

Seat No. **OCT-NOV 2025 WINTER EXAMINATION****1154 B.Tech. CBCS****Sub. Name: Water Resources Engineering - II****Sub. Code: 67749/84746/84931****Day and Date: Tuesday ,09-12-2025****Total Marks: 70****Time: 10:30 AM To 01:00 PM**

Instructions: 1. Assume suitable data wherever necessary and mention it boldly
 2. Draw neat labelled diagrams wherever necessary
 3. Figures to the right indicate full marks

Special Inst.: 1) Que. No. 4 from Section - I & Que. No. 8 from Section - II are compulsory.
 2) Attempt any two questions from Que. No. 1,2,3
 3) Attempt any two questions from Que. No. 5,6,7

- Q1) Answer the following [10]**
- a. Explain different factors affecting selection of a site for dam ? [5]
- b. Describe area capacity curve and area elevation curve in detail with its importance in reservoir planning ? [5]
- Q2) Answer the following [10]**
- a. Enlist different forces acting on a dam ? Explain in detail any four forces acting on it along with supporting sketch ? [5]
- b. Enlist the types of dams with neat sketches. Explain their suitability. [5]
- Q3) Answer the following [10]**
- a. What is Energy dissipation? Explain types of energy dissipation work. [5]
- b. Classify the spillways. Describe any one in detail. [5]
- Q4) Answer the following (Any three) [15]**
- a. Describe selection criteria of spillways. [5]
- b. Write note on – Galleries in dam with its types. [5]
- c. Explain Storage zones & control levels in reservoir. [5]
- d. What is High dam & Low dam? Explain. [5]
- Q5) Answer the following [10]**

- a. Compare between bligh's creep theory and Khosal's theory ? [5]
- b. Along with neat sketch explain any four components of Diversion Head Work in detail ? [5]

Q6) Answer the following [10]

- a. Discuss in detail selection criteria for canal lining. [5]
- b. Write a note on :C.D. Works [5]

Q7) Answer the following [10]

- a. Write in detail about Meandering- causes, factors controlling process and features. [5]
- b. Write a note on River training works with its objectives & methods (any one with sketch) [5]

Q8) Answer the following (Any three) [15]

- a. Write a note on types of Hydro power plant [5]
- b. Describe in brief types of Weir with neat sketch. [5]
- c. Write a note on : Types of canals [5]
- d. Write a note on: Surge tanks with its types. [5]

End Of Question Paper

Important Note for Chief Exam Officer / SRPD Coordinator / Sr Supervisor/ Student -

This Question Paper may be distributed for following Subjects as common code.

सदरची प्रश्नपत्रिका खालील विषयांकरिता वितरित करता येईल.

1] (101) Bachelor of Engineering (67749) Water Resources Engineering II Part 4 SEM 8

2] (1154) B.Tech. CBCS (84746) Water Resources Engineering - II Part 4 SEM 8

3] (101) Bachelor of Engineering (84931) Water Resources Engineering - II Part 4 SEM 8