

Roll No.

24865

B. Tech. 7th Sem. (Fire Tech. & Safety)

Examination – December, 2016

FIRE FIGHTING INSTALLATION & AUTOMATION

Paper : FT-409-F

Time : Three Hours]

[Maximum Marks : 100

Before answering the questions, candidates should ensure that they have been supplied the correct and complete question paper. No complaint in this regard, will be entertained after examination.

Note : Attempt any *five* questions in total. Questions No. 1 is *compulsory* and must be attempt *one* question from each Section.

1. (a) Explain the specification of Dry-rises. $4 \times 5 = 20$
- (b) Define the Hydrant system.
- (c) Discuss the different types of foam.
- (d) Explain the working principle of heat detector.

SECTION – A

2. Explain the different installation for fire fighting. 20
3. Explain the wet rise and their specification of each type. 20

SECTION – B

4. Explain the designing procedure of MVWSS sprinkler system. 20
5. Write the short notes on the following :
 - (a) Designing of fire hydrant system 10
 - (b) Types of sprinkler system and its specification 10

SECTION – C

6. Explain the procedure to install the foam for the fire fighting in an oil tank. 20
7. Explain the following term :
 - (a) Base Injection 10
 - (b) Sub-surface injection 10

SECTION – D

8. Explain the working principle, testing and maintenance of optical beam detector. 20
 9. Explain the Installation procedure of Dry Powder with their characteristics operation and designing arrangement. 20
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