



C09-AEI-606 B

**3720**

**BOARD DIPLOMA EXAMINATION, (C-09)  
APRIL/MAY—2015  
DAEI—SIXTH SEMESTER EXAMINATION**

**POWER PLANT INSTRUMENTATION**

*Time : 3 hours ]*

*[ Total Marks : 80*

---

**PART—A**

3×10=30

**Instructions :** (1) Answer **all** questions.

(2) Each question carries **three** marks.

1. Define material balance and energy balance.
2. List the types of mixers.
3. Define humidification.
4. List the types of condensers used in power plant.
5. Write the working principle of alternators.
6. List the variables of boiler process.
7. Describe the turbine trip condition.

- \* 8. Describe the working principle of compressors.
9. Write about soot blowers.
10. Write a short note on cooling tower.

**PART—B**

10×5=50

**Instructions** : (1) Answer *any five* questions.

(2) Each question carries **ten** marks.

11. Explain the principle and working of nuclear power plant.
12. List the different types of evaporators and explain the working of single-effect evaporators.
13. Explain the flash distillation process.
14. Explain feedback regulation drum level control.
15. Explain main stream temperature control.
16. Write about condenser vacuum control.
17. List different types of pumps and explain centrifugal pump.
- \* 18. Explain about water treatment plant.

\*\*\*