



भारत सरकार
जलशक्तिमंत्रालय
जलसंसाधननदीविकासएवं
गंगासंरक्षणविभाग
केंद्रीयजलआयोग,
राष्ट्रीयजलअकादमी



Government of India
Ministry of Jal Shakti
Dept of Water Resources,
River Development & GR
Central Water Commission
National Water Academy



प्रति/To,

1. The Member (D&R) / Member (WP&P)/ Member (RM), CWC, New Delhi
2. The Chairman NDSA, New Delhi
3. The Chief Engineer, DSO & Project Director DRIP II & III, CWC, New Delhi
4. Principal Secretary, State Water Resources /Irrigation Department
5. Engineer-in-Chief, State Water Resources / Irrigation Department
6. The Heads of DRIP Implementing State Govts.

विषय: राष्ट्रीय जल अकादमी पुणे में, केन्द्रीय जल आयोग, *Training Programs on “Design Flood Analysis”* and *“Dam Break Analysis”* विषय पर क्रमशः 03-06 June 2025 तक तथा 09-12 June 2025 तक प्रशिक्षण कार्यक्रम का आयोजन - नामांकन के संदर्भ में।

महोदय/ महोदया,

राष्ट्रीय जल अकादमी पुणे में, *Training Programs on “Design Flood Analysis”* and *“Dam Break Analysis”* विषय पर क्रमशः 03-06 June 2025 तक तथा 09-12 June 2025 तक दो प्रशिक्षण कार्यक्रमों का आयोजन किया जा रहा है। इन कार्यक्रमों से संबंधित प्रमुख बिन्दुएँ पृष्ठांकित (*overleaf*) है। विस्तृत ब्योरा सहित कार्यक्रम विवरणिका (*Program Brochure*) भी संलग्न है। इन प्रशिक्षण कार्यक्रमों के लिए मुख्य विवरण नीचे दिए गए हैं:

S No.	Name of Program	Duration & Days	Last date of receipt of nomination/s	Acceptance of Nomination/s	Participants' Profile
1	Design Flood Analysis	03-06 जून 2025 (4 days)	28 मई 2025	28 मई 2025	This training course is intended to the officers of Central/State Govt. /PSUs/NGOs/Institutions/others in the rank of JE/ AE/AEE/EE/SE or equivalent and officers of dam owners involved in the activities of Dam Safety/Dam operation/Dam maintenance etc.
2	Dam Break Analysis	09-12 जून 2025 (4 days)	02 जून 2025	02 जून 2025	

अनुरोध है कि संलग्नक में दिए गए स्तर के अधिकारियों को इस कार्यक्रम से लाभ उठाने हेतु यथाशीघ्र नामित करने का कष्ट करें तथा नामांकन ईमेल के माध्यम से की ईमेल आईडी nwa.pune@gmail.com में भेजें। राज्य सरकारों के विभागों के अधिकारियों के लिए इन प्रशिक्षण कार्यक्रमों में भाग लेने हेतु कोई भी प्रोग्राम शुल्क नहीं है। चूंकि उपरोक्त दोनों कार्यक्रम बांध सुरक्षा के विषय पर हैं और एक दूसरे से संबंधित हैं, प्रतिभागियों को preferably उपरोक्त दोनों कार्यक्रमों के लिए नामांकित किया जा सकता है, हालांकि उन्हें कोई एक कार्यक्रम के लिए भी नामांकित किया जा सकता है।

Design Flood Analysis और Dam Break Analysis के लिए आवश्यक डेटा क्रमशः Annexure-I और II में संलग्न है। प्रशिक्षण कार्यक्रम के दौरान अध्ययन करने के लिए किसी विशिष्ट Dam के लिए Annexure-I और II में उल्लिखित डेटा का एक पूरा सेट लाने की सलाह दी जाती है। प्रतिभागियों को सलाह दी जाती है कि वे अपना लैपटॉप स्वयं लेकर आए ताकि वे अपने डेटा के साथ Hands-on पूरा कर सकें। नामांकनों की स्वीकृति की पुष्टि हमारी वेबसाइट/ (<http://nwa.mah.nic.in>) पर प्रकाशित की जाएगी। नामांकित अधिकारियों से अनुरोध है कि वे से अपने नामांकन की NWA स्वीकृति प्राप्त करने के बाद ही अपने स्थान से कार्यक्रम के लिए यात्रा शुरू करें/पुष्टि।

भवदीय

संलग्न: प्रोग्राम बुलेटिन, Annexure-I और II

एस के दास
निदेशक



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Sub: **Training Programs on “Design Flood Analysis” and “Dam Break Analysis” at NWA, Pune during 03-06 June and 09-12 June 2025 respectively – Nominations – reg.**

Sir /Madam

Training Programs on “Design Flood Analysis” and “Dam Break Analysis” are planned to be conducted at NWA, Pune during 03-06 June and 09-12 June 2025 respectively. Brochure giving details of the programs are enclosed. Details for this training program are as given below:

S No.	Name of Program	Duration & Days	Last date of receipt of nomination/s	Acceptance of Nomination/s	Participants' Profile
1	Design Flood Analysis	03-06 June 2025 (4 days)	28 May 2025	28 May 2025	This training course is intended to the officers of Central / State Govt. /PSUs/NGOs/Institutions/others in the rank of JE/ AE/AEE/EE/SE or equivalent and officers of dam owners involved in the activities of Dam Safety/Dam operation/Dam maintenance etc.
2	Dam Break Analysis	09-12 June 2025 (4 days)	02 June 2025	02 June 2025	

It is requested that **nominations** of the officers of the profile indicated above may please be sent in email nwa.pune@gmail.com so as to reach NWA by the **last dates as given above**. Complete details (address, email, telephone, mobile, fax) of the nominated officer(s) and the controlling officer(s), name/s of modules may please be provided while sending the nomination/s. **As both the programs mentioned above are on the subject of Dam Safety, participants may be nominated preferably for both the programs, however they can be nominated for individual program as well.**

The data required for the Design Flood Analysis and Dam Break Analysis is attached at **Annexure-I & II** respectively. It is advised to bring a complete set of data as mentioned in Annexure- I & II for a particular dam for carrying out the study during the training programme. **Participants are advised to bring their own laptops so that they can independently complete the hands-on with their data.**

Confirmation on acceptance of nomination/s will be published on our web site (<http://nwa.mah.nic.in>). **The nominated officers are requested to start for the program only after getting confirmation/ acceptance of their nomination from NWA.**

Yours faithfully,

Encl.: Programme Brochure, Annexure-I & II

Sd/-

S K Das

Director, NWA



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Annexure-I

Data requirement for Design Flood Analysis

The following data is required in the soft (i.e. in MS-Excel sheets) as well as hardform for carrying out Flood Routing: -

1. Area- Elevation-Volume Curve of the Dam.
2. Salient Features of Dam, Gates, Spillway (Section of Spillway) and Section drawing of Dam, upstream elevation of Dam
3. Spillway/ Sluice Outflow Rating Curve (Reservoir level vs. Discharge) or other releases from dam in tabular form up to top of Dam
4. Date and time of Occurrence of FRL/MWL in the reservoir (For Free Board Calculation)
5. Design Flood Hydrograph and Probable Maximum Flood (PMF) Hydrograph.
6. Cross section of overflow section & non-overflow section showing location of galleries also
7. Longitudinal Section of Dam. (Including Spillway and Gates)
8. Drawing showing the Layout plan, Sectional elevation along the axis of dam with the dimensions



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Annexure-II

Data requirement for Dam Break Analysis

A. The following data is required in the soft (i.e. in MS-Excel sheets) as well as hardform for carrying out Dam break analysis and flood inundation mapping: -

1. Area- Elevation-Volume Curve of the Dam.
2. Salient Features of Dam, Gates, Spillway (Section of Spillway) and Section drawing of Dam, upstream elevation of Dam
3. Design Flood Hydrograph and Probable Maximum Flood (PMF) Hydrograph.
4. Rating curve at the last downstream location in the river up to which studies are required.
5. Salient features of all the hydraulic structure, d/s of dam and within the study area.
6. Cross section of overflow section & non-overflow section showing location of galleries also
7. Longitudinal Section of Dam. (Including Spillway and Gates)
8. Drawing showing the Layout plan, Sectional elevation along the axis of dam with the dimensions.
9. Cross sections of the river at the dam site and at regular interval d/s of the dam till the location the studies are required. The cross sections should be taken at an interval of 100 m for initial 5 km and then onwards may be at an interval of 1 to 2 km. The cross-section levels on both the banks should be extended at least 5m above the High Flood level (HFL). The data shall also be supplied in MS-EXCEL format in tabular form and River Cross section at downstream of dam river up to which studies are required.
10. Land Use Land Cover (LULC) data of downstream of the dam for Manning's roughness coefficient along the different stretches of river to be adopted.
11. Rule Curve (Reservoir Level vs. percentage gate opening) in tabular form.
12. Spillway/ Sluice Outflow Rating Curve (Reservoir level vs. Discharge) in tabular form

B. The following data is required in the soft (i.e. in MS-Excel sheets) as well as hardform for carrying out Flood Routing: -

1. Area- Elevation-Volume Curve of the Dam.
2. Salient Features of Dam, Gates, Spillway (Section of Spillway) and Section drawing of Dam, upstream elevation of Dam
3. Spillway/ Sluice Outflow Rating Curve (Reservoir level vs. Discharge) or other releases from dam in tabular form up to top of Dam
4. Date and time of Occurrence of FRL/MWL in the reservoir (For Free Board Calculation)
5. Design Flood Hydrograph and Probable Maximum Flood (PMF) Hydrograph.
6. Cross section of overflow section & non-overflow section showing location of galleries also
7. Longitudinal Section of Dam. (Including Spillway and Gates)
8. Drawing showing the Layout plan, Sectional elevation along the axis of dam with the dimensions