

BIODATA

Name: **Dr. Susheel Kumar Katariya**

Present Designation: Associate Professor (since 25.09.2007 at Pantnagar)

Total service experience: 26 + Years (since 06.09.1999)

Date of Birth: December 26, 1976



Qualifications:

B. Tech. Civil Engineering (1997) from **R.EC. (N.I.T). Kurukshetra.**

M. E. in Building Science & Technology (1999) from **U.O.R. (I.I.T.) Roorkee.**

(*Thesis topic: RC floor systems in lightweight concrete for multistorey buildings*)

Ph.D. in Structural Engineering (2023) from **I.I.T. Roorkee.**

(*Thesis topic: Behaviour of thin-walled concrete-filled steel tubes in bending and compression.*

Pre-revised thesis topic: Eccentrically loaded thin-walled concrete-filled steel tubes.)

Job Experiences:

Associate professor (from Sept. 2007) in CED, College of Technology, Pantnagar (Uttarakhand).

Assistant Engineer (from March 2004 to Sept. 2007) in Uttarakhand P.W.D.

Lecturer (Assistant Prof.) (from Sept. 1999 to March 2004) at H.B.T.U. Kanpur (UP).

Research area: *Non-linear analysis of concrete-filled steel tubes columns/ beams, Stress-strain curve of confined concrete, Fiber element analysis, Recycled aggregate concrete and Concrete mix design.*

Job Assignments:

At G.B.P.U.A.T. Pantnagar as Associate Professor:

1. Teaching (U.G. & P.G. courses)
2. Lab in-charge of Structural Engineering lab.
3. Assistant Examination Controller.
4. Developed lab manuals.
5. Developed syllabus for P.G. students.
6. N.S.S. Programme Officer.
7. Member of Anti-ragging team.
8. Member of various enquiry committees.
9. Member of Academic Council.
10. Vetted estimates construction, maintenance and supply items for the University.
11. Department placement Counsellor.
12. Co-SPOC (Single Point of Contact) of the College.
13. Executive committee member of The Institution of Engineers (India), Pantnagar local centre April 2023-2025.
14. Member of advisory committee for M.Tech. students
15. Committee member of building construction of Uttrakhand Open University, Haldwani.
16. Stock verification of lab items.
17. Documents checking of B. Tech. first year students during their admission.
18. Environment Co-ordinator (TEQIP-III)
19. Member of quality checking committee for construction and maintenance work.
20. Observer in the PG admission for spot counselling.
21. Works as Dean's nominee for technical verifications, purchase of items for the hostels.
22. Acting Head of Department as the requirements.
23. N.B.A. works for Civil Engineering Department.
24. Member of selection committee of Teaching Personal (Guest faculty), COT Pantnagar.
25. Coding work for answer scripts of external examinations.
26. Member of hostel -level anti-ragging squads for first/ second year hostels.
27. Member of flying squad for anti-ragging in college hours
28. Member of committee for supervise inspection in hostels in late night.

Uttarakhand PWD as Assistant Engineer:

1. Executed survey works, tendering processes, and hill-cutting operations.
2. Prepared detailed estimates for hill road construction and maintenance projects.
3. Served as Public Information Officer.
4. Managed land acquisition procedures and compensation disbursement.
5. Handled departmental legal matters in Labour Court and District Court.

H.B.T.U. Kanpur as Lecturer (Assistant Professor):

1. Teaching (U.G. & P.G. courses).
2. Concrete lab in-charge.
3. Time table work for 13 branches.
4. Administrative Warden of W.C.H.-II.
5. Member of disciplinary committee.
6. Member of enquiry committee.
7. Assistant maintenance in-charge of Civil works.

M. Tech. Thesis Guided (11 Nos.):

1. Effects on compressive strength of recycled and natural aggregate concrete using black lintel powder subjected to elevated temperature and gradual cooling. *July 2018*, Deepak Sharma (Id. No.51227).
2. Numerical formulation and parametric investigations of the square and rectangular CFST columns subjected to axial loading. *July 2018*, Varsha Arya (Id. No. 43006).
3. Numerical modelling for square CFST column filled with normal strength concrete under axial compression. *July 2018*, Amit Rautela (Id. No. 50920).
4. Numerical modelling for predicting the post-peak behaviour of circular CFST stub columns under axial loading. *July 2018*, Gaurav Kashyap (Id. No. 50898).
5. Behaviour of RC building with outrigger system subjected to earthquake and wind effect. *Sept. 2019*, Prabhanshu Bisht (Id. No. 52479)
6. Numerical modelling for square and rectangular concrete-filled steel tubular columns. *July 2020*, Harshit Sachan (Id. No. 54073)
7. Non-linear finite element analysis of circular CFST columns under axial compression. *November 2021*, Pradeep Singh Kanyal (Id. No. 55313)
8. Numerical modelling for stress-strain curve of confined concrete in rectangular and square CFST elements under axial compression. *January 2023*, Mr. Alok Bhatt (Id No. 56990)
9. Numerical modelling for stress-strain curve of confined concrete in circular concrete-filled steel tubular column. *September 2023*, Naman Tewari (Id. No. 57995)
10. Numerical formulation for axial capacity of square CFST Column. *July 2025*, Suryakant Deoli (Id No. 60733)
11. Concrete mix (1:1.5:3) with varying proportions of 20 mm and 10 mm coarse aggregates and different water-cement ratios. *September 2025*, Gunjan Rawat (Id. No. 59610)

M. Tech. Thesis Examined: 08**B.Tech. Project guided: 20****Project guided (outside): 01**

Guided B. Tech. project to AMIE student (Mr. Piyush Kumar, ST-567553-2) in year 2020.

Invited Lecture/ resource person:

“Design of RCC slabs” on 25.07.2000 organised by I.R.D.T. Kanpur

“Highway Engineering Lab Practices” on 26th to 29th August 2002 organised by I.R.D.T. Kanpur

“Highway Engineering Lab Practices” on 27th to 28th February 2003 organised by I.R.D.T. Kanpur

“Advances in structural Engineering” on 24th to 26th September 2019 organised by C.O.T. Pantnagar

Delivered expert lectures to AEs and JEs of RWD Uttarakhand in 2023,2024 and 2025 at Pantnagar.

Keynote Speaker:

Presented a paper as keynote speaker in the **National Conference on Recent Advances in Science, Technology and Management** held in Phonics, Group of Institutions, Roorkee. (29th -30th April 2017)

Member of the Research Advisory Board of IIIMT University, Meerut.

Chartered Engineer: M-1441935 (Aug 2017), certificate issued by the Institution of Engineers (India).

Member of Editorial Board of:

1. International Journal of Structural Engineering and Analysis. ISSN: 2456-5326. [I.F.: 6]
2. International Journal of Concrete Technology. ISSN: 2456-8317. [I.F.: 5.9]
3. Journal of Structural Engineering and Management. ISSN: 2393-8773. [I.F.: 6]
4. World Journal of Engineering Research and Technology. [I.F.: 5.924]
5. Journal of Engineering and Software Applications. [I.F.: 2]
6. Nexus Global Research Journal of Multidisciplinary. [I.F.: N.A.]

Reviewer of:

1. International Journal of Innovative Research in Technology, ISSN 2349-6002. [I.F.: 8.01]
2. International Journal of Engineering Research & Technology, ISSN: 2278-0181. [I.F.: 8.7]

Research Publications:

Journals

1. **Katariya SK**, Prasad P, Kashyap G. Assessment of axial strength and post peak response in circular CFST stub columns, International Journal of Engineering Research & Technology, ISSN 2278-0181, Vol. 14, Issue 11, Nov. 2025. 1-6. DOI:10.17577/IJERTV14IS110397 **[I.F. 8.70]**
2. **Katariya SK**, Deoli S. Numerical Prediction of Axial Strength in Square Concrete-Filled Steel Tube Columns. Kronika Journal, ISSN 0023:4923, Vol. Issue 11, 2025, pp. 411-417. DOI:20.14148/kkj/v25.4965 **[I.F. 6.80]**
3. **Katariya SK**, Deoli S. Axial Behaviour of square CFST columns: A comprehensive parametric study. Computer Research and Development, ISSN 1000-1239 Vol. 25 Issue 10 2025., pp. 301-306. DOI:10.5281/zenodo.17680720 **[I.F. 8.57]**
4. **Katariya SK**, Rautela A, Prasad P. Nonlinear Constitutive Modelling of in-Filled Concrete in Square CFST Columns. International Journal of Innovative Science and Research Technology, ISSN 2456-2165, Vol. 10, Issue 11, Nov. 2025. DOI: 10.38124/ijisrt/25nov1123 **[I.F. 8.223]**
5. **Katariya SK**, Rawat G. Optimum concrete mix proportion with ratio 1:1.5:3, Computer Research and Development, ISSN 1000-1239 Vol. 25 Issue 10, 2025. 298-300. DOI:10.5281/zenodo.17640912 **[I.F. 8.57]**
6. **Katariya SK**. Parametric study on the bending response of rectangular CFST beams. Kronika Journal, ISSN 0023:4923, Vol.25 Issue 11, 2025, pp. 731-738. DOI:10.5281/zenodo.17769017 **[I.F. 6.80]**
7. **Katariya SK**, Kanyal P, Sachan H, Prasad P. Nonlinear finite element analysis of circular CFST columns under axial compression, World Journal of Engineering Research and Technology, ISSN 2454-695X, Vol. 11 Issue 10, 173-191. DOI:10.5281/zenodo.17747666 **[I.F. 7.029]**
8. **Katariya SK**, Bhatt A, Prasad P. Numerical Modelling of the Stress–Strain Curve of Confined Concrete in Rectangular and Square CFST Elements Under Axial Compression. International Journal of Innovative Research in Technology, ISSN 2349-6002, Vol.12 Issue 6, Nov. 2025, 7384-7389. **[I.F. 8.01]**
9. **Gupta, P.K.**, Katariya, S.K. (2015). Effect of Concrete Strength on Bending Capacity of Square and Rectangular CFST Elements. Advances in Structural Engineering, Springer. 2015. DOI:10.1007/978-81-322-2187-6_162. **[I.F. 2.6]**
10. **Gupta PK**, Katariya SK. Effect of cross-section on the flexural capacity of square concrete-filled steel tube (CFST) beams. International Journal of Applied Engineering Research, ISSN 0973-4562 volume 9, Number 7. 2014, 783-789. **[I.F. 0.364]**

11. Gupta PK, **Katariya SK**. Behaviour of concrete-filled rectangular steel tubes subjected to flexural loading. *Journal of steel structures & construction*, ISSN 2472-0437,3:2 (Suppl.) 2017, DOI: 10.4172/2472-0437-C1-002 [I.F. 0.89]
12. Sharma D, **Katariya SK**. Effect on strength of natural aggregate concrete and recycled aggregate concrete subjected to elevated temperature and gradual cooling. *International Journal of Current Trends in Engineering and Technology*, ISSN 2395-3152, Vol. 4, Issue:2, March-April. 2018 101-104.

International Conferences (outside India)

1. Gupta PK, Katariya SK. Parametric study of non-uniform thickness rectangular concrete filled steel tube (CFST) in pure bending. In: *International Conference on Construction Materials and Structures*; 2014; *Johannesburg (South Africa)*. p. 1007-1014. DOI: 10.3233/978-1-61499-466-4-1007

Conference (in India):

1. Gupta PK, Katariya SK. A study on concrete-filled rectangular steel tubes subjected to bending. The 5th Asia and Pacific Young Researchers and Graduates Symposium on Current Challenges in Structural Engineering; 2013; Jaipur (India). p. 309-319.
2. Varsha, Singh AK, Katariya SK. Numerical Formulation and Its Validation for CFST Columns Under Axial Loading. *AIP Conference Proceedings* Volume 24818 November 2022 Article number 0200482021 International Conference on Advancements in Engineering and Sciences (ICAES2021), Dehradun, July 2021 Code 184126. DOI:10.1063/5.0104522

Short-Term Courses / Faculty Development Programmes

1. **June 11–15, 2018:** TEQIP-III Summer Course conducted by IIT Roorkee on “*Active Learning, Autonomy, Academic Governance and R&D.*”
2. **March 20–24, 2017:** TEQIP course conducted by IIT Roorkee on “*Structural Elements Subjected to Extreme Loadings.*”
3. **June 2–6, 2014:** TEQIP one-week course conducted by IIT Roorkee on “*Geotechnical Earthquake Engineering.*”
4. **December 9–13, 2013:** TEQIP one-week course conducted by IIT Roorkee on “*Introduction to Modeling and Simulation.*”
5. **June 17–21, 2013:** TEQIP one-week course conducted by IIT Roorkee on “*Urban Transportation Systems Planning (UTSP).*”
6. **July 18–22, 2011:** Programme conducted by NITT & Research, Chandigarh on “*Evaluation of R.C.C. Structures Using Non-Destructive Techniques.*”
7. **July 1–5, 2011:** TEQIP one-week course conducted by the Department of Architecture & Planning and Civil Engineering on “*Designing Barrier-Free Environments.*”
8. **April 24–25, 2010:** Programme conducted by The Institution of Engineers (India), Roorkee Local Centre on “*Innovative Methods in Concrete Construction.*”
9. **July 2–7, 2009:** TEQIP one-week training programme on “*Infrastructural Development and Its Impact on Environment*” conducted by COT, Pantnagar.
10. **December 22–24, 2008:** Programme conducted by IIM Lucknow on “*Managing for Sustainable Competitive Advantage of College of Technology, Pantnagar University.*”
11. **September 19–23, 2007:** Programme organised by UAA, Nainital on “*Role of Remote Sensing & GIS in Disaster Management.*”

Workshop:

1. TRL assessment techniques for technology commercialization, 17-18th Oct 2023, Pantnagar.
2. Innovative construction Machinery, Materials and Methods, 26th and 27th Oct. 2015 organised by Indian Society for Construction Materials and Structures in association with IIT Roorkee.
3. Effective Teaching Pedagogy to Maximize Learning, 2nd -3rd January, 2008, Pantnagar.

Training:

1. Participated in 21 days training programme in 8th induction-course conducted by the Administrative Training Institute, Nainital. (2004)
2. Participated in a three-months training course conducted by State Engineering Training Institute, Kalagarh (U.P.) (2004)
3. Participated in a three-days training programme on “Modern Trends in design and construction of bridges and flyovers” conducted by National Institute for Training of Highways Engineers (NITHE) Noida (2005)

Life membership:

1. Indian Society for Construction Materials & Structures. (1998)
2. Indian Society of Remote Sensing, L-3179 (Sept. 2007)
3. Indian Society of Earthquake Technology, LM-1311 (Feb. 2007)
4. The Institution of Engineers (India) M-144193-5 (Nov. 2011)
5. Indian Concrete Institute, LM-10435 (Oct. 2014)
6. Australian Association for Steel-Concrete Composite Structures (AASCCS-2016)
7. Artificial Intelligence and Machine Learning Association (AIMLA-2025)
8. The International Academy of Science and Engineering for Development, 51050484. (March 2025)
9. International Society for Development and Sustainability (ISDS) (M13110771) April 2025

Major Consultancy Projects done:

1. Design of canal covering for main canals in Haldwani.
2. Design of counterfort retaining wall (11 m high) in Haldwani.
3. Design of RCC retaining wall (4 m high) in Rudrapur.
4. Protection work for Garjia temple (Uttarakhand)
5. Vetted number of drawings of *overhead water tanks* with suggestions/ corrections.
6. An Inquiry completed of the abutment failure of suspension bridge in Uttarakhand.

16. Subjects Taught:

Engineering Drawing, Engineering Mechanics, Concrete Technology, Design of Concrete Structures-I, Design of Concrete Structures-II, Estimation and Costing, CPM & PERT, Prestressed Concrete, Civil Engineering Construction and Drawing, Advanced Solid Mechanics, Theory of Elasticity, Limit state Design of Concrete Structures, Composite Material, Project, UG Seminar, Masters Seminar and Doctoral Seminar.

Academic Identity

- Scopus ID:** 56259145700
Google Scholar ID: <https://scholar.google.com/citations?hl=en&user=jqWpeMoAAAAJ>
Vidwan ID: 141504
ORCID ID: <https://orcid.org/0009-0003-4803-8008>
ResearchGate ID: researchgate.net/profile/Susheel_Katariya2
Publons: <https://www.webofscience.com/wos/author/record/PGL-9542-2026>
Academia: https://www.academia.edu/?from_navbar=true&trigger=nav
LinkedIn ID: www.linkedin.com/in/dr-susheel-kr-katariya-19940018