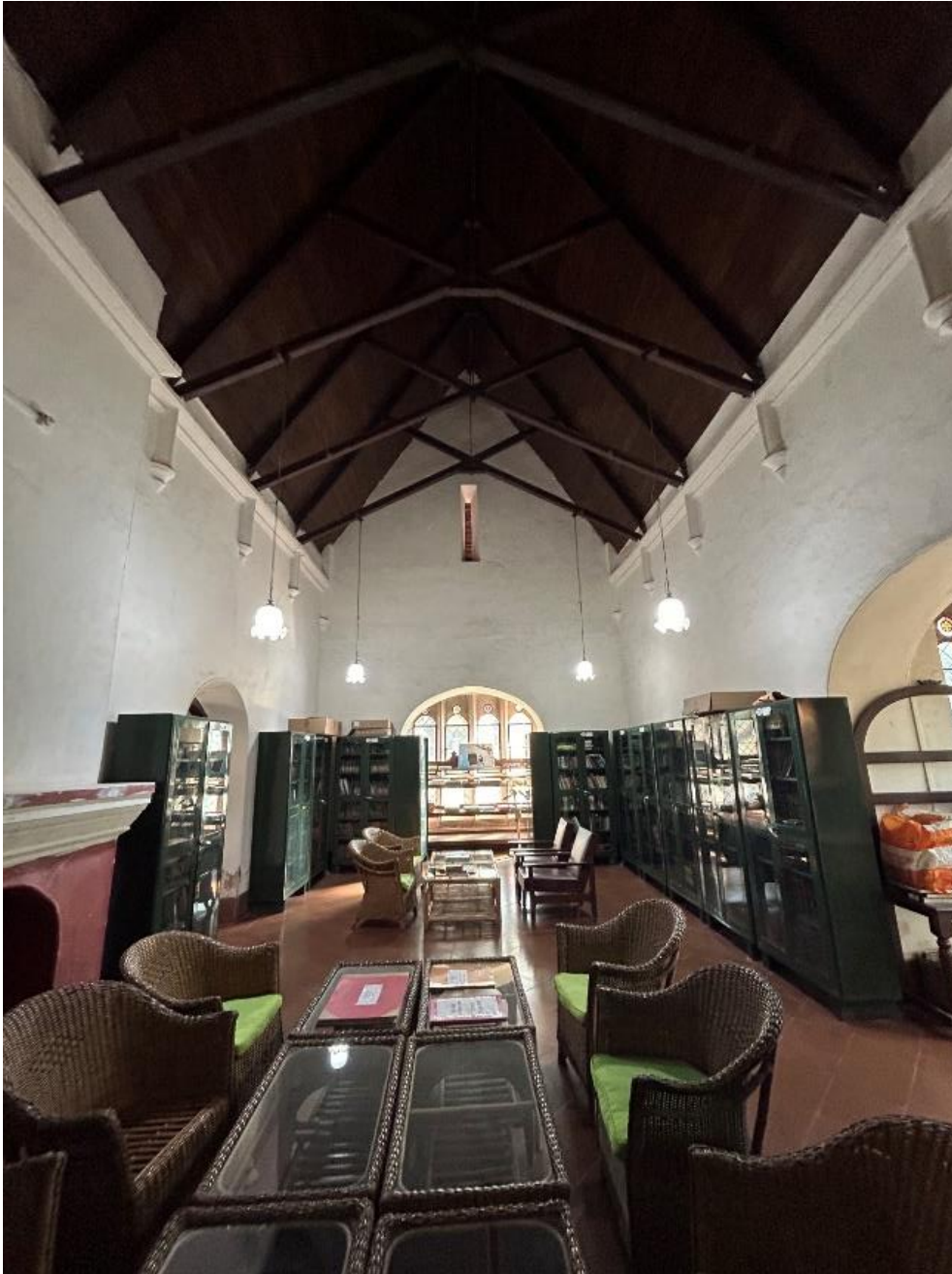
Typical existing bathroom



Indicative image for proposed bathroom decor

1. Heritage style ceramic/ vitrified tiles.
2. Heritage style sanitary ware and fittings.
3. Heritage style lighting.
4. Restoring white ceiling with wooden cornice.
5. All damaged doors and windows to be replaced to new in same design.

**COMPARISON BETWEEN EXISTING & PROPOSED FINISHES - LIBRARY**



Existing Library



Refer to lighting, books storage & loose furniture only



Refer to lighting, books storage & loose furniture only

**PROPOSED ELEVATIONAL CORRECTIONS AND REPAIRS**

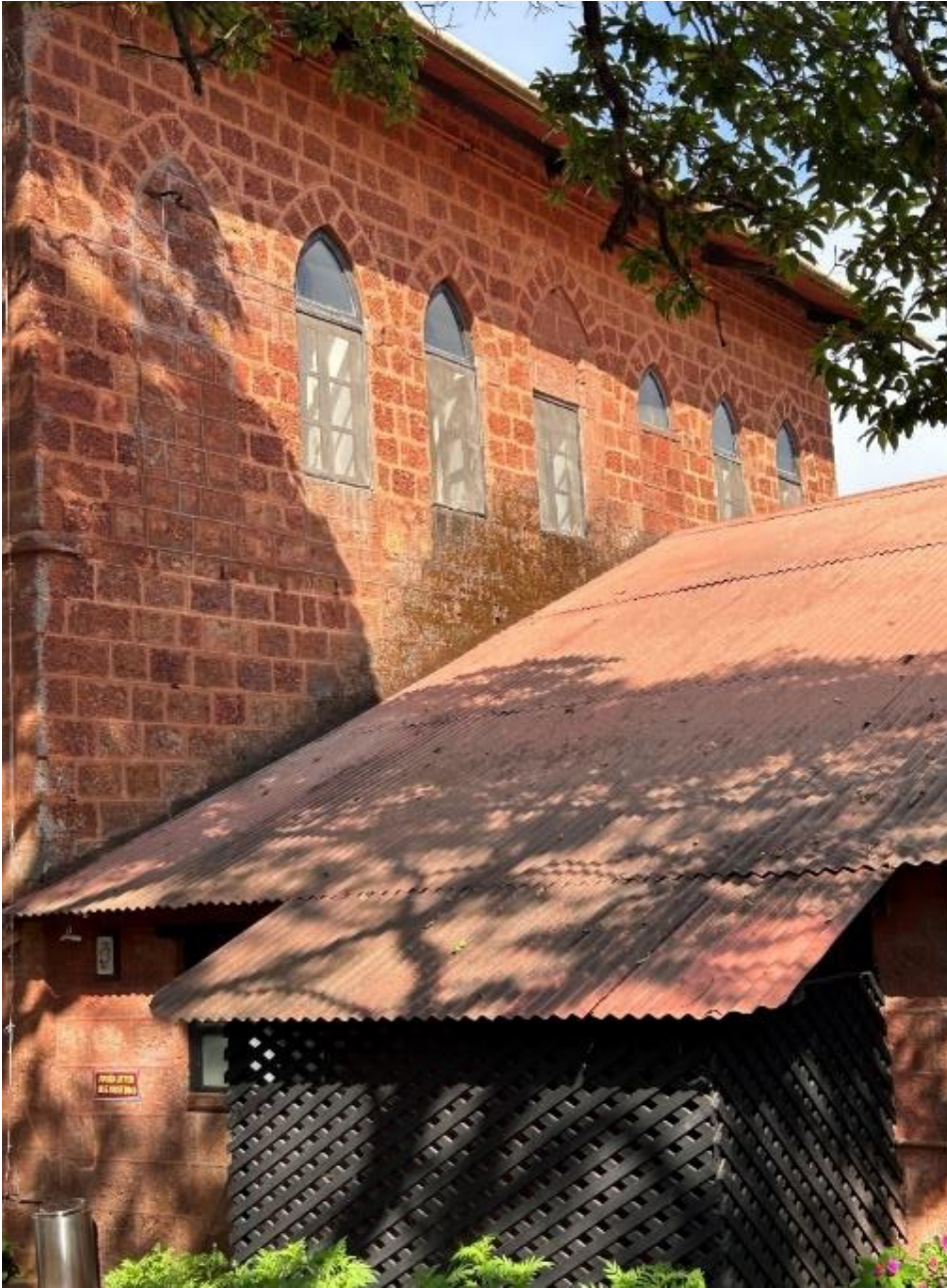


*Note the existing stone ware and GI pipes on the main facade*

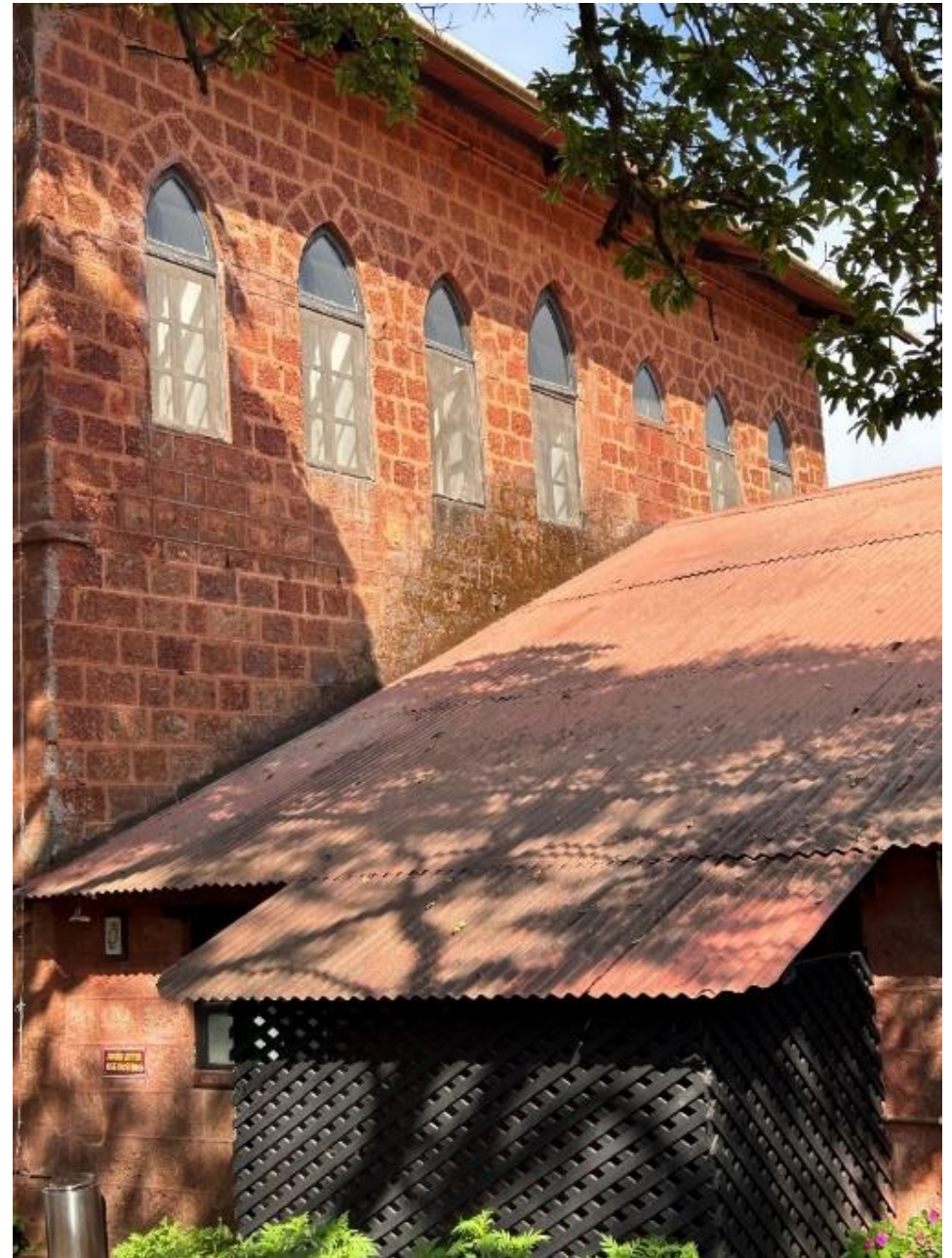


*Removing existing stone ware & GI pipes on the front facade by re-routing them through the internal passage.*

**PROPOSED ELEVATIONAL CORRECTIONS AND REPAIRS**



*Note the window which is closed up on the top left side of Room A2*



*Opening up the window and restoring the facade*

**PROPOSED ELEVATIONAL CORRECTIONS AND REPAIRS**



*Removing brick wall & wooden posts and introducing laterite wall to support the existing roof of kitchen*



*Remove damaged/ warped wooden roofing structure member with new Mild steel structure as this room has wooden ceiling.*



*Removing the Mild steel structure in the store rooms below the kitchen block and structurally casting a new RCC slab*



*Removing redundant cables and re-routing*



*Re-routing the electrical cables in underground fashion and not on the structure*



*Repairs of steps from Patio & doing laterite paving*

## PRELIMINARY BUDGET- RESTORATION & RENOVATION OF A BLOCK

Dhruti Vaidya design Studio, has considered all restoration, repairs and aesthetic elements of design and compiled a preliminary budget as follows;

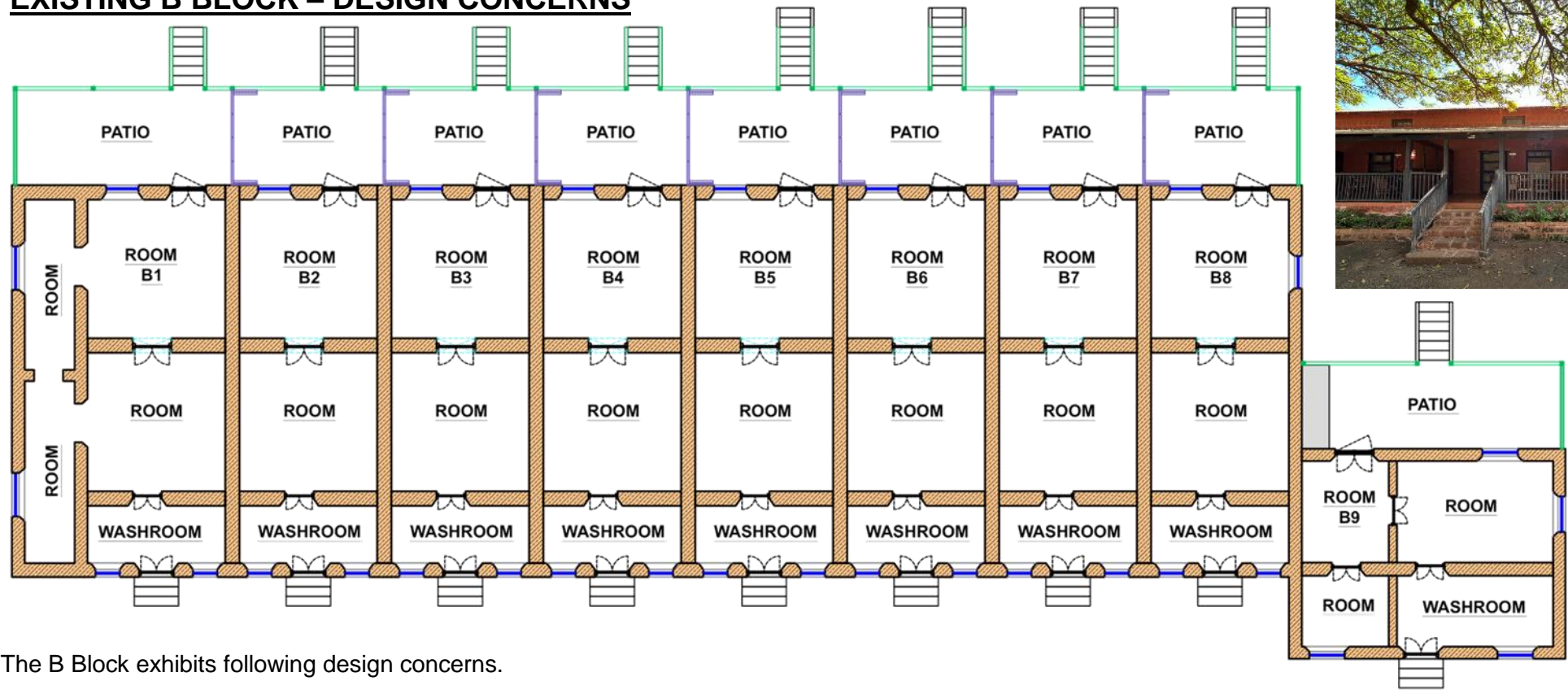
SR	WORKS DESCRIPTION	AMOUNT	
	<b>ANNEXURE 1 -A BLOCK (WITHOUT KITCHEN)</b>		
A	DEMOLITION WORKS	7,10,765	
B	CIVIL WORKS	52,59,942	
C	FALSE CEILING WORKS	18,94,287	
D	CARPENTRY WORKS	64,65,551	
E	ROOFING & FABRICATION WORKS	20,07,115	
F	PLUMBING WORKS	12,73,446	
G	PAINTING & POLISHING WORKS	15,77,498	
H	MATERIALS & MISCELLANEOUS (Elevator included)	87,84,571	
I	ELECTRICAL WIRING WORKS	26,25,600	
	<b>TOTAL OF ANNEXURE 1</b>	<b>3,05,98,775</b>	<b>(A)</b>
	Taxes extra at actuals on above		
	Carpet area of Renovation	12,291	
	Per sqft cost of restoration & renovation	2,490	
	<b>COSTS NOT INCLUDED IN ABOVE ANNEXURE 1</b>		
1	All roofing sheets repairs / replacement.		
2	External plumbing - drainage & septic tank works		
3	Air conditioning works		
4	Electrical appliances		
5	Any works in Frere hall		
6	Painting and polishing of existing wooden trusses/ roof rafters/ purlins, railing		
7	Repairing existing loose furniture or new loose furniture		

<b>ANNEXURE 2 -KITCHEN</b>		
A	DEMOLITION WORKS	1,89,063
B	CIVIL WORKS	27,46,275
C	CARPENTRY WORKS	8,43,255
D	ROOFING & FABRICATION WORKS	2,85,180
E	PLUMBING WORKS	2,41,210
F	PAINTING WORKS	2,51,860
G	MATERIALS & MISCELLANEOUS	6,60,789
I	ELECTRICAL WIRING WORKS	4,62,000
<b>TOTAL OF ANNEXURE 2</b>		<b>56,79,633 (B)</b>
Taxes extra at actuals on above		
Carpet area of Renovation		2,352
Per sqft cost of restoration & renovation including kitchen equipments		2,415
<b>COSTS NOT INCLUDED IN ABOVE ANNEXURE 2</b>		
1	Roofing sheets repairs / replacement.	
2	External plumbing - drainage & septic tank works	
3	Air conditioning & Mechanical ventilation works	
4	Loose furniture, kitchen platforms	
5	Electrical appliances	
6	Kitchen Equipment	
<b>TOTAL OF (A) + (B)</b>		<b>3,62,78,408 (C)</b>
Taxes extra at actuals on above		



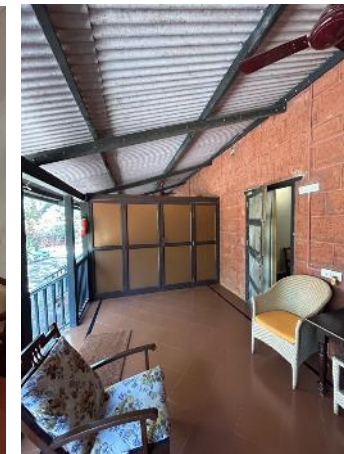
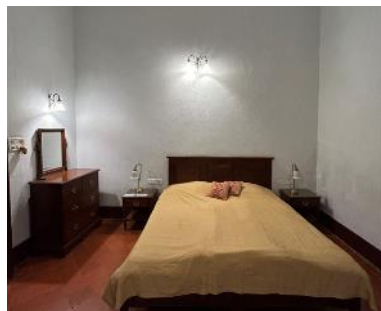
	Following are the Professional Consultancy charges payable as follows (Taxes extra)		
a	Dhruti Vaidya Design Studio; towards Architectural and Interior design	23,40,449	
b	Devang Sutaria & Associates; towards structural consultancy	3,50,000	
c	Kitchen Kraft; towards kitchen consultancy	2,50,000	
d	MEP & Fire consultant	7,00,000	
e	Creative (Liaison)	6,75,000	
	<b>RENOVATION COST WITH CONSULTANCIES</b>	<b>4,05,93,857</b>	<b>(D)</b>
	Total carpet area of renovation	14,643	
	Per sqft cost of restoration & renovation	2,772	
	KITCHEN FROM KITCHEN KRAFTS. - Equipment cost	<b>80,00,000</b>	<b>(E)</b>
	FIRE PROTECTION SYSTEM FOR KITCHEN (Assumed cost)	<b>15,00,000</b>	<b>(F)</b>
	LOOSE FURNITURE (Assumed cost for repair of existing and new furniture)	<b>50,00,000</b>	<b>(G)</b>
	<b>TOTAL COST WITH KITCHEN EQUIPMENT (D) + (E) + (F)</b>	<b>5,50,93,857</b>	
	5% CONTINGENCY (approximately)	<b>29,06,143.00</b>	
	<b>TOTAL PROJECT COST</b>	<b>5,80,00,000</b>	
	Taxes extra at actuals on above		
	In case the elevator permission is not received, then Rs. 22,00,000/- will be deducted from the Project cost		

## EXISTING B BLOCK – DESIGN CONCERNS

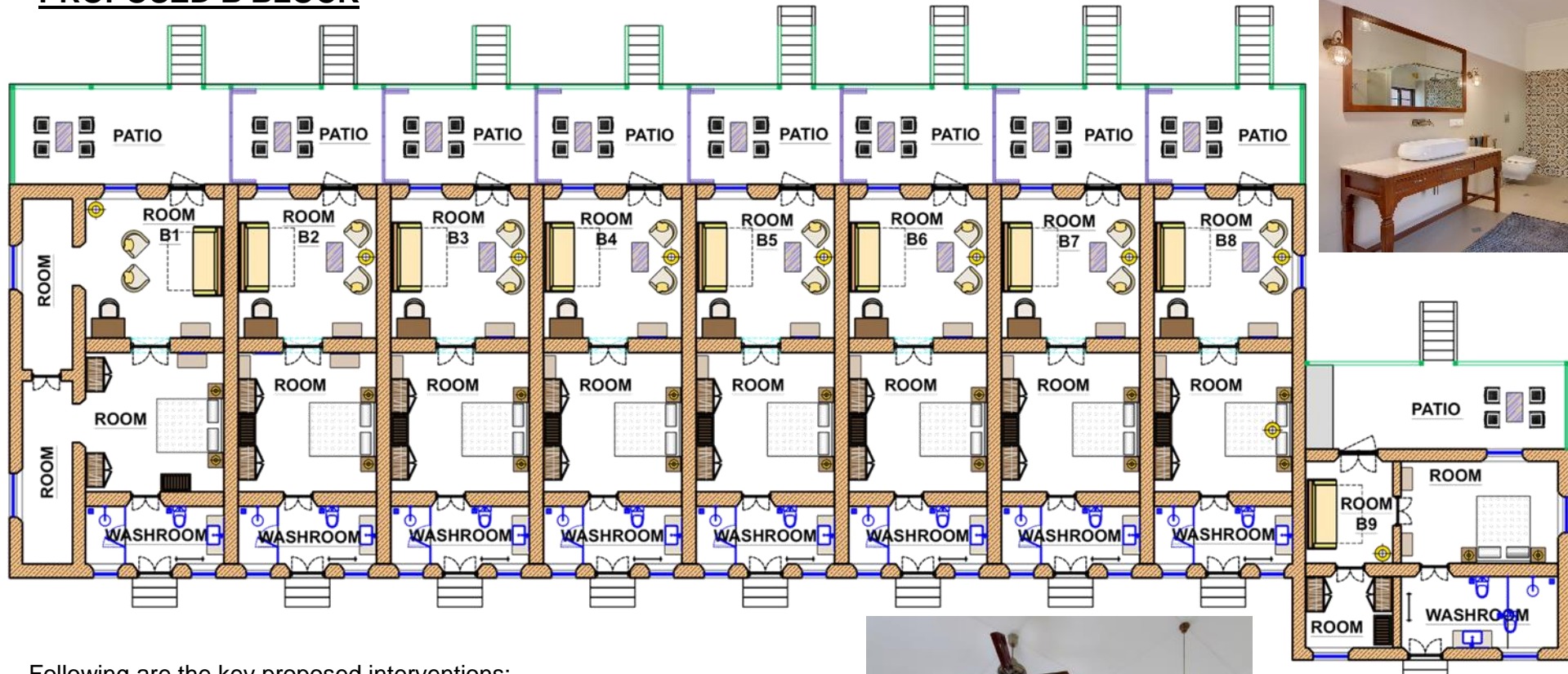


The B Block exhibits following design concerns.

1. Dilapidated, uneven & damaged flooring in rooms and passages.
2. Lack of efficient lighting; rooms look dull. Heritage character needed.
3. Heritage design and aesthetics in Rooms is desired.
4. The wooden railing and its balustrades are broken and damaged.
5. Doors & windows need repairs



## PROPOSED B BLOCK



Following are the key proposed interventions;

1. Door and window repairs as and where applicable.
2. Restoring and renovating all rooms B1 to B9- new Bharat tiles heritage flooring, loose furniture.
3. Heritage style Patio furniture.
4. Heritage style fans and lights
5. Heritage style bathrooms.
6. Cleaning the damaged laterite wall façade and grouting as required.
7. Painting and polishing of all areas under renovation.

## Block B – Proposed change in the railing



*Existing front elevation with wooden balustrades and railing*



*Proposed front elevation with Cast Iron Balustrades with wooden rails*



*Existing railing with Wooden Balustrades*



*Proposed railing with Cast Iron Balustrades*

## PRELIMINARY BUDGET- RESTORATION & RENOVATION OF B BLOCK

Dhruvi Vaidya design Studio, has considered all restoration, repairs and aesthetic elements of design and compiled a preliminary budget as follows;

SR	WORKS DESCRIPTION	AMOUNT
	<b>B BLOCK</b>	
A	DEMOLITION WORKS	4,07,823
B	CIVIL WORKS	23,49,562
C	FALSE CEILING WORKS	5,27,252
D	CARPENTRY WORKS	38,78,365
E	ROOFING & FABRICATION WORKS	3,99,300
F	PLUMBING WORKS	3,87,556
G	PAINTING & POLISHING WORKS	9,17,741
H	MATERIALS & MISCELLANEOUS	47,99,739
I	ELECTRICAL WIRING WORKS	23,34,853
J	LOOSE FURNITURE (Assumed cost for repair of existing and new furniture)	10,00,000
	<b>TOTAL</b>	<b>1,70,02,190</b>
	Taxes extra at actuals on above	
	COSTS NOT INCLUDED IN ABOVE	
1	All existing roofing sheets repairs / replacement and external painting	
2	External plumbing - water supply, drainage & septic tank works	
3	Air conditioning works	
4	Electrical appliances	
6	Painting and polishing of existing wooden trusses/ roof rafters/ purlins inside the false ceiling	
	Following are the Professional Consultancy charges payable as follows (Taxes extra)	
a	Dhruvi Vaidya Design Studio; towards Architectural and Interior design	12,46,762
	<b>RENOVATION COST WITH CONSULTANCY</b>	<b>1,82,48,953</b>
	Total carpet area of renovation	6,429
	Per sqft cost of restoration & renovation	2,839
	5% CONTINGENCY ON (B)	<b>9,12,448</b>
	<b>TOTAL PROJECT COST FOR B BLOCK</b>	<b>1,91,61,400</b>
	Taxes extra at actuals on above	

- Application for heritage permission has been submitted to the Mahabaleshwar Municipal council/ Director Town planning.
- We are in the final stages of floating the tenders to suitable contractors.
- After permissions are received, restoration timeline is approximately 5 to 6 months for complete A & B blocks. Renovation phases of ground floor and first floor are being chalked out and shall be suitably conveyed.