

**GOVERNMENT OF WEST BENGAL
OFFICE OF THE DIRECTOR GENERAL
WEST BENGAL FIRE & EMERGENCY SERVICES
13-D Mirza Ghalib Street, Kolkata- 700 016**

Memo No : IND/WB/FES/20192020/70112

DATE: 02/01/2020

From :

The Director

Fire Prevention Wing,

West Bengal Fire & Emergency Services.

To :

SRIJAN REALTY PRIVATE LIMITED AND OTHERS

132, Ghoshalpara Road, Mouza – Manikpur, J.L. No. 77, L.R. Dag Nos. 304,305, 477, 478, 481 to 483, 485 to 490, 492, 493, 496, 498 to 507, 510 to 520, 522 to 526, 528, 530, 535, 536, 539 to 542, 545, 546, 567, 568, 572 and others

Baruipur F.S., sonarpur,

South 24 Parganas - 700148 .

Sub :Revised Fire Safety Recommendation for a proposed construction of Block- 8 (G+XVIII) , Block - 9 (Adjoining Block G+XVIII), Block - 10 A & B(G+XVIII) , Block - 11(G+XIII), Block- 12,(G+XI) , Block - MLCP-(G+VII)storied under group Residential building in addition of existing Block -1,3,4,5,6 and Block - 7 at the premises no.- 132, Ghoshalpara Road, Mouza – Manikpur, J.L. No. 77, L.R. Dag Nos. 304,305, 477, 478, 481 to 483, 485 to 490, 492, 493, 496, 498 to 507, 510 to 520, 522 to 526, 528, 530, 535, 536, 539 to 542, 545, 546, 567, 568, 572 and others, sonarpur, South 24 Parganas - 700148.

This is in reference to your Application No. IND/WB/FES/20192020/70112,dated 02/01/2020, regarding the Fire Safety Measure for a proposed construction of Block- 8 (G+XVIII) , Block - 9 (Adjoining Block G+XVIII), Block - 10 A & B(G+XVIII) , Block - 11(G+XIII), Block- 12,(G+XI) , Block - MLCP-(G+VII)storied under group Residential building in addition of existing Block -1,3,4,5,6 and Block - 7 at the premises no.- 132, Ghoshalpara Road, Mouza – Manikpur, J.L. No. 77, L.R. Dag Nos. 304,305, 477, 478, 481 to 483, 485 to 490, 492, 493, 496, 498 to 507, 510 to 520, 522 to 526, 528, 530, 535, 536, 539 to 542, 545, 546, 567, 568, 572 and others, sonarpur, South 24 Parganas - 700148..

The plan submitted by you was scrutinized and marked as found necessary from Fire Safety

point of view. In returning one set of plan with recommendation, this is issuing Revised Fire Safety Recommendation in favour of the aforesaid building subject to the compliance of the following fire safety measure.

Recommendation:

1.

*** ALL RECOMMANDATION FOR THE SAID PROJECT PREVIOUSLY ISSUED FROM THIS DIRECTORATE SHALL BE STRICTLY FOLLOWED, MOREOVER THE FOLLOWING UNDER MENTIONED POINTS SHALL BE COMPLIED.

A.CONSTRUCTION :

1.The whole construction of the proposed building shall be carried out as per approved plan drawings conforming the relevant building rules of local Municipal Body.

2. The interior finish decoration of the building shall be made low flame spread materials conforming I.S. specifications.

3.Provision of ventilation at the crown of the central core-duct of the building shall be provided.

4.Arrangements shall have to be made for sealing all the vertical ducts by the materials of adequate Fire resisting capacity.

B.OPEN SPACE & APPROACH :

1.The open space surrounding the building shall conform the relevant building rules as well as permit the accessibility and maneuverability of Fire appliance with turning facility.

2.The approach roads shall be sufficiently strong to withstand the load of Fire Engine weighting up to 45 M.T.

3.The width and height of the access gates into the premises shall not be less than 4.5 – 5 M respecting abutting the road.

C.STAIRCASE :

- 1.The staircase of the building shall be enclosed type. Entire construction shall be made of bricks / R.C.C. type having Fire resisting capacity not less than 4 hours.
- 2.The staircase of the building shall have permanent vents at the top and openable sashes at each floor level in the external wall of the building.
- 3.The width of the staircases shall be made as marked in the plan. Corridors and the exit doors shall conforming the relevant building rules and well as rules of the cinematograph Act. With up-to-date amendments.
- 4.All the staircase shall be extended up to terrace of the building and shall be negotiable to each other without entering into any room.
- 5.Fire and smoke doors at the entrances of all the Staircase enclosures as marked in the plan at each floor level shall be provided. The F.C.D. shall be of at least one hour Fire resisting wire glass window fitted with self-closing type openable in the direction of escape.

D. LIFT:

- 1.The wall of the lift enclosure shall be at least two hours Fire resisting type.
- 2.Collapsible gate shall not be permitted.
- 3.One of the lift shall be treated as fire Lift as per I.S. Specification.

D.FIRE FIGHTING WATER :

Underground water reservoir having water capacity at 2,00,000 ltrs. and Overhead reservoir of 10,000Ltrs. capacity exclusively for Firefighting purpose with replenishing arrangements @ 1000 lts./min. Preferably from two different sources of water supply shall be provided. The water reservoir shall have overflow arrangement with the domestic water reservoir as well as to avoid stagnancy of water. The water reservoir shall be kept full at all time.

E.HYDRANT SYSTEM :

1The building shall be provided with Wet Riser at 150mm. internal diameter Pipe Line with provision of landing valves at the Staircase landings / half landings at the rate of one such riser for 1000 Sq.m. of floor area. The system shall be so designed that shall be kept charged with Water all the time under pressure and capable to discharge 2400 lts/min. at the ground floor level outlet and minimum 900lts/min. at the top most outlet. In both cases the running pressure shall not be less than 3.5Kgs/Sq.cm. All other requirements shall conforming I.S.

3844 – 1989.

2 Provision for Hose Reel in conjunction with Wet Riser shall be made at each floor level. Conforming the relevant I. S. Specifications.

3 Yard Hydrant / Ring Main Hydrant with provision of four numbers Hydrant shall be installed surrounding the building in accordance with relevant I.S. specifications.

F. SPRINKLER INSTALLATION :

The automatic Sprinkler installation shall be provided in parking area, all floor area of the building including the residential area those buildings / blocks heights are beyond 45Mtrs. Alarm gang to be incorporated along with the Sprinkler system.

G. FIRE PUMP :

Provision of the Fire Pump shall have to be made to supply water at the rate-designed pressure and discharge into the Water based system, which shall be installed in the building. One such pump shall always be kept on stand-by preferably be of diesel driven type.

Provision of Jockey Pump shall also have to be made to keep the Water based system under pressurized condition at all the time. All the pumps shall be incorporated with both manual and auto starting facilities. The suction of pumps shall preferably be of positive type or in case of negative suction the system shall be wet riser-cum-down comer with suitable terrace pump with overhead tank.

One set of pumps shall be provided for each 100 hydrants or part thereof, with a maximum of two sets. In case of more than one pump set installation both pump sets shall be incorporated/ interconnected at their delivery headers

H. ELECTRICAL INSTALLATION & DISTRIBUTION :

1 The electrical installation including transformers, Switch Gears, Main & Meters etc. and the distribution system of the premises shall be made satisfying the code of practice for Fire safety in general building as laid down in I.S. specification 1946 – 1982.

2 The vertical ducts shall be supply sealed at alternative floor level.

3 The electrical installation shall be adequately protected with CO₂/D.C.P. or Medium Velocity

/ Projector System.

4. Alternative Power Supply :

Arrangements shall have to be made to supply power with the help of a generator to operate at least the Fire Pump, Pump for deep Tube-well, Fire Alarm System, Fire Lift etc. and also for illuminating the Staircase, corridors etc. and other places of assembly of the building in case of normal power failure.

I. DETECTION & ALARM SYSTEM :

1. Manually operated Electrical Fire Alarm system with at least three numbers of break glass type call boxes fitted with Hooters along with public address system, talk back system at each floor connecting with audio-visual panel board shall be made in Control Room. The Control Room shall be located at the entrance of Ground Floor of the building, other requirements of the system shall be made conforming I.S. 2189 – 1988.

2. Auto fire detection system with the help of Flent and smoke detector shall be installed in all places of below and preferably above false ceiling, all floor area of the building. The system shall also be made in places of rooms where valuable articles have been kept. The other requirements of the system shall be made in accordance with I.S. 2189-1988.

3. Hooter will be sounded in such a manner so that an operation of a Detector or Manual Call Point Hooters will be sounded on the same floor and immediate alternate floor.

4. Public Address System :-

Public address system linked between all floors and Control Room shall have to be established.

J. AIR CONDITIONING SYSTEM (If any) :

1. The A.H.U. shall be separated for each floor with the system Air Ducts for individual floors.

2. Arrangement shall be made for isolation at the strategic locations by incorporating auto dampers in the Air Conditioning system.

3. The system of auto shut down of A.H.U. shall be incorporated with the auto detection and alarm system.

4.The air handling units room shall not be used for storage of any combustible materials.

K.FIRST AID FIRE FIGHTING SYSTEM :

First Aid Fire fighting arrangement in the style of placing suitable type of portable Fire Extinguishers, Fire Buckets etc. in all floors and vulnerable locations of the premises shall be made in accordance with I.S. 2190 – 1992.

L. BASEMENT (if any)

- 1.The Basement shall be adequately ventilated.
2. Additional staircase from the open air as shown in the drawing shall be constructed beside the ramps conforming relevant I.S. Specification.
- 3.The Basement shall be protected with automatic Sprinklers system and hose, hose reel hose systems etc.
- 4.Mechanical extractor for smoke venting systems from basement levels shall also be provided. The systems shall be of design as to operate on actuation of heat /smoke sensitive detector or sprinklers. It shall also have an arrangement to start it manually.
- 5.Mechanical extractors shall have an alternative source of supply.

M. MULTI LEVEL CAR PARKING :

1A parking structure having each parking level wall opening open to atmosphere, for an area of not less than 0.4m² for each linear meter of its exterior perimeter shall be constructed as open parking structure. Such opening shall be distributed over 40percent of the building perimeter or uniformly over two opposing sides. Interior wall lines shall be at least 20percent open, with opening distributed to provide ventilation, else the structure shall be deemed as enclosed parking structure.

2All parking areas sprinklers and hydrant systems shall be provided as per I.S. Specification.

3All parking areas appropriate/ suitable detection systems shall be provided as per I.S. Specification.

4 Each floor surface shall be non combustible, sloping towards drains to remove accumulation of oils, lubricant and water etc.

N. FIRE FIGHTING SHAFT:

- 1 An enclosed shaft having protected area of 120 min fire resistance rating comprising protected lobby, staircase and fireman's lift ,connected directly to exit discharge or through exit passageway with 120 min fire resistant wall at the level of exit discharge to exit discharge. These shall also serve the purpose of exit requirement /strategy for the occupants. The respective floors shall be approachable from fire fighting shaft enabling the fire fighters to access the floor and also enabling the fire fighting assist in evacuation through fireman's lift. The fire fighting shaft shall be equipped with 120min. fire doors,fire men talkback system,wet riser and landing valve in its lobby to fight fire by fire fighters.
- 2The pressurizations shaft shall be provided to establishment of a positive pressure different across inside the fire fighting shaft (i.e staircase and lift lobby) from other area of floors to protect smoke and flame penetration inside the fire shaft as per I.S. Specification.
- 3Fire refuge platform shall be provided at the same staircase of the fire shaft as per NBC part –IV,2016.

O. GENERAL RECOMMENDATIONS :

- 1.Fire License shall have to be obtained for proposed storing and processing with L.P.G. and other highly combustible articles.
- 2.Fire Notice for Fire Fighting and evacuation from the building shall be prepared and be displayed at all vulnerable places of the building.
- 3.Floor numbers and directional sign of escape route shall be displayed prominently.
- 4.A Fire Kiosk measuring about 100Sq. Ft. at the ground level of the each propose building shall be provided at the convenient place containing with the different arrangement of first aid fire fighting arrangements.
- 5.The employees and security staff shall be conversant with installed Fire Fighting equipments of the building and to operate in the event of Fire and Testing.
- 6.Arrangement shall be made for regular checking, testing and proper maintenance of all the Fire Safety installation and equipments installed in the building to keep them in perfectly good working conditions at all times.

7.A crew of trained Fireman under the experienced Officer shall be maintained round the clock for safety of the building.

8.Mock Fire practice and evacuation drill shall be performed periodically with participation of all occupants of building.

9.A certificate is to be obtained from the Director General, West Bengal Fire & Emergency Services certifying about the satisfactory services, performance of all the Life and Fire Safety arrangements and installation of the building.

On compliance of all the above Fire and Life safety recommendations, the Director General, West Bengal Fire & Emergency Services shall be approached for necessary inspection and testing of the installation, The Fire Safety Certificate in favor of the occupancy shall be issued on being satisfied with the tests and performances of safety aspects of installation of the building.

N.B. :Any deviation and changes the nature of use of the building in respect of the approved plan drawing, without obtaining prior permission from this office, this Fire and Life safety recommendations will be treated as cancelled.

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