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C09-MNG-405

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BOARD DIPLOMA EXAMINATION, (C-09)
OCTOBER/NOVEMBER-2018
DMNG - FOURTH SEMESTER EXAMINATION

MINE ENVIRONMENTAL ENGINEERING

Time : 3 Hours]

[Total Marks: 80

PART-A

3X10=30

Instructions :
1. Answer **All** questions.
2. Each question carries **three** marks.
3. Answer should be brief and straight to the point and shall not exceed five simple sentences.

1. State the purpose of ventilation.
2. Define the laws of mechanical ventilation
3. List the limitations of Natural ventilation.
- * 4. List the merits and demerits of centrifugal fan.
5. List the limitations of splitting.
6. State laws of air friction.
7. List the ideal conditions for splitting.
8. List the conditions requiring the use of booster fan.
9. List the methods of quantity survey.
10. Define the ventilation survey.

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PART-B

10X5=50

Instructions :

1. Answer any **Five** questions.
2. Each question carries **ten** marks.

11. List the conditions suitable for producing N.V briefly explain the same.
12. Compare between forcing vs exhaust fans.
13. State the formula to determine pressure, velocity, co-efficient of cross section, quantity and area of rubbing surface.
14. Derive the formula of equivalent orifice.
15. Explain the construction, filed of application of each ventilation device with sketches.
16. Explain the system of auxiliary ventilation system of single heading with brattice cloth and with ducting with sketch.
17. (a) Explain the objects of qualitative survey
(b) List the equipment required for qualitative survey
18. Explain the objects of ventilation survey

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