To PINA ACME OZONE 19/1/12 ①

C.F.O COPY & PLANS

ASHWOOD & OAKWOOD

दुरध्वनी : २५३३ १२११
२५३३ १५९०

ठाणे महानगरपालिका

महानगरपालिका भवन, डॉ. अल्मेडा रोड, चंदनवाडी, पाचपाखाडी, ठाणे-४०० ६०२.
THE MUNICIPAL CORPORATION OF THE CITY OF THANE

संदर्भ क्र./ठा.म.पा./
Ref./T. M.C./C.F.O/M-1900/194

दिनांक / / २००
Date 18 / 03 / ~~200~~ 2010

To,
The Asst. Director of Town Planning
Thane Municipal Corporation,
Thane

Sub: Grant of N.O.C. stipulating, Fire Protection & Fire Fighting requirements for the proposed Development on land bearing Gut No.61/1, 61/2 at Village Chitalsar (Manpada) Tal & Dist, Thane.
For Ascent Construction Pvt. Ltd.
Through Director Shri.Pravin H. Doshi .

Re:
i. A letter from an Architect Shri. Subhash Gupte dt. 26th Feb. 2010
ii. V.P. No. 88/142
iii. Site Visit 05/03/2010

Dear Sir,

Proposal is to construct commercial building Gut No.61/1, 61/2 on plot bearing at Village Chitalsar (Manpada) Tal & Dist, Thane. **For Ascent Construction Pvt. Ltd. through Director Shri.Pravin R. Doshi**

The architectural plans of proposed buildings are referred to the Chief Fire Officer, Thane Fire Brigade, Thane by an Architect **Shri. Subhash Gupte, Gupte College, Opp. Bhakti Mandir, Panchpakhadi, Thane (W) 400 602.** The plans of these buildings are scrutinized by this department as per existing buildings by-laws from the point of fire safety and means of escape.

Observations and Directives of Chief Fire Officer, Thane Fire Brigade, Thane for the said proposal are given below.

OBSERVATIONS & DIRECTIVES:

1) Net area of Plot is 44133.20 Sq. mt. in area.

2) This Plot is approachable by 20.0 mt. wide Existing Road from South side.

3) 9 buildings on sub plot 'B'& 9 buildings on sub plot 'A' are proposed on the above referred plot.

4) Plans for building No. 2 (Oakwood) & bldg.No. 3(Ashwood) is 3 level podium + Stilt + 30th floors are scrutinized by this department.

5) Building No.2 (Oakwood) 3 level podium + Stilt + 30th floors is floors i.e.90.40m in height from last podium.
Building No. 3 (Ashwood) 3 level podium + Stilt + 30th floors is floors i.e.90.40m in height from last podium.
All podium should withstand the load of 45 tuns.

6) Adequate Open Spaces are proposed around the building.

7) Two staircases in building No. 2 & 3 are having the Width of 1.50 mt.

8) Three lift in building No. 2 & 3 out of which two are attached with each other.

9) Refuge area is proposed from 3rd podium on the 8th , 13th ,18th, 23rd, & 28th floor in the proposed building No. 2 & 3.

10) Adequate 1.8 m wide fire escape passage is provided.

Considering the above situation following fire prevention and protection measures are recommended for the building.

MAIN D.P.ROAD:

This Plot is approachable by 20.00 mt. wide Existing Road from South side .

SUGGESTIONS :

No additional fire protection and preventions measures are recommended for the Main D. P. Road.

OPEN SPACE:

S.NO	SIDE	OPEN SPACE
01.	NORTH	12.00 mt.
02	SOUTH	12.00 mt.
03.	EAST	12.00 mt.
04.	WEST	15.00 mt.

SUGGESTIONS :

Minimum 6mts open space around all the buildings must be maintained free of all encroachments / obstructions for easy movements of fire appliances & same shall be capable of taking the load of fire engines upto 30 tons.

ENTRY GATES:

1. Two gates are proposed for the entire plot, which are on the west & south side. The width and height clearance of the proposed gate is not mentioned on the architectural plans.

SUGGESTIONS:

1. Height clearance and the width of these gates shall not be less than 5 mt.

HEIGHT, FLOOR AREA & OCCUPANCY :
The height floor area and occupancy of various floors of Building type is as follows:

No	Bldg. No	FLOOR	FLOOR AREA	OCCUPANCY
1	2	3 level podium + Stilt		Parking
		1ST to 7th floor	3389.54 sq.mtrs.	Residential
		8th, 13th ,18th ,23rd ,28th floor	2065.0 sq. mtrs.	Residential / Refuge Area
		9th to 12th ,14th to 17th 19th floor to 22nd floor , 24th to 27th & 29th,30th floor.	8715.96. mtrs.	Residential
2	3	3 level podium + Stilt		Parking
		1ST to 7th floor	3581.76sq.mt	Residential
		8th, 13th ,18th ,23rd ,28th floor	2250.55sq.mt	Residential / Refuge Area
		9th to 12th ,14th to 17th 19th floor to 22nd floor , 24th to 27th & 29th,30th floor.	9210.24sq.mt	Residential

FIRE ESCAPE PASSAGE:-Adequate 1.8 m wide fire escape passage as per prevailing D.C.Rule is provided.

- It must be ensured that, power cables to fire lift are laid along the route, which is fire safe.
- Power supply to fire lift must be automatically trip over type to the alternate source at power supply in the event of failure of normal power supply.

REFUGE AREA :

Proposed Residential building No 2 & 3 of 90.4 m. in height from 3rd podium level. So refuge area has to be provided in the buildings as per the existing buildings by-laws.

Refuge area 74.85 sq. mtrs. is proposed on the 8th ,13th 18th, 23rd ,& 28th floor in Building No. 2 & Refuge Area 67.84 sq. mtrs. is proposed on the 8th ,13th 18th, 23rd ,& 28th floor in Building No. 3 which is proposed as "REFUGE AREA" is adequate and location is also acceptable by the fire brigade department.

SUGGESTIONS :

Following additional suggestions are recommended for the purpose refuge area:

- The layout of refuge areas shall not be changed /modified at any time in future.
- There shall not be any opening in to the refuge area from any portion of the occupied premises.
- Refuge area shall be segregated by brick masonary partition wall of 9" thickness & 0access to the refuge area shall be gained through half an hour fire resistant self-closing door.
- Lifts &/or open type staircases shall not be in to refuge area.
- Clear height of the refuge areas below the beam/drop paradi shall not be less than 1.80 mtrs. and not more than 2.20mtrs.
- The refuge areas shall be ear-marked exclusively for the use of occupants as a temporary shelter & for the user of fire brigade department & any other organization dealing with fire or other emergencies when occurs in the building and also for exercise / drills if conducted by the fire brigade department.
- The refuge area shall not be allowed to be used for any other purposes & it shall be responsibility of the owner/occupier to maintain the same clean & free of encumbrances of encroachment at all times.
- The entrance door to the refuge area shall be painted or fixed with a sign painted in luminous paint mentioning "Refuge Area – In case of Emergency".
- Adequate drinking water facility shall be provided in the refuge area.
- Adequate emergency lighting facility connected to the electric circuits of staircase, corridor/passage etc. lighting shall be provided.

ELECTRICAL INSTALLATIONS:

General recommendations from the point of fire safety for electrical installations are as follows :-

- The electric distribution cables/wiring for the buildings shall be laid in separate duct. The duct shall be sealed at every alternative floor with non-constructive material, having the same fire resistance as that of the duct.
- Water mains, telephone lines, inter-com lines or any other service line shall not be laid in the duct for electrical cables.
- Separate circuits for water pumps, lifts, staircase & corridor lighting shall be provided directly from the main switch gear panel & these circuits shall be laid in separate conduct pipes so that, fire in one circuit will not affect the others. Master switches controlling essential services circuits will not affect the others. Master switches controlling essential services circuits shall be clearly labeled.

- Medium & low voltage wiring running in shaft & if it is in the false ceiling it shall run in metal conduct.

All the lobbies and corridor of above 13th floor should be sprinkled .
Entire podium should be sprinkled (sprinkler system)

SUGGESTIONS:

- Fire Brigade Department has no objection for the Height, Floor area & Occupancy of the proposed commercial buildings.

MEANS OF ESCAPE :

- Two enclosed staircase having the width of 1.50 mt. are proposed in the building no. 2 & 3
- Treads are of 10 inch in width & risers are of 6 inches in high for the proposed staircase.
- 1.8 m wide fire escape passage is proposed in the building no. 2 & 3
- Staircase of proposed building allows movement of fresh air.
- The layout of staircase in the building shall be of enclosed type for the entire height.

SUGGESTIONS :

- This proposed enclosed staircase shall be reached via ventilated lobby and shall have access through self-closing doors of at least half an hour of fire resistance.
- Doors shall be single swing doors opening in the direction of the escape
- The door shall be fitted with check action door- closers.
- Permanent vent at the top equal to 5% of cross sectional area of staircase shall be provided in the proposed building.
- Openable sashes at each floor level with area equal to 15% of cross sectional area of the enclosure on the external wall shall be provided.
- Staircase of the propose building must be well illuminated around the clock.
- Lighting for the staircase of all the buildings must be connected to stand by electric supply.
- Lifts shall not be used as a means of escape during emergency.
- All the exits & directions of travel to exits must be conspicuously marked with illuminated signs.

MEANS OF ENTRY :

- Three out of two lifts which are attached with each other, are proposed in building 2&3.
- The lifts of the building are of high speed in nature.

SUGGESTIONS :

- Planning & Design of the lifts shall be in accordance with the latest National Building Code (i.e. Sections 5, Installations of lifts & Escalators)
- Lifts of the building are to be provided with automatic steel doors for lift cars & landings.
- One lift in the buildings shall be designed & designated as fire lift. This lift shall be equipped with firemens switch for grounding it in the event of fire.
- Walls of each lift enclosure shall have fire resistance of not less than 2 hours.
- Landing doors in the lift enclosures must have fire resistance of not less than 1 hour.
- Lift car doors shall have fire resistance of 2 hours.
- Separating wall of 2 hours fire resistance railing shall be provided between the lift shafts.
- Fire lifts of the building shall be conspicuously painted with florescent paint on all landing doors of the fire lift.
- Fire lifts of the building can be however used for other purposes under normal conditions.
- The fire lift of the building shall meet the following requirements :-
  - It must be connected to standby source of power supply.

ELECTRIC CABLE SHAFTS AND ELECTRIC METER ROOMS :

Electric cable shafts shall be exclusively used for electric cables and shall not open in the staircase enclosure.
Electric meter rooms shall be provided at stilt floor level. They shall be adequately ventilated.
Electric shafts shall be sealed at each floor level with non-combustile material such as vermiculite concrete.
Inspection door for the shaft if provided shall have two hours fire resistance.

ALTERNATE SOURCE OF POWER SUPPLY :

An alternative source of L.V./H.V. supply from a separate sub-station with appropriate change over switch shall be provided for fire-pump, fire lift, staircase & corridor lighting circuits manual fire alarm system & jocky pump. It shall be housed on/in a separate cables. In addition to this an equal capacity of D.G. set shall be provided.

ESCAPE ROUTE LIGHTING:

Escape route lighting (Staircase, & Corridor lights) shall be on independent circuits as per rules.

FIRE FIGHTING REQUIREMENTS:

Underground Water Storage Tank :
An underground water storage tank of not less than 1,50,000 ltrs. Capacity for the building No. 2 & 3 each exclusively for fire fighting shall be provided at ground level as location marked on the plan. As per the design specified in the rules with battle walls & fire brigade collecting breaching. Underground tank shall be connected to wet risers & courtyard hydrant system.

OVERHEAD (TERRACE) WATER STORAGE TANK :

Another tank of 20,000 ltrs. capacity shall be provided at terrace level of the building No. A. The design & layout of this tank shall be got approved from concerned department prior to its erection. The tank shall be connected to wet riser through a booster pump through N. R. Valve & Gate Valve.

WET – RISER :

For residential building one wet-riser of internal diameter of 15cms of G.I. 'C' class pipe shall be provided in the duct adjoining the staircase with twin hydrant outlet & hose-feel on each floor in nitches in such a way as not to reduce the width of corridor. Pressure reducing discs or ori ficies shall be provided at lower level so as not to exceed pressure pressure of 5.5 kgs. / cm^2. A fire service inlet on the external face of the building near the static tank directly fronting the courtyard shall be provided to connect the mobile pump of fire service to the wet riser.

Sprinkler should be provided for Podium & Corridor of Building above 12th floor.

FIRE PUMP & BOOSTER PUMP :

- Wet riser of building shall be connected to a fire pump at ground level of capacity of not less than 3200 LPM capable of giving pressure of not less than 3.2 kg/cm^2 at top most hydrant.
- Booster pump of capacity 900 L.P.M. giving a pressure of not less than 5.2 kg/cm at top most hydrant out let at the wet-riser shall be provided at the terrace level of each building.

- Electric supply (normal) to these pumps shall be on independent circuits.
- Subermission pump is not allowed.

EXTERNAL HYDRANT :

Four external hydrants for each building shall be provided for the proposed buildings within the confines of the site on the wet-Riser at location marked on the plan.

HOSE-REEL :

Near each alternate external hydrant of building hose reel shall be installed. Each hose reel tubing terminating in to shut off nozzle of 5mm outlet. Hose reel shall be connected DIRECTLY TO THE RISERS & IT SHALL CONFIRM TO THE LATEST CODES 8090.

HOSE-BOXES:

Near each internal hydrant, hose boxes to be provided in the building. Each box shall be equipped with 2 X 15 meter length of 63 mm rubber line hose along with standard branch pipe. It shall confirm to latest IS code 636 & 903 respectively.

PORTABLE FIRE EXTINGUISHERS :

The following portable extinguishers shall be provided at the electric meter room (Service) at ground floor level/ stilt & at lift machine room at terrace level.

1. D. C. P. type fire extinguishers of 5 kg capacity with ISI marks – 2 no.
2. Buckets filled with dry clean sand – 2nos.
3. 2 kg ABC type fire Extinguish to be provided in each kitchen
4. Every Kitchen Room must have portable fire extinguishers

FIRE ALARM SYSTEMS :

Propose building shall be provided with manual fire alarm system with main control panel at ground level & pillboxes & hooters at each at the upper floor levels. The layout of the fire alarm system shall be in accordance to the Indian Standard Specifications.

Sr. No.	Building No.	Capitation Fee (Rs).	D.D.No. and Date	Receipt No. and Date
1	2 & 3	Rs. 23,96,272/-	024501 dated 12/03/2010	207917 dated 15/03/2010 FIR/HQ/000968/2009

Sr. No.	Building Type	Scrutiny Fee (Rs).	D.D.No. and Date	Receipt No. and Date
1	2 & 3	Rs.16,44,956/-	024500 dated 12/03/2010	207916 dated 15/03/2010 FIR/HQ/000967/2009

T.D.O. department is requested to verify the total built – up area and inform this office and if same is found to be more for the purpose of levying additional Capitation Fees, if required.

Chief Fire Officer

Thane Fire Bridge Thane.