#### **RESUME**

### Rupam Jyoti Nath

BE (Civil Engineering), Jorhat Engineering College

MTech (Civil Engineering), IIT Guwahati

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**Phone No**: +91-9864274382

#### PERSONAL DETAILS

**Date of birth**: 2<sup>nd</sup> October, 1981

Nationality : Indian Gender : Male

**Permanent address**: Flat 4A, Neerjaloy Fortune,

Assam Engineering College Road, Jalukbari, Guwahati – 781014.

#### **EDUCATION**

#### Doctor of Philosophy (2022 - Ongoing)

Institute : Assam Engineering College

University : Assam Science and Technology University

#### Master of Technology (2011) (Civil Engineering)

Institute : Indian Institute of Technology, Guwahati

CPI : 8.08

Specialization : Structural Engineering

#### **Bachelor of Engineering (2005) (Civil Engineering)**

Institute : Jorhat Engineering College University : Dibrugarh University

Marks Secured (%) : 78.48

#### **MAJOR ACADEMIC PROJECTS**

## System Identification of Prototype Base Isolated RC Building Using Recorded Earthquake Response

Master of Technology, Indian Institute of Technology Guwahati Under the guidance of Dr. Anjan Dutta (Professor) and Dr. Sajal Kanti Deb (Professor), Department of Civil Engineering, IITG.

## • Detailed Design of a G+5 Residential RCC Building with a Soft Ground Floor

Bachelor of Engineering, 7th Semester Project

Under the guidance of Dr. Jayanta Pathak, Assistant Professor, Department of Civil Engineering, Jorhat Engineering College, Dibrugarh University

## Development of a Neighbourhood at the outskirts of Jorhat City

Bachelor of Engineering

Under the guidance of Dr. P. K. Khound, Associate Professor, Department of Civil Engineering, Jorhat Engineering College, Dibrugarh University

#### MINOR ACADEMIC PROJECTS and PRESENTATION

- Mini Project on Treatment Plants near Nehru Park and Lahoty Pump Station
   Assam Urban Water Supply and Sewerage Board, Jorhat Town Water Supply Scheme
   (Zone III and IV)
- Seminar on Autoclaved Aerated Concrete-An Alternative Building Material
- Industrial Summer Training Program under the guidance of Ar. Pritam Nath, NEEV, Ganeshguri, Guwahati-781006.

#### ACADEMIC ACHIEVEMENTS

- Ranked 1st in the batch of 2005, Department of Civil Engineering, Jorhat Engineering College.
- Obtained All India Talent Search Examination (AITSE) scholarship organized by Children's Education Trust of India, and sponsored by International Children's Excellence Fund.
- Merit Scholarship holder from Directorate of Technical Education (DTE), Assam.

#### PROFESSIONAL EXPERIENCE

 As Civil Engineer in NEEV, Ganeshguri, Guwahati, Assam-781006 (October 2005 to June 2006)

Scope of work:

Estimates and BOQs for buildings ranging from two storied to eight storied.

Structural drawings, sectional elevations and plans for G+2 structures.

 As Junior Research Fellow in the Department of Civil Engineering, Indian Institute of Technology, Guwahati, Assam-781039 (July, 2006 to December, 2007)

R&D project: Studies on seismic behaviour of buildings with soft-storey based on pseudo dynamic testing.

Sponsor: Ministry of Human Resource and Development (MHRD), Government of India. Project Investigators:

Dr. Sajal Kanti Deb, (Principal Investigator)

Dr. Anjan Dutta, (Co-Investigator)

Professors, Department of Civil Engineering, IIT, Guwahati

Consultancy project: Checking Structural stability and safety against earthquake for the Reserve Bank of India (RBI) office building for RBI, Guwahati.

Client: Reserve Bank of India, Guwahati.

Project Investigator:

Dr. Anjan Dutta, (Principal Investigator)

Professor, Department of Civil Engineering, IIT, Guwahati

R&D project: Verification test of a Prototype Base-Isolated building subjected to actual earthquakes (Phase I).

Sponsor: Board of Research in Nuclear Science (BRNS), Department of Atomic Energy (DAE), Government of India

Project Investigators:

Dr. Sajal Kanti Deb, (Principal Investigator)

Dr. Anjan Dutta, (Co-Investigator)

Professors, Department of Civil Engineering, IIT, Guwahati

• As **Associate Project Engineer** in the Department of Civil Engineering, Indian Institute of Technology, Guwahati, Assam-781039 (January, 2008 to July, 2010)

R&D project: National round robin exercise on Analysis and Experiment on full scale four-storeyed RCC structure under monotonically increasing lateral (pushover) loads.

Organizer: Bhabha Atomic Research Centre (BARC) and Central Power Research Institute (CPRI), Government of India.

Team members:

Rupam Jyoti Nath

Associate Project Engineer, Department of Civil Engineering, IIT, Guwahati

Dr. Sajal Kanti Deb, (Principal Investigator)

Dr. Anjan Dutta, (Co-Investigator)

Dr. Hemant B. Kaushik (Co-Investigator)

Professors, Department of Civil Engineering, IIT, Guwahati

# R&D project: Verification test of a Prototype Base-Isolated building subjected to actual earthquakes (Phase II).

Sponsor: Board of Research in Nuclear Science (BRNS), Department of Atomic Energy (DAE), Government of India

Project Investigators:

Dr. Sajal Kanti Deb, (Principal Investigator)

Dr. Anjan Dutta, (Co-Investigator)

Professors, Department of Civil Engineering, IIT, Guwahati

# Consultancy project: Checking Structural stability and safety against earthquake for the Reserve Bank of India (RBI) Officers' Quarter buildings (Panch Sheel Apartments) at G.S. Road, Guwahati.

Client: Reserve Bank of India, Guwahati.

Project Investigator:

Dr. Anjan Dutta, (Principal Investigator)

Professor, Department of Civil Engineering, IIT, Guwahati.

# Consultancy project: Checking Structural stability and safety against earthquake for the Reserve Bank of India (RBI) Staff Quarter buildings at Hatigarh, Guwahati.

Client: Reserve Bank of India, Guwahati.

Project Investigator:

Dr. Anjan Dutta, (Principal Investigator)

Professor, Department of Civil Engineering, IIT, Guwahati.

• As **Assistant Professor**, NITS-MIRZA, Guwahati, Assam (August, 2010 to April, 2019) *Primary scope of work* 

Teaching Civil Engineering subjects, theory and practical to students of Civil Engineering (CE), Computer Science and Engineering (CSE), Electrical and Electronics Engineering (EEE), Electronics and Communication Engineering (ECE) and Mechanical Engineering (ME) branches.

Secondary scope of work

As Assistant Examination Superintendent and Assistant Zonal Officer in conducting examinations of 4-year Bachelor of Engineering Course of GAUHATI UNIVERSITY in the NITS Mirza centre and zone (October 2010 to September, 2017).

As *Deputy Centre-In-Charge* in conducting examinations of 4-year Bachelor of Technology Course of ASSAM SCIENCE & TECHNOLOGY UNIVERSITY in the NITS Mirza centre (August 2013 to September, 2017).

• As **Research Associate** in the Department of Civil Engineering, Indian Institute of Technology, Guwahati, Assam-781039 (December, 2012 to July, 2016)

 $R\&D\ project:$  Low Cost Base Isolation System using Rubber Soil Mixtures.

Sponsor: Independent Research Guide:

Dr. Anjan Dutta,

Professor, Department of Civil Engineering, IIT, Guwahati

- As **Assistant Professor (Guest)**, Guwahati College of Architecture, Guwahati, Assam (May, 2019 to June, 2020)
- As **Assistant Professor (Guest)**, Dept. of Civil Engineering, Don Bosco College of Engineering and Technology, Assam Don Bosco University, Azara, Guwahati, Assam (August, 2019 to August, 2021)
- As **Assistant Professor (Senior)**, Dept. of Civil Engineering, Don Bosco College of Engineering and Technology, Assam Don Bosco University, Azara, Guwahati, Assam (September, 2021 to June 2024)

- As **Assistant Professor**, Civil Engineering Department, Assam Engineering College, Jalukbari, Guwahati, Assam (July, 2024 till date)
- As part-time Structural Consultant for NEEV, Ganeshguri, Guwahati, Assam-781006 (October, 2008 till date)

Scope of work:

Estimates and BOQs for buildings ranging from two storied to eight storied. Analysis and Design of residential as well as commercial structures ranging from G+1 to G+6, preparation of structural drawings of the same. Projects handled:

#### TRAINING PROJECTS CO-SUPERVISED

# Modeling and Designing of a Multistoried Building and Evaluating the Influence of Seismic Resistant Structural Forms by Dynamic and Pushover Analysis using SAP2000

Ishan Jyoti Sharma, Department of Civil Engineering, National Institute of Technology, Rourkela, May-June, 2007.

Training Supervisor:

Dr. Anjan Dutta, Professor, Department of Civil Engineering, IIT, Guwahati.

## Seismic Evaluation of a G+4 RC Residential Apartment Building in Guwahati using Non-Linear Static Analysis

Usha Rani Barooah, Department of Civil Engineering, National Institute of Technology, Silchar, May-July, 2009

Training Supervisor:

Dr. S. K. Deb, Professor, Department of Civil Engineering, IIT, Guwahati.

# Evaluation of Seismic Capacity of Type A Quarters, PanchSheel Apartments, a G+4 RC Residential Building in Guwahati by Structural Modeling, Linear Analysis & Non-Linear Pushover Analysis using SAP2000.

Needhi Kotoky, Department of Civil Engineering, Jorhat Engineering College, Jorhat, June-July, 2009.

Training Supervisor:

Dr. Anjan Dutta, Professor, Department of Civil Engineering, IIT, Guwahati.

#### WORKSHOPS / CONFERENCES / FDPs

- National Conference on Emerging Trends in Construction Technology: Challenges & Future Directions, 26<sup>th</sup> National Convention of Civil Engineers, 09-10 October 2010, Guwahati.
- Short term training program on *Computer application in structural analysis and design of buildings including foundations*, organized by National Institute of Technical Teachers' Training and Research, Kolkata 700106 from 09.09.2013 to 13.09.2013, Guwahati.
- International Conference on 7<sup>th</sup> International Symposium on Feedstock Recycling of Polymeric Materials, organized by CSIR-Indian Institute of Petroleum, India, Research Association for Feedstock Recycling of Plastics (FSRJ), Japan, Council of Scientific and Industrial Research, India and Indian Centre for Plastics in the Environment (ICPE), India from 23.10.2013 to 26.10.2013, New Delhi.
- Short term training program on *Structural Modelling and Nonlinear Analysis for Seismic Vulnerability Assessment of RC Frame Buildings using the software SAP2000*, organized by Department of Civil Engineering, Assam Engineering College, Guwahati 781013 and Department of Earthquakes and the Environment, NORSAR, Kjeller, Norway from 02.06.2014 to 07.06.2014, Guwahati.
- Participated as Faculty-In-Charge of the students of NITS Mirza in 'Ideathon: Youth Innovations for a Brighter Assam' organized by Transformation and Development Email: rupamnath.ce@aec.ac.in

- Department, Govt. of Assam, United Nations Development Program, Centre for Sustainable Development Goals, Centre for Innovation and Future Studies, 02.11.2017 and 03.11.2017, Assam Administrative Staff College, Khanapara, Guwahati.
- Elite Silver Certification for a 4-week online course *Effective Engineering Teaching in Practice*, NPTEL Online Certification, January-February 2022.
- 2<sup>nd</sup> International Conference on *Emerging Global Trends in Engineering and Technology*, sponsored by AICTE and organized by Don Bosco College of Engineering and Technology, Assam Don Bosco University, 21.04.2022 to 23.04.2022, Azara, Guwahati.
- Faculty Development Program on *Outcome Based Education and Implementation of National Education Policy 2020*, organized by Assam Don Bosco University, 05.01.2023 to 10.01.2023, Tapesia, Sonapur.
- Elite Silver Certification for a 4-week online course *Designing Learner-Centric MOOCs*, NPTEL Online Certification, January-February 2023.
- National Conference on New Approaches of Basic Sciences towards the Development of Engineering and Technology-2023 (NABSET-2023), as Organizer, School of Technology, Assam Don Bosco University, 24.02.2023 – 25.02.2023, Azara, Guwahati.
- Elite Silver Certification for a 12-week online course *NBA Accreditation and Teaching and Learning in Engineering (NATE)*, NPTEL Online Certification, January-April 2023.
- Faculty Development Program on *Navigating the "tides of change" in Higher Education*, organized by Assam Don Bosco University, 24.07.2023 to 28.07.2023, Tapesia, Sonapur.
- Online Short-Term Course on *Recent Advances in Civil Infrastructure, Design & Construction*, organized by the Department of Civil Engineering, NIT Meghalaya, India, 07.08.2023 to 11.08.2023.
- Participated and successfully completed a 2 Credit SWAYAM Course on *National Education Policy 2020: Professional Development Programme*, organized by Staff Training and Research Institute of Distance Education, Indira Gandhi National Open University, New Delhi, from 01.08.2023 to 31.08.2023.
- Online Short-Term program on *Recent trends and Future Scope in Civil Engineering* (RTFSCE-2023) organized by Department of Civil Engineering, NIT Jamshedpur, India, 11.09.2023 to 15.09.2023.
- Certification for a 12-week online course *Earthquake Seismology*, NPTEL Online Certification, July-October 2023.
- Certification for a 12-week online course *Earthquake Geotechnical Engineering*, NPTEL Online Certification, July-October 2023.
- Online Faculty Development Program on *Outcome Based Education and Essential AI tools for Teachers* organized by the Internal Quality Assurance Cell (IQAC) of Ramakrishna Mission Vivekananda Centenary College (Autonomous), Rahara, Kolkata in association with The Department of Mathematics, Chaudhary Charan Singh University, Meerut, cohosted by ipsr solutions limited, 14.12.2023 to 20.12.2023
- Online Faculty Development Program on *Safety and Risk Analysis* organized by the Department of Chemical Engineering, Assam Engineering College, Guwahati, 19.02.2024 to 23.02.2024.
- Online Faculty Development Program on Outcome Based Education and Application of Generative AI in Teaching and Research, organized by Internal Quality Assurance Cell

(IQAC) of Gauhati University, Assam, in association with ipsr solutions ltd., 17.04.2024 to 24.04.2024.

- Online Workshop on *National Education Policy Orientation & Sensitization Programme* organized by Malaviya Mission Teacher Training Centre (MMTTC), Astronomy Centre for Educators, Inter-University Centre for Astronomy and Astrophysics (IUCAA), 01.05.2024 to 15.05.2024.
- Workshop on Mitigation of Climate Change for a Sustainable Earth Organized by Chemical Engineering Department, Assam Engineering College, Guwahati under the aegis of All India Council for Technical Education – Vibrant Advocacy for Advancement and Nurturing of Indian Languages (AICTE-VAANI), 02.09.2024 to 04.09.2024.

#### **TECHNICAL PAPERS**

National Conference Paper:

Rupam Nath, Anjan Dutta & S. K. Deb, "Validation of Numerical Model of Prototype Base Isolated RC Building Using Recorded Earthquake Response", *Proceedings*, 26<sup>th</sup> National Convention of Civil Engineers, Emerging Trends in Construction Technology: Challenges & Future Directions, 2010, pp 41-53, 09-10 October 2010, Guwahati.

Journal Paper:

Rupam Nath, Anjan Dutta & S. K. Deb, "Base isolated RC building – performance evaluation and numerical model updating using recorded earthquake response" *Earthquakes and Structures, Earthquakes and Structures, An Int'l Journal,* Vol. 4, No. 5, 2013

#### SKILLS

**Applications** AutoCAD, MSOffice, SAP2000, Etabs, SAFE, Staad Pro, Matlab

**Operating Systems** Windows

### **EXTRA CURRICULAR**

- Worked actively as a member of **Indian Society for Technical Education (ISTE) Students' Chapter** of Jorhat Engineering College.
- Avid interest in creative writing and gardening and won prizes for hostel during undergraduate studies