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SF-8319

B. E. III (Sem. VI) (Chem.) Examination

May / June – 2011

Pollution Control & Safety Management

Time : **3** Hours] [Total Marks : **100**

Instructions :

(1)

નીચે દર્શાવેલ ☛ નિશાનીવાળી વિગતો ઉત્તરવહી પર અવશ્ય લખવી.
Fillup strictly the details of ☛ signs on your answer book.

Name of the Examination :

☛ **B. E. 3 (Sem. 6) (Chem.)**

Name of the Subject :

☛ **Pollution Control & Safety Management**

☛ Subject Code No. : **8 3 1 9** ☛ Section No. (1, 2,.....) : **Nil**

Seat No. :

Student's Signature

(2) Figures to the right indicate full marks.

(3) Draw neat sketches wherever required.

(4) Assume suitable data if necessary.

1 (a) Answer the followings : **2×5=10**

(i) What is E1A and E1S ?

(ii) Enlist the different control techniques for air pollutants.

(iii) What are the environmental pollution in general and in chemical industry ?

(iv) What is pollution prevention ?

(v) Write down the labour limits in brief.

(b) Write a short note on natural cycle. **8×1=8**

2 Attempt any **two** : **8×2=16**

(a) Write down the sources, causes and effects of air pollution.

(b) Write down the methodologies for pollution prevention.

(c) Write a short note on Air Act.

3 Attempt any **two** : **8×2=16**

(a) Write a short note on solid waste treatment.

(b) Explain environmental audit in detail.

(c) Explain the Industrial Dispute Act and Workmen Compensation Act.

4 Attempt the following : **16**

(a) What is Safety Management ? Explain rules and regulation for Safety Management in Industry.

(b) List out various Hazard identification techniques and explain Hazop in brief with its importances.

5 Attempt any **two** : **16**

(a) Explain difference between Fire and Explosion in brief with various points involve in prevention of fire.

(b) List out various safety devices. Explain pressure safety valve with neat sketch.

(c) List out various types of explosion and explain each in brief.

6 Answer the following : (any **three**) **18**

(a) Explain about various Personal Protective Equipments in brief.

(b) Explain various types of "Plume" and "Puff" models of dispersion.

(c) Explain Fault Tree Analysis.

(d) Explain Event Tree Analysis.
