Total No. of Questions—**8**] [Total No. of Printed Pages—**3**

Seat No.	

[5352]-507

S.E. (Civil) (II Sem.) EXAMINATION, 2018
ARCHITECTURAL PLANNING & DESIGN OF BUILDINGS
(2015 PATTERN)

Time : Two Hours **Maximum Marks : 50**

N.B. :— (*i*) Assume suitable data, if required.
(*ii*) Figures to the right indicate full marks.
(*iii*) Solve Q. No. **1** *or* Q. No. **2** and Q. No. **3** *or* Q. No. **4** in answer-book.
(*iv*) Solve Q. No. **5** *or* Q. No. **6**, Q. No. **7** *or* Q. No. **8** on Drawing Sheet only.

Q 1 A) Explain the following : Height zoning and Density zoning (6)

B) Explain any two aspects of Green Building planning with sketch. (7)

OR

Q2 A) Enlist the documents to be submitted for seeking Commencement Certificate and Occupancy Certificate. (7)

B) Differentiate between building line & control line by drawing a suitable sketch. (6)

Q3 A) Explain the need for earthquake resistant structures in relation with - loss of human life; property and infrastructure. (6)

B) The internal dimensions of a factory building are 30 m x 20 m x 10 m. The number of air changes required per hour are 6, the indoor temperature is 36°C and outdoor temperature is 30°C. Find the area of openings required, if the distance between the inlet and outlet openings is 6 m. (6)

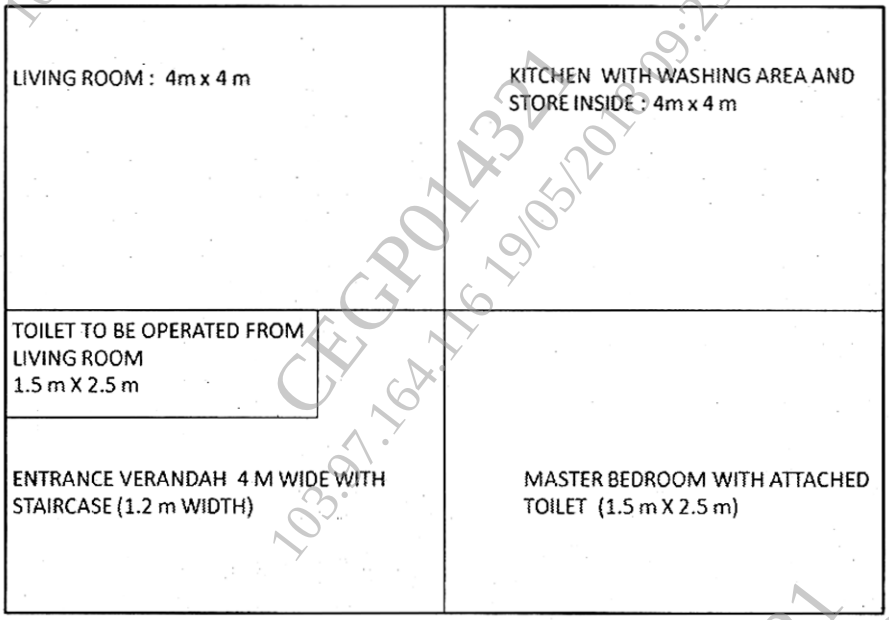
P.T.O.

OR

Q4 A) Explain the following terms (any three): i) SP ii) CV iii) PP iv) FSI (6)

B) What are Acoustic Defects? Explain the need of rectifying the same in relation with Radio Station. (6)

Q 5 Draw a detailed Floor Plan to a scale of 1:50 or otherwise; of a residential building for the given line plan below. Use following data: RCC framed structure, Wall thickness,150 mm for all, Single storey building, Plinth height 450 mm, All dimensions in the sketch are in m. Indicate suitable locations & sizes of doors, windows and staircase and write the schedule of openings . (13)



OR

Q 6 Draw a detailed Floor Plan to a scale of 1:50 with following data: (13)
i) Living room 1 no. approx. area 15 m^2 ii) Kitchen cum Dining 1 no. approx. area 15 m^2 iii) Bed rooms 2 no. approx. area 12 m^2 each iv) Floor to floor height 3.0 m v) R. C. C. structure vi) Plinth in UCR masonry vii) Varandah, Passage, Staircase, W.C. and Bath / attached toilet etc. of suitable sizes should be provided. Indicate North.

Q 7 Design a single storey hostel building for girls and draw only the Line Plan with following data: i) Number of girls to be accommodated : 75 ii) Thirty rooms are two seated with 7.5 sqm area per student and fifteen single seated with 9.5 sqm area. iii) Recreation room approx. area 40 m^2 iv) Gymnasium approx. area 15 m^2 v) Office space approx. area 12 m^2 vi) Store room approx. area 15 m^2 vii) Varandah, Passage, Staircase, W.C. and Bath etc. of appropriate dimensions should be provided. Show North direction and mention scale. (12)

OR

Q8 Draw a line plan of a Post Office using following data : A) Entrance and moving space : 30 m^2 with seating arrangement B) Public dealing counters : cabins ,6 in no with area 2m x 2m each C) Post master's room :15 m^2 D) Working area for other staff : 30 m^2 E) Post separation room : 30 m^2 F) Safe custody area for cash : 10 m^2 G) Cash transaction room : 15 m^2 H) Speed Post Delivery Section : 15 m^2 I) Water room and Toilet (separate for male and female) : 7.5 m^2 (12)