LOHITKUMAR NAINEGALI, M.Tech, Ph.D (IIT Kanpur)

Associate Professor,
Department of Civil Engineering,
National Institute of Technology Karnataka, Surathkal,
Mangalore-575025, Karnataka, India.
Former Associate Professor,
Indian Institute of Technology (Indian School of Mines) Dhanbad, Dhanbad-826004, Jharkhand, India.

Discipline: Civil Engineering **Specialization:** Geotechnical Engineering

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☎**: Mobile:** +91-9471192372; 0326-223-5141 (O)

Date of Birth: 17 June 1982 **Sex:** Male **Marital Status:** Married

Permanent Address: Sector 55, Plot 07, Behind Hiremath Kalyan Mantap, Hubli Bypass Road, Navnagar-587103, Bagalkot, Karnataka, India.

❖ Research Interest:

- Physical and Numerical Modeling of Geotechnical Systems
- Stability of Geotechnical Structures
- Soils Dynamics and Foundations
- Utilization of Mine Overburden/Industrial Waste

❖ Academic Experience:

Institute/Employer	Position Held	Date of		Experience
		Joining	Leaving	
National Institute of Technology Karnataka, Surathkal	Associate Professor	22 December 2023	--	Continuing
Indian Institute of Technology (Indian School of Mines) Dhanbad, Jharkhand, India	Associate Professor	09 August 2023	19 December 2023	04 Months
	Assistant Professor	15 May 2014	08 August 2023	09 Years
SECAB Institute of Engineering and Technology, Bijapur, Karnataka, India	Lecturer	15 June 2005	30 June 2006	01 Year

❖ Academic Details:

⇨ ***Academic Career Records:***

Degree, Subject	Board\University	Institute	Year	Class
Ph. D Geotechnical Engineering	Indian Institute of Technology, Kanpur	Indian Institute of Technology, Kanpur	2009-2013	First

M. Tech Geotechnical Engineering	Indian Institute of Technology Kanpur	Indian Institute of Technology, Kanpur	2007-2009	First
BE Civil Engineering	Visveswaraiah Technological University, Belgaum, Karnataka	Basaveshwar Engineering College, Bagalkot, Karnataka	2001-2005	First Class with Distinction

⇨ ***Details of Doctoral Degree (Ph.D):***

- **Thesis Title:** Finite Element Analysis of Two Symmetric and Asymmetric Interfering Footings Resting on Linearly and Non-Linearly Elastic Foundation Beds
- **Guide/Supervisor:** Prof. Prabir Kumar Basudhar and Dr. Priyanka Ghosh
- **Mode:** Full Time
- **Period From - To:** June, 2009 to December 23, 2013
- **Thesis Submission Date:** December 23, 2013
- **Final Viva Voce Date:** August 22, 2014
- **Award Date (Convocation):** February 23, 2015

❖ Publications:

⇨ ***Refereed Journals (International Journals):***

1. Kumar, A., Das, S.K., **Nainegali, L.,** and Reddy, K.R. (2023). "Effect of grass species root for enhanced slope protection in amended coalmine overburden dump soil." *Plant and Soil.* DOI: 10.1007/s11104-023-06450-4. ***(SCIE journal, Q1)***
2. Jena, S., Khatri, V.N., **Nainegali, L.,** and Dutta, R.K. (2023). "Effect of Chemical Treatment on Physical, Mechanical, and Morphological Characteristics of Sisal Geotextile." *The Journal of the Textile Institute*. DOI: 10.1080/00405000.2023.2263832. ***(SCIE journal, Q2)***
3. Kumar, A., Das, S.K., **Nainegali, L.**, Reddy, K.R. (2023). "Investigation of root traits of Dendrocalamus strictus cultivated on organically amended coalmine overburden and its potential use for slope stabilization." *International Journal of Phytoremediation*, DOI: 10.1080/15226514.2023.2208235. ***(SCIE journal, Q2)***
4. Kumar, A., Das, S.K., **Nainegali, L.,** and Reddy, K.R. (2023). "Probabilistic Slope Stability Analysis of Coalmine Waste Rock Dump." *Geotechnical and Geological Engineering*. DOI: 10.1007/s10706-023-02541-2. ***(ESCI journal)***
5. Ekbote, A. G., and **Nainegali, L.** (2023). "Behaviour of interfering embedded footings laid in unreinforced and reinforced sand medium." *Current Science*. 125(04), 392-400. ***(SCIE journal, Q3)***
6. Kumar, A., Das, S.K., **Nainegali, L.**, Reddy, K.R. (2023). "Phytostabilization of Coalmine Overburden Waste Rock Dump Slopes: Current Status, Challenges, and Perspectives." *Bulletin of Engineering Geology and the Environment*, 82, 130. DOI: 10.1007/s10064-023-03159-7 ***(SCIE journal, Q2)***
7. Ekbote, A. G., and **Nainegali, L.** (2023). "Study on Closely Spaced Asymmetric Footings Embedded in a Reinforced Soil Medium." *Ingeniería e Investigación*. 43(3), 1-14. ***(SCIE journal, Q4)***
8. Ekbote, A.G., and **Nainegali, L.**, Rajhans, P., and Deepak, M. S. (2022). "Behavioural Assessment of Influence of Adjacently Placed Strip Footings at Different Embedment

Level." *Architecture Civil Engineering Environment*, 4/2022, 93-103. DOI: 10.2478/ACEE-2022-0041 ***(ESCI journal)***

9. Khatri, V., **Nainegali, L.**, Sarkar, R, and Das, S.K. (2022). "Assessment of Overburden Dump and High Wall Slope Stability for Jambad Open Cast Project Mine through In-Situ and Laboratory Testing." *Current Science*, 123 (2), 184-193, DOI: 10.18520/cs/v123/i2/184-193 ***(SCIE journal, Q3)***
10. Hati, S., Panda, S.K., and **Nainegali, L.** (2022). "Inverse Analysis for Parameter Estimation of Sandy Soil with Axially Loaded Pile Using Nonlinear Programming." *Sadhana,* 47(9). DOI: https://doi.org/10.1007/s12046-021-01773-3. ***(SCIE journal, Q4)***
11. Ekbote, A. G., and **Nainegali, L.** (2021). "Finite Element Analysis of Two Nearby Interfering Asymmetric Footings Embedded in Cohesionless Foundation Medium." *Geomechanics and Geoengineering-An International Journal*, 16(4), 263-276. DOI: 10.1080/17486025.2019.1664776. ***(ESCI journal, Q3)***
12. Ekbote, A. G., and **Nainegali, L.** (2019). "Interference of Two Closely Spaced Footings Embedded in Unreinforced and Reinforced Soil Medium: A Finite Element Approach using ABAQUS." *Arabian Journal of Geosciences*, 12, 683/1-21. DOI: 10.1007/s12517-019-4868-0. ***(SCIE journal, Q3)***
13. **Nainegali, L.**, Basudhar, P. K. and Ghosh, P. (2019). "Interference of proposed footing with an existing footing resting on non-linearly elastic dense and loose cohesionless soil bed." *European Journal of Environmental and Civil Engineering*, DOI: 10.1080/19648189.2019.1638311. ***(SCIE journal, Q2)***
14. Kumar, S., Dutta, S. C. and **Nainegali, L.** (2018) "Constructing structures on backfilled opencast mine spoil for better sustainability." *Current Science*, 114(10), 2053-2062. DOI:10.18520/cs/v114/i10/2053-2062. ***(SCI journal, Q3)***
15. **Nainegali, L.**, Basudhar, P. K. and Ghosh, P. (2018) "Interference of strip footings resting on non-linearly elastic foundation bed: A finite element analysis." *Iranian Journal of Science and Technology-Transactions of Civil Engineering*, 42(2), 199-206. DOI: 10.1007/s40996-018-0094-3. ***(SCIE journal, Q4)***
16. **Nainegali, L. S.**, Basudhar, P. K. and Ghosh, P. (2013). "Interference of two asymmetric closely spaced strip footings resting on non-homogeneous and linearly elastic soil bed." ASCE *International Journal of Geomechanics*, 13(6), 840-851. DOI: 10.1061/(ASCE)GM.1943-5622.0000290. ***(SCIE journal, Q2)***

⇨ ***ASCE Special Publications:***

17. **Nainegali, L.**, Ekbote, A. G. (2019). "Interference of Two Closely Spaced Strip Footings Embedded in Cohesionless Fibre-Reinforced Foundation Soil Bed." *ASCE, Geo-Congress-2019: The Eighth International Conference on Case Histories in Geotechnical Engineering,* Philadelphia, Pennsylvania, USA, 24-27 March, 2019, GSP-307,454-464. DOI: 10.1061/9780784482094.041
18. **Nainegali, L. S.**, Basudhar, P. K. (2011). "Interference of two closely spaced footings: A finite element modeling." *ASCE Geotechnical Special Publications, Geo-Frontiers: Advances in Geotechnical Engineering*, Dallas, Tx., USA, 13-16 March, 2011, GSP-211, 3726-3735. DOI: 10.1061/41165(397)381

⇨ ***International Conferences:***

19. **Nainegali, L.**, Ekbote, A. G. (2019). "Analysis of two closely spaced asymmetric strip footings embedded in cohesion-less soil medium." *16th Asian Regional Conference on Soil Mechanics and Geotechnical Engineering,* Taipei, Taiwan, 14-18 October, 2019.

20. **Nainegali, L. S.**, Ghosh, P., and Basudhar, P. K. (2013). "Interaction of nearby strip footings under inclined loading." *ISSMGE, Proceedings of the 18th International Conference on Soil Mechanics and Geotechnical Engineering*, Paris, France, 3459-3462.

21. **Nainegali, L. S.**, Basudhar, P. K. and Ghosh, P. (2013). "Interference of two closely spaced strip footings resting on linearly elastic Gibson soil." *18th Southeast Asian Geotechnical Conference cum Inaugural AGSSEA Conference,* Singapore, ISBN: 978-981-07-4949-1, 1019-1025.

⇨ ***National Conferences:***

22. Shankar, K., Sarkar, R., and **Nainegali, L.** (2023). "Dynamic Behaviour of Laterally Loaded Pile Foundations with Different Batter Angles Embedded in Sloping Ground." *Indian Geotechnical Conference*, Roorkee.

23. Jena, S., Khatri, V.N., and **Nainegali, L.** (2023). "Bearing Capacity Estimation of Strip Footing on Sand reinforced with Sisal Geotextile." *Indian Geotechnical Conference*, Roorkee.

24. Jena, S., Khatri, V.N., and **Nainegali, L.** (2022). "A Study on Tensile Properties of Emulsion Coated Sisal Geotextile." *Indian Geotechnical Conference*, Kochi.

25. Kumar, A., Das, S.K., **Nainegali, L.**, Reddy, K.R. (2021). "Phytoremediation for Stabilization of Coalmine Overburden Dumps: Present Status." *Proceedings of Eighth Indian Young Geotechnical Engineers Conference (8IYGEC)*, Chennai.

26. **Nainegali, L. S.**, Basudhar, P. K. and Ghosh, P. (2012). "Analysis of nearby rigid strip footings on elastic soil bed subjected to inclined load." *Proceedings of Indian Geotechnical Conference*, New-Delhi, 2, 660-663.

⇨ ***Book Chapters:***

27. Kumar, A., Das, S.K., **Nainegali, L.**, Reddy, K.R. (2023). "Slope Stability Analysis of Coalmine Overburden Dump using Monte Carlo Simulation: A Probabilistic Approach." *Geoenvironmental and Geotechnical Issues of Coal Mine Overburden and Mine Tailings*, Springer, ISBN: 978-981-99-6294-5.

28. Ekbote, A. G., **Nainegali, L.** (2021). "Influence of different seismic loadings on the closely spaced interfering footings embedded in cohesionless foundation medium." Seismic Design and Performance: Select Proceedings of 7th ICRAGEE 2020, Lecture Notes in Civil Engineering, Springer-Singapore, ISBN: 978-981-334-005-3

29. **Nainegali, L.**, Ekbote, A. G. (2019). "Interference of two nearby footings resting on clay medium." Geotechnical Applications, Part of the Lecture Notes in Civil Engineering book series (LNCE volume 13), Pages 59-67, Springer-Singapore, ISBN: 978-981-13-0368-5.

⇨ ***Books Editor:***

1. Das, S.K., Reddy, K.R., **Nainegali, L.**, Surabhi J. "Geoenvironmental and Geotechnical Issues of Coal Mine Overburden and Mine Tailings." Springer-Nature, Singapore, ISBN: 978-981-99-6294-5.

❖ Sponsored Research Projects:

Sl No.	Name of PI/Co-PI etc.	Project Title	Sponsoring Authority	Year of Sanction	Duration (Year)	Amount (Rs.)	Status
1	PI: **Dr. Lohitkumar Nainegali**	Experimental Investigations on Characteristic Behaviour of Two Nearby Embedded Shallow Foundations	DST, SERB under Start Up Reseach Grant	17 March 2016	3	18.00 lakhs	Completed (16 March 2019)
2	PI: **Dr. Lohitkumar Nainegali**	Analysis of Two Symmetric and Asymmetric Interfering Embedded Strip Foundations Subjected to Static and Cyclic Loading	IIT (ISM) Dhanbad, Faculty Research Scheme	February 2015	3	8.80 lakhs	Completed
3	PI: Prof. S. C. Dutta, Co-PI: **Dr. Lohitkumar Nainegali**, Dr. S. K. Panda, Dr. S. Nayak	Constructing Structures on Backfilled Open Cast Coal Mines: An Attempt to Suggest Viable Methodologies	MoC, Coal India Limited	15 December 2015	4.5	310.94 lakhs	Completed (14 June 2020)
4	PI: Prof. Sarat Kumar Das, Co-PI: **Dr. Lohitkumar Nainegali**, Dr. Rajib Sarkar, Dr. V. N. Khatri	Scientific study of ultimate slope of pit and dumping slope stability of working of Jambad OCP, Kajora Area, ECL	Eastern Coalfields Limited	23 October 2018	2	8.26 lakhs	Completed (25 September 2020)
5	PI: Prof. Sarat Kumar Das, Co-PI: **Dr. Lohitkumar Nainegali**	Geoenvironmental and Geotechnical Issues of Coal Mine Over Burden	Scheme for Promotion of Academic and Research Collaboration (SPARC)	28 March 2019	4.5	43.91 lakhs	Completed (30 September 2023)
6	PI: Dr. Rajib Sarkar, Co-PI: **Dr. Lohitkumar Nainegali**	Effect of Blasting on Opencast Mine Dump and Development of Relationship between Blast Induced Vibration and Dump Design	MoC, Coal India Limited	10 February 2021	2	108.26 lakhs	Completed (31 July 2023)
7	PI: Prof. Sarat Kumar Das, Co-PI: **Dr. Lohitkumar Nainegali**, Dr. Sanket Nayak, Dr. Sukanta Chakraborty	Design Rationalisation of Bridge support for Railway Siding	Bharat Petroleum Corporation Limited	14 February 2022	1	05.90 lakhs	Completed (15 February 2023)

8	PI: Prof. V.N. Khatri, Co-PI: **Dr. Lohitkumar Nainegali**	Slope stability study of existing dumps and quarry related to mining leasehold for iron ore namely Patabeda iron and Manganese mine over 19.425 Ha in village Patabeda in Koida Tahasil of Sundargarh district, Odisha.	Messrs M.G. Mohanty	19 January 2023	1	11.50 lakhs	Completed (20 January 2024)

❖ Sponsored Consultancy Projects:

Sl No.	Name of PI/Co-PI etc.	Project Title	Sponsoring Authority	Year of Sanction	Amount (excluding taxes)	Amount Released	Status
1	PI: Prof. Sarat Kumar Das, Co-PI: **Dr. Lohitkumar Nainegali**	MCL quarry No. 8 embankment raising work for Talcher Kaniha STPS (TKSTPS)	NTPC Ltd., Kaniha	2023	12,00,000/-		Ongoing
2	PI: Prof. Sarat Kumar Das, Co-PI: **Dr. Lohitkumar Nainegali**, Dr. S. K. Panda, Dr. Rajib Sarkar, Dr. Sanket Nayak, Dr. S. S. Mohapatra, Dr. Tanish Dey, Dr. Sukanta Chakraborty	Third party Quality Control and Quality Assurance for Civil, Electrical, Mechanical and all other allied works for redevelopment of GPRA colony at Nauroji nagar , New Delhi (Part- 9, 8, 7, 4, 2, 1)	NBCC (India) Ltd., New Delhi	2020, 2018(2), 2017	8,00,000/- 8,00,000/- 8,00,000/- 8,00,000/- 8,00,000/- 8,00,000/- Total 48,00,000/-	9,44,000/- 9,44,000/- 9,44,000/- 9,44,000/- 9,44,000/- 9,44,000/- Total 56,64,000/-	Completed
3	PI: **Dr. Lohitkumar Nainegali**, Co-PI: Dr. S. K. Panda, Dr. Sanket Nayak	Checking the design and drawing of a road over bridge between Gomoh and Barkakana railway station	Rites Limited, Ministry of Railway	2020	3,38,000/-	3,98,840/-	Completed
4	PI: Dr. Rajib Sarkar, Co-PI: **Dr. Lohitkumar Nainegali**	Slope Stability analysis and optimisation of tailing pond dyke slope, Jharsuguda	MECON Limited	2020	8,50,000/-	10,03,000/-	Completed
5	PI: Prof. Sarat Kumar Das,	Third Party Quality Control & Quality	NBCC (India) Ltd., New Delhi	2020, 2021	8,00,000/- 8,00,000/- Total	9,44,000/- 9,44,000/- Total	Ongoing

	Co-PI: Dr. S. K. Panda Dr. Rajib Sarkar, **Dr. Lohitkumar Nainegali,** Dr. Sanket Nayak, Dr. S. S. Mohapatra, Dr. Tanish Dey, Dr. Sukanta Chakraborty	Assurance for Civil, Electrical, Mechanical & all other allied works for redevelopment of GPRA colony at Nauroji Nagar, New Delhi (Part-6, 10)			16,00,000/-	18,88,000/-	
6	PI: Dr. Rajib Sarkar Co-PI: **Dr. Lohitkumar Nainegali**	Evaluation of liquefaction potential for upgradation of Patna Medical College and Hospital, Patna under PMSSY (Phase-IV).	C. K. Constructions	2019	6,00,000/-	7,08,000/-	Completed
7	PI: Prof. Sarat Kumar Das, Co-PI: **Dr. Lohitkumar Nainegali** Dr. S. K. Panda, Dr. Sanket Nayak, Dr. S. S. Mohapatra, Dr. Tanish Dey, Dr. Sukanta Chakraborty	Vetting of Design and Drawing of Critical & Important civil structure of Petroleum Depot at Bokaro, Jharkhand.	Bharat Petroleum Corporation Limited	2019	7,40,000/-	8,73,200/-	Completed
8	PI: Prof. Sarat Kumar Das, Co-PI: **Dr. Lohitkumar Nainegali** Dr. S. K. Panda, Dr. Sanket Nayak, Dr. S. S. Mohapatra, Dr. Tanish Dey, Dr. Sukanta Chakraborty	Design of civil structure to in-house liquefied petroleum gas storage vessels at Bokaro LPG plant	Bharat Petroleum Corporation Limited	2018	7,40,000/-	8,73,200/-	Completed
9	PI: Dr. Rajib Sarkar Co-pI: **Dr. Lohitkumar Nainegali,** Dr. Sukanta Chakraborty	Preparation of site specific response spectrum for Railway bridges in Manipur (Package-1)	AECOM Asia Company Limited	2018	05,00,000/-	05,90,000/-	Completed

10	PI: Dr. V. N. Khatri Co-PI: **Dr. Lohitkumar Nainegali**	Soil Testing at 3 x 800 MW PVUN (Phase-1) Patratu, Ramgarh	Patratu Vidyut Utpadan Nigam Limited (PVUN), Jharkhand	2018	01,10,000/-	01,29,800/-	Completed
11	PI: Dr. Rajib Sarkar, Co-PI: **Dr. Lohitkumar Nainegali,** Prof. Sarat Kumar Das, Dr. S. K. Panda	Geotechnical and Material Testing for Mohammadganj Barrage Canal	WAPCOS Ltd	2018	29,20,000/-	34,45,600/-	Completed
12	PI: Dr. Rajib Sarkar, Co-PI: **Dr. Lohitkumar Nainegali,** Prof. Sarat Kumar Das	Additional Work of Geotechnical and Material Testing for Material Testing for Mohammadganj Barrage Canal.	WAPCOS Ltd	2018	5,10,000/-	06,01,800/-	Completed
13	PI: Dr. S. C. Dutta Co-PI **Dr. Lohitkumar Nainegali**, Dr. S. K. Panda, Dr. S. Nayak	Third Party Quality Assurance	NIT Jamshedpur	2016	15,63,000/-	15,63,000/-	Completed
14	PI: Dr. S. C. Dutta Co-PI **Dr. Lohitkumar Nainegali**, Dr. S. K. Panda, Dr. S. Nayak	Vulnerability and Damage Survey Report with Remedial Measures on Properties of Reserve Bank of India, Patna	Reserve Bank of India, Patna	2015	8,08,000/-	8,08,000/-	Completed

Research Guidance/Supervision:

⇨ ***PhD Dissertation:***

Title	Name of Student	Registration No.	Supervision Sole/Joint	Status
Investigations on the Behaviour of Two Nearby Embedded Shallow Foundations: Numerical and Experimental Studies	Anupkumar Gopalrao Ekbote	2014DR0217	Sole	**Completed**
Bioremediation for Stabilization of Coal Overburden Dump Slope	Ashutosh Kumar	18DR0044	Jointly, Co-Guide	Submitted
Bearing capacity improvement of shallow foundation using treated sisal fibres/geotextile	Subham Jena	20DR0147	Jointly, Co-Guide	Ongoing
Behaviour of Vertical and Batter Pile Groups in Slope under Lateral Loading	Shankar Kumar	21DR0168	Jointly, Co-Guide	Ongoing
Performance of different configuration micropiles combined with foundations for earth slope stabilization based on static and dynamic studies.	Sumit Kumar (PMRF Candidate)	22DR0232	Sole	Ongoing (PMRF Candidate)

⇨ *M.Tech Dissertation:*

Title	Name of Student	Passing Year	Supervision	Status
Static and Dynamic Analysis of Adjacently Placed Two Strip Footings Using Finite Element Method	Koko Karbia 18MT000337	2020	Sole	Completed
Stability of Overburden Dump Slopes of Open-Cast Coal Mines Near Bhagatdih, Dhanbad	Shiva Khandelwal 18MT000504	2020	Sole	Completed
Interaction Effect of Skirted Footing on Homogeneous and Layered Soil using Numerical Analysis (FEM)	Asmit Raj Sourabh 19MT0089	2021	Co-Supervisor	Completed
Slope Stability Analysis With Varying Slope Height & Slope Angle Using Finite Element Method	Krishna Kumar 19MT0183	2021	Sole	Completed
Stability and Bearing Capacity Aspects of Footings with Micro-piles on Sloping Ground Surface	Badavath Jailsingh 20MT0107	2022	Sole	Completed
Static and Pseudo-Static Analysis of Strip Footing on Jointed Rock Slopes	Mudadla Sankara Rao 20MT0230	2022	Sole	Completed
Influence of Water Table on the Behaviour of Interfering Footings	Gaurav Kumar 21MT0148	2023	Sole	Completed
Undrained stability of two nearby active trapdoors in two-layered clays	Subham Kumar 22MT0329	--	Sole	Ongoing

❖ Undergraduate Projects Guided:

Title	Name of Student	Passing Year	Supervision	Status
Investigation of Bearing Capacity of Adjacent Footings on Reinforced Soil	Mohd Azam (2013JE0947), Abhishek Kumar (2013JE 0900), Abhishek Kumar (2013JE 0895), Ashish Snyoran (2013JE 0876)	May 2017	Sole	Completed
Finite Element Analysis of Two Nearby Footings on Sand Using PLAXIS 2D	Karun Samyal (14JE000506), Nitish Kumar (14JE000619), Manu (14JE000664), Abhishek Kumar Singh (14JE000685)	April 2018	Sole	Completed
Interaction of Two Closely Spaced Embedded Strip Footings Resting on Unreinforced Soil Medium: A Finite Element Study using PLAXIS	Abhishek Mishra (15JE001206), Ashish Ranjan (15JE001636), Amit Gupta (15JE001698)	April 2019	Sole	Completed
Effect of Soil Medium on the Footing Interference	Shivam Singh Chauhan (16JE002393), Sarvajeet Singh (16JE002707), Abhishek Tripathi (16JE002009)	May 2020	Sole	Completed
Rock Slope Stability Considering Jointed Rock Mass and Soil Nailing	Apoorv Kumar (17JE002739), Ankit Kumar Singh (17JE002958), Aman Tomar (17JE03581)	May 2021	Sole	Completed
Effect of Soil Nailing on the Stability of Slopes	Animesh Kumar Tiwary (18JE0112), Boda Saikrishna (18JE0238), Shalini Rajnegi (18JE0758)	May 2022	Sole	Completed
Stability of active dual trapdoors in cohesive-frictional soils	Yashraj Garg (20JE1119), Manjit Singh (20JE0537),	--	Sole	Ongoing

	Nikhil kumar Soni (20JE0623)			

❖ Conferences / Seminars / Workshops Attended:

Year	Conferences / Seminars /Workshops attended	Place and Date	Title of paper presented
2019	16th Asian Regional Conference on Soil Mechanics and Geotechnical Engineering	Taipei, Taiwan, 14-18 October, 2019	Analysis of Two Closely Spaced Asymmetric Strip Footings Embedded in Cohesion-less Soil Medium
2013	18th Southeast Asian Geotechnical Conference	Singapore, 29-31 May 2013	Interference of Two Closely Spaced Strip Footings Resting on Linearly Elastic Gibson Soil
2012	Indian Geotechnical Conference-2012	New Delhi, India, 13-15 December 2012	Analysis of Nearby Rigid Strip Footings on Elastic Soil Bed Subjected to Inclined Load
2011	ASCE Geo-Frontiers-2011	Dallas, Texas, USA, 13-15 March 2011	Interference of Two Closely Spaced Footings: A Finite Element Modeling

❖ Courses Teaching/Taught:

Sl. No.	Title of the Course	UG/PG
1	CED532: Slope and Retaining Structures	PG
2	CEC524: Soil Dynamics and Machine Foundations	PG
3	CED525: Slope and Retaining Structures	PG
4	CEC527: Computer Modelling of Geotechnical Systems	PG
5	CEE51104: Rock Engineering	PG
6	CEE52107: Soil Structure Interaction	PG
7	CEC302: Foundation Engineering	UG
8	CEO528: Ground Improvement and Geosynthetics	UG/PG
9	CEC201: Surveying	UG
10	CEC15102: Geotechnical Engineering-I	UG
11	CEC16103: Geotechnical Engineering-II	UG
12	CEC17104: Foundation Engineering	UG
13	CEE18102: Ground Improvement	UG
14	CEC15104: Rock Mechanics	UG
15	CEC13103: Building Material, Construction and Estimation	UG
16	CEC13203: Material Testing Practical	UG
17	CEC15202: Geotechnical Engineering-I Practical	UG
18	CEH16201: In-situ Soil Testing Practical	UG
19	CEC16202: Transportation Engineering-I Practical	UG
20	CEI101: Engineering Graphics (Lab)	UG

❖ Outreach Program Organized:

- *International Virtual Short-Term Course on Futuristic Prospects of Geoenvironmental and Geotechnical Issues of Coal Mine Overburden and Mine Tailings, 15th to 18th March 2021*, Sponsored by ***Scheme for Promotion of Academic and Research Collaboration (SPARC), GoI***. Indian Convener: Prof. S. K. Das, IIT(ISM) Dhanbad, Foreign Convener: Prof. K Reddy, UIC, USA, Coordinator: **Dr. Lohitkumar Nainegali**.
- *Workshop on Advances in Structural and Geotechnical Engineering (ASGE)* at IIT (ISM) Dhanbad, *5-9 June, 2018*, Sponsored by ***Department of Science and Technology, GoI***, Coordinator: Dr. Sanket Nayak, Co-Coordinator: **Dr. Lohitkumar Nainegali.**

- ***Short Term Course on Sustainability of Infrastructures,*** at IIT (ISM) Dhanbad, *8-10 January, 2016*, Sponsored by ***Aimil Limited, New Delhi***, Coordinator: Prof. S.C. Dutta, Organizing Committee Member: **Dr. Lohitkumar Nainegali**.

❖ Development of New Experiments:

- Laboratory small-scale model testing of shallow foundations under push and pull applications.
- Apparatus for the preparation of uniform sand bed using stationary pluviation technique.
- Fully established the Geotechnical Engineering Laboratory

❖ Development of New Laboratory:

- Geotechnical Engineering Laboratory
- Advanced Geotechnical Engineering Laboratory
- Model Testing Laboratory

❖ Special Lectures Delivered:

- **One lecture** delivered on *Introduction to Geotechnical Software: GEO-05* at Amrita Vidyapeetham, Coimbatore, TN, *15th February, 2018*.
- **One lecture** delivered in the *Short Term Course on Advances in Civil Engineering* held at IIT (ISM) Dhanbad, *06-08 April, 2018*.
- **Two lectures** delivered in the *Workshop on Advances in Structural and Geotechnical Engineering (ASGE)* held at IIT (ISM) Dhanbad, *5-9 June, 2018*.
- **One lecture** delivered in *Development of Cement Technology for Sustainable Infrastructure*, held at IIT (ISM) Dhanbad, *22-24 February, 2019*.

❖ Professional Membership:

- Life Member, Indian Geotechnical Society (*Member ID: LM 4113*)
- Member, Indian Society of Earthquake Technology (*Member ID:*)
- Member, American Society of Civil Engineering (*Member ID: 12301757*)
- Member, International Society of Soil Mechanics and Geotechnical Engineering (*Block year 2022-2025; 2018-2021; 2014-2017*)
- Life member, Alumni Association IIT Kanpur

❖ Award and Recognition:

- Institute Assistantship from IIT Kanpur during PhD during 2009-2013.
- GATE Fellowship, IIT Kanpur during M.Tech 2007-2009.
- Secured AIR of 348 with a score of 458 in the GATE-2007 examination.
- Third Prize in National Level Paper Presentation contest, "KSHITIJ-05" held at Basaveshwar Engineering College, Bagalkot, Karnataka.
- Class topper and various subject toper during Bachelor of Civil Engineering, 2001-2005.

❖ Administrative Responsibilities:

Sr. No.	Responsibilities @ IIT(ISM) Dhanbad	Date	
		From	To
1	Warden, Amber Hostel	01/07/2022	19/12/2023
2	DPGC Member, Coordinator-Geotechnical Engg.	15/10/2020	19/12/2023
3	IT Coordinator	05/08/2020	15/10/2021
4	Time Table Committee Member	18/07/2018	02/09/2022
5	Faculty In-charge - Geotechnical Engineering Laboratory	01/09/2015	Till date
6	Faculty In-charge - MIS System	01/09/2015	02/09/2022
7	Tabulator	18/07/2018	2019
8	Faculty In-charge - Transportation Engineering Laboratory (with Dr. S. S. Mohapatra)	21/07/2017	18/07/2018
9	U.G/B.Tech Program Coordinator	01/09/2015	18/07/2018
10	Departmental Purchase Advisory Committee Member	25/02/2015	18/07/2018
11	Vice President, Civil Engineering Society, IIT (ISM) Dhanbad	01/09/2015	21/07/2017
12	Faculty In-charge – Computer Laboratory	01/09/2015	28/11/2016
13	Imprest Fund In-charge	01/09/2015	28/11/2016
14	3rd and 4th semester faculty advisor	01/09/2015	28/11/2016
15	Doctoral Research Committee Member	28/11/2016	21/07/2017

❖ Setting up Teaching/Research Laboratories:

Established the Geotechnical Engineering Laboratory, Advanced Geotechnical Engineering Laboratory and Model Testing Laboratory with all basic requirements for Under Graduates and Post Graduates. Few major equipment indented and procured are:

1. Small scale model testing of shallow foundations under push and pull applications which can be used for research scholars.
2. Apparatus for preparation of uniform sand bed using stationary pluviation technique.
3. Universal Testing Machine for Geosynthetics Materials with Accessories
4. Large Direct Shear Apparatus
5. Multichannel Analysis of Surface Waves test facility
6. Table Top Digital Triaxial System
7. Soil testing model tank with all necessary parts/accessories
8. Direct Shear Test Apparatus, Motorized
9. Pneumatic Odeometer
10. Digital Point Load Test Apparatus
11. Laboratory CBR Test Apparatus, Motorized
12. Swell Pressure Test Apparatus
13. Unconfined Compression Test Apparatus, Motorized
14. Consolidation Test Apparatus
15. Laboratory Permeability Test Apparatus
16. Autoclave and Laminar Airflow
17. BOD Incubator Shaker with accessories
18. Soil Compaction Apparatus comprising of
    - Universal Automatic Compactor
    - Apparatus for Light and Heavy Compaction
19. Atterberg Limit Analysis Apparatus comprising of
    - Motorized Casagrande Liquid Limit Apparatus
    - Digital Type Liquid Limit Cone Penetrometer
    - Shrinkage and Plastic Limit Apparatus
20. Sieve Analysis Apparatus comprising of
    - Motorized Sieve Shaker with Indian Standard Sieves

- Hydrometer Test Set: Hydrometer; High Speed Stirrer; Sedimentation glass tube

21. Soil Density Apparatus comprising of
    - Sand Pouring Cylinder
    - Core Cutter
    - Relative Density Apparatus
22. Soil Moisture Content Calibrating Apparatus comprising of
    - Infra-Red Moisture Meter
23. Laboratory Electric Oven
24. Soil Specific Gravity Analysis Apparatus comprising of
    - Density Bottles; Vacuum Pump and Water Still
25. Laboratory Vane Shear Apparatus, Motorized
26. Soil Extraction and Sample Preparation Apparatus comprising of
    - Hydraulic Soil Sample Extruder
    - Motorized Soil Trimmer
27. Soil Sampling Apparatus comprising of
    - Sampling Augers
    - Sampling Tubes
    - Sampling kit
    - Constant Volume Moulds

Scopus ID

38062021100

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0000-0002-0916-4592

Researcher ID

N-3247-2019

Declaration

I hereby declare that all the information above is complete and true to the best of my knowledge

Date: 10-01-2024

Place: IIT(ISM) Dhanbad **(Lohitkumar Nainegali)**