1. INTRODUCTION TO PROJECT

After recognizing the need for the redevelopment of the declared dilapidated buildings on plot Tata Colony (Plot 1) and Bharat Nagar transit Camp (Plot 2) situated on plot bearing S.No.378 (Pt) corresponding CTS No.7643 (Pt) of Village Kole-Kalyan, Tal. Andheri, abutting Bandra Kurla Complex Road, Bandra East, Mumbai, the same is now being proposed to be jointly redeveloped by the M/s **DB (BKC) Realtors Pvt. Ltd. and M/s ABIL Buildcon LLP**. The proposed development on plot under reference is proposed to be composite re-development project that includes part in-situ Rehab Residential Component in separate buildings for rehabilitation of existing tenements and Commercial office space for sale/lease under Sale component in separate buildings.

The new buildings are proposed as follows-

Sr. No.	Details	User
1.	Ground + 19 to be constructed partly on land affected by CRZ-II of Plot 1 and partly outside of CRZ-II	Commercial office space under Sale Component
2.	Ground + 16 to be constructed partly on land affected by CRZ-II of Plot 2	Commercial office space under Sale Component
3.	Ground + 29 to be constructed on Non CRZ portion of Plot 2	In-situ Rehab Residential Component

The proposal has received the Joint Development permission from MHADA as well the Offer letter and the NOC from MHADA with FSI 5.0 under the CBD Scheme in accordance with Development Control & Promotion Regulations 2034 of Municipal Corporation of Greater Mumbai.

Current development thus will help the existing tenant/occupants to get a new, safe and permanent accommodation. As the site under reference is partly affected by CRZ-II zone, it attracts the CRZ legislation as per 6th January 2011 notification for Coastal Regulation Zone (CRZ and the regulating activities in the CRZ).

2. DESCRIPTION OF THE PROJECT

2.1 NATURE OF THE PROJECT

This is a proposal for redevelopment on plot Tata Colony (Plot 1) and Bharat Nagar transit Camp (Plot 2) situated on plot bearing S.No.378 (Pt) corresponding CTS No.7643 (Pt) of Village Kole-Kalyan, Tal. Andheri, abutting Bandra Kurla Complex Road, Bandra East, Mumbai, in CRZ-II belt, as the same is situated within 50 and 100 mtr. of HTL of Vakola Nala and Mithi River and is in CRZ-II as per approved CZMP for Mumbai. The proposal is for redevelopment of declared dilapidated residential building, which is situated on the landward side of existing authorized DP Road in existence prior to 19/2/1991 as seen from the approved CZMP of Mumbai as well as the layout plan approved by MHADA in the year 27.04.1977 of the area and the approved CZMP of the area.The plot falls partly in residential zone and partly in commercial zone and partly earmarked for MHB Transit Camp.

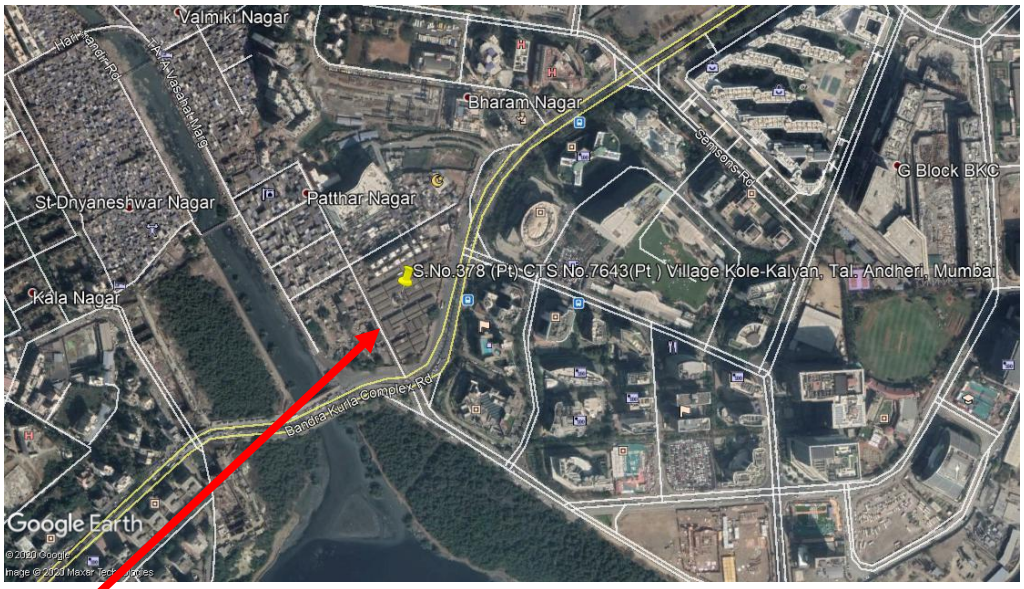
2.2 SIZE OF THE PROJECT

The Gross Area of Plot 1 is 17,940 sq.mts. & Area of plot 2 is 18,000 sq.mts.

2.3 LOCATION

The plot Tata Colony (Plot 1) and Bharat Nagar transit Camp (Plot 2) situated on plot bearing S.No.378 (Pt) corresponding CTS No.7643 (Pt) of Village Kole-Kalyan, Tal. Andheri, abutting Bandra Kurla Complex Road, Bandra East, Mumbai, is in the suburban of the city. The nearest railway station is Bandra Railway Station, 2.7 kilometers on the Western line. The adjacent area is very well developed with all commercial and other facilities in nearby areas.

Google Earth Image of the site



SITE UNDERREFERENCE

CZMP Plan showing location of reference Plot

SITE UNDER REFERENCE

2.4 SITE DESCRIPTION

The site under reference is partly affected by CRZ-II zone and the property falls on landward side of the existing authorized Road, which is reflected in CZMP of Mumbai. Thus property attracts the CRZ legislation as per CRZ - 2011.

Town / Tehsil	:	Mumbai
District	:	Suburban Mumbai
State	:	Maharashtra
Latitude	:	**19° 3'42.72"N**
Longitude	:	**72° 51'30.51"E**

2.5 PROPOSED DEVELOPMENT

2.5.1 AREA STATEMENT

A	PROFORMA -- A	PLOT -01	PLOT -02
1)	AREA OF PLOT	18328.23	20490.43
2)	(A) DEDUCTIONS FOR		
	(a) FOR reservation / Road Area		
	(b) Road Set -Back Area	484.47	
	(c) Proposed D.P Road	1440.97	1188.20
	(d) Reservation Area	387.71	
	(B) FOR AMENITY AREA		
	(a) Area Of Amenity		
	Total Deduction (2A + 2B)	2313.15	
	Balance Area Of Plot	17940.52	18000.00
5)	ADDITIONS FOR FLOOR SPACE INDEX.		
	2 (c) 100% FOR D.P. ROAD		
	2 (a) 100% FOR SET- BACK		
	2 (b) 100% FOR LAYOUT ROAD		
6)	TOTAL AREA	17940.52	18000.00
7)	FLOOR SPACE INDEX PERMISSIBLE	1.00	1.00
8)	FLOOR SPACE INDEX credit available by development rights		
	8 (a) 0.50 F.S.I. AS Per Table no.- 12 of DPCR 30 (a)	8970.26	9000.00
	8 (b) 1.00 TDR AS Per Table no.- 12 of DPCR 30 (a)	17940.52	18000.00
	8 (c) 2.50 F.S.I AS Per DPCR 33 (19)	44851.30	45000.00
9)	PERMISSIBLE FLOOR AREA (6 X7) PLUS 8	89702.60	90000.00
10)	EXISTING FLOOR AREA	0	0
11)	PROPOSED BUILT UP AREA.	79625.27	79406.00
12)	EXCESS BALCONY TAKEN IN FLOOR SPACE INDEX		
13) 3A 1	PURELY RESIDENTIAL BUILT UP AREA		22025.19
13) B	REMAINING NON- RESIDENTIAL BUILT UP AREA	79625.27	79406.00
14)	TOTAL BUILT UP PROPOSED. (10 +11+12)	79625.27	101431.19
15)	F.S.I. CONSUMED. ON NET HOLDING = 14/3	0.89	1.13
B	DETAILS OF FSI AVILED AS PER DCR 35 (4)		
	(1) FUNGIBLE BUILT UP AREA COMPONENT PROPOSED VIDE DCR 35 (4) FOR RESIDENTIAL	0.00	7708.81
	(2) FUNGIBLE BUILT UP AREA COMPONENT PROPOSED VIDE DCR 35 (4) FOR NON-RESIDENTIAL = OR < (14B X 0.20)	27868.85	27792.26
	(3) TOTAL FUNGIBLE BUILT UP AREA VIDE DCR 35 (4) = (B.1+B.2)	31395.91	31500.00
	(4) TOTAL GROSS BUILT UP AREA PROPOSED (14+B.3)	107494.12	136932.26

2.5.2 UTILITIES

The Utilities required during the construction phase area water, power, fuel and Labour.

i) **WATER REQUIREMENT IN CONSTRUCTION PHASE (ESTIMATE):**

For construction: 90 – 5100 m³/day. (Depending on construction activity)

Note: Treated sewage from temporary STP of the occupied buildings shall be used for construction activity of proposed development. This will help to reduce the fresh water demand for construction activity.

i) **WATER REQUIREMENT IN OPERATIONAL PHASE:**

Use	**Water Requirement in m³/d**	**Source**
Domestic	1041	MCGM
Flushing	711	STP Treated Sewage
Gardening	38.6	
Total Water Requirement	**1790.60**	

Dried sludge from STP will be used as manure for gardening/landscaping.

1] Source: - Water will be available from Mumbai (MCGM) for domestic use and from Tanker for construction purpose.

2] Storage: -Water for construction will be stored in open tank.

Drinking water will be stored in HDPE tank

ii) **POWER**

During Operational Phase -

Power Requirement: Reliance Energy Load – 10,025 KW

Solar Energy would be utilized as renewable energy source. It will be provided for common area lighting, street lighting, garden and corridor lighting

iii) FUEL

DURING OPERATION PHASE

Diesel will be required to run the D. G. Set in case of power failure, in emergency case only.

1. Storage: Diesel and oil will be stored as per guidelines from concerned authorities.

2. Fire and safety measures will be taken as per the guidelines from concerned authority.
3. All Safety and fire precautions will be followed.

3. ENVIRONMENTAL CONCERNS

3.1 AIR POLLUTION

During construction phase, Dust, Particulate Matter is the main pollutant, which may be generated during construction activities. Other emission sources are intermittent and include emissions of SO_2NOx and CO from materials transport of heavy vehicles on site etc. Proper upkeep and maintenance of vehicles, sprinkling of water on roads and construction site are some of the measures that would reduce the impact during construction phase.

Sources of Air pollution During Operational phase :

• The gaseous emissions from vehicles.

• Emissions from DG set while in operation only during power failure.

3.2 AIR POLLUTION MITIGATION

• The traffic congestion will be avoided by proper parking arrangement and maintaining smooth Traffic flow.

• Regular PUC check-up for vehicles.

• CPCB approved DG sets will be used and its stack height will be maintained as per CPCB norms.

• Proper maintenance of DG sets shall be done and low sulphur fuel shall be used.

3.3 WATER POLLUTION

1] **During Operational** Phase:- The Domestic water requirement will be met by MCGM. The flushing and gardening water requirement will be met through water which is recycled by STP.

2] **During construction phase** -The runoff from the site during construction phase would be very negligible. This will be prevented as under:

i) Use of wet jute cloth covering the walls and soaking the same with minimum quantity of water to avoid dripping. This will also help in conserving water.

ii) By collecting the running water in an impervious pit and using the same again for curing purpose.

3] **Rain Water Harvesting**: -. Roof rain water harvesting is proposed in the project. Rain water collection tanks will be provided for collection of roof top rain water.

4] **Storm Water Discharge**: There will be proper storm water drains which will be provided all around the project site, to effectively manage the storm water run-off. Storm water drain shall be cleaned at regular interval. Mapping the areas within or leading in or out of the building that will be water logged, flooded or isolated due to the flood.

The areas will be marked after completion of the project (as final ground levels etc. will be available after completion). The vulnerability of the basement should be mapped. Dewatering pumps shall be installed at vulnerable locations.

3.4 NOISE LEVEL MITIGATION

The proposed project being residential cum commercial redevelopment, the source of noise is mainly vehicular noise. The project proponents have proposed to provide well organized parking arrangement and maintaining smooth traffic flow which would help in reducing traffic congestion and noise levels. Trees would act as noise barrier and will reduce the noise level.

D.G. Sets will be operated only in case of power failures during operational phase. The Pollutants like PM10, SO_2 that may arise from emissions from D.G. Sets will be discharged through vent of proper height. D.G. sets are with inbuilt acoustic enclosures to reduce the noise of D.G. sets while in operation. Plantation of trees would act as noise barrier and will reduce the noise level.

3.5 SOLID WASTE MANANGMENT DURING OPERATIONAL PHASE

Segregation of non-biodegradable and biodegradable garbage will be done on site.

- Treatment of biodegradable waste: By OWC and IVC method
- Segregation, storages facilities for all solid waste streams
- Non- biodegradable garbage: Will be segregated into recyclable and non-recyclable waste. Recyclable waste shall be handed over to recyclers and non-recyclable waste shall be handed over to M.C.G.M.
- E waste generated during operation phase shall be stored separately and disposed of to the recyclers authorized by MPCB.

Type of Waste	**Approximated quantity**
Wet waste	1907.4 Kg/day
Dry waste	1413.45 Kg/day
Total solid waste	3320.85 Kg/day

Hazardous wastes:

There will be separate storage for Hazardous wastes and its disposal shall be done to authorized common hazardous waste disposal site respectively for further treatment and disposal as per the "Hazardous and Other Wastes (Management and Trans boundary Movement) Rules, 2016."

E waste :

E-waste generated during construction phase shall be stored at distinct location within project site and subsequently E-waste shall be handed over to authorized recyclers as per the "*E-Waste management Rules, 2016"*.

DEMOLITION WASTE AND CONSTRUCTION WASTE MANAGEMENT

Local Municipal norms shall be followed to ensure responsible disposal of C & D waste.

3.6 POWER CONSERVATION

A Variety of measures have been proposed to reduce energy requirements given below:

- Energy efficient building envelope and elevator system.
- Solar Photovoltaic system will be installed and the percentage of renewable energy would be 4 %.
- LED & T5 Light to reduce amount of light at different stages of buildings
- High efficiency pumps, level controllers, BEE rated interior & exterior lighting fixtures having lighting power densities 20% lower than the green building base lines, Installation of CFC free equipments.
- The proposed building will be provided with auto sensor taps.
- Entire HVAC systems are monitored and controlled by comprehensive Building Management System to achieve energy saving.
- Intelligent Building Management system to monitor & control of all A/c & Major Electrical equipments, along with water pumps.
- Electrical distribution system will be monitored regularly and energy consumption will have check meter, so that any energy loss will be detected and will be rectified immediately.
- Insulated Roof shall be used to reduce heat gain. Solar reflective paint or roof insulation with 80 mm expanded polystyrene is considered.
- Use of Variable Refrigerant Volume Flow (VRF) system

- Use of Energy-Efficient Elevator Systems, Integrated Building Management System

3.7 SEISMICITY:

As per the Seismic Zoning Map of India Mumbai region falls under Zone- III. Stability Certificate, as per prevalent IS Code is obtained for these buildings from registered Consulting Structural Engineer considering the seismic forces and wind forces etc.

4.0 OPERATIONAL PHASE

- About 1,401 cars are expected to be accommodated in the premises. There is ample space in this building on all sides for smooth movements of cars.
- There will be 6.0 mtrs wide approach road to the building from municipal road for movements of vehicles and parking.
- Thus the traffic management will be easily and smoothly monitored without any hindrance to the regular flow of traffic on the main road.

6. ENVIRONMENTAL, HEALTH AND SAFETY

61 SAFETY MEASURES ON SITE

1. Parameters and Quality will be strictly adhered to as per the drawings approved by MCGM. Necessary regulations of government authorities will be followed.
2. Necessary safety precaution will be observed as per the guidelines during the construction phase. Appropriate Personal Protective Equipments (PPE) will be provided to all the personnel involved in the construction activities.
3. Site barricading up to height of 5.0mtr will be done to protect the surrounding area of the project site from nuisance/ dusting.
4. All electrical connections & cables will be checked by authorized persons to ensure the safety of workers on field.
5. Water sprinkling will be done, wherever required to reduce the dusting in atmosphere.

7. BENEFITS OF THE PROJECT

- It will provide employment opportunities to the local people in terms of labour during construction and services personnel during operational phase.
- Modern sanitation and infrastructure facilities will have minimal impact on living condition of local people.
- The project will improve living standard and welfare of the area and local people.