Curriculum Vitae

| Title PROF.(DR) | First Name AMBIKA | Last Nai BHAMB | | | |
|---|--|--|--|------------------|--|
| Designation | PROFESSOR | I | | | |
| Department | MATHEMATICS | | | | |
| Institutional Email Address | abhambani@jmc.du.ac.in | | | | |
| EDUCATION: | L | | | | |
| Degree | Institution | Year | Details | | |
| PhD | DELHI UNIVERSITY | 1998 | FLOWSHOP SEQUENCING PROBLEMS WITH MULTI-OBJECTIVES. | | |
| MPhil | DELHI UNIVERSITY | 1987 | MATHEMATICAL SOFTWARE | | |
| CAREER PROFI | LE: | | | | |
| Organisatio n /Institution | Designation | Duration | Role | | |
| Various colleges of Delhi University | Lecturer | 4 years, 7months, 10 day | Lecturer – Temporary. | | |
| Jesus & Mary College | > Designated as PROFESSOR, through Selection Committee, on | Total Teaching Experience: 39 years approx., in Delhi | Prior exper as Lecturer Temporary before joint JMC: 4 ye | r - ⁄, ing | |

| rent Position> Designated as Associate Professor: 01.01.2006> Designated as Reader, through Selection Committee, in 1998> Senior Lecturer: 18.11.1994> Lecturer, on Permanent, JMC, through Selection Committee: | University. | 7 months, 10 day |
|--|-------------|------------------|
| | | |

AREA OF INTEREST:

TEACHING EXPERIENCE (Subjects/Courses taught)

Statistics, Numerical Analysis, Calculus, Matrices, Analytic Geometry, Vectors, Differential Equations, Cryptography, FORTRAN, C++, Computer Mathematics(Organisation & Architecture), Computer Softwares [MATLAB, MATHEMATICA, MAXIMA, R].

HONORS & AWARDS:

Awards & Scholarships:

- **1.** Achieved AIR 11th Merit Position (position at National Level), in All India Senior School Examination , in the year 1980.
- 2. Achieved Merit position in Examination of Graduation, at University Level.
- 3. Awarded Govt.of India, National Scholarship Award, 1982.
- 4. Awarded UGC Junior Research Fellowship, 1985.
- Cleared NET, in 1985.
- 6. & 7. Have been honoured with two Awards, on 01.09.2024:
- 1. RESEARCH EXCELLENCE AWARD &
- 2. ACADEMIC EXCELLENCE AWARD.

By **MSME, Government of india,**

In association with Ministry of HRD, Govt.of India.

PUBLICATION DETAILS

Books:

- *Published Four Chapters in Edited Books, with ISBN nos.:
- 1. Chapter 4, Probability 1, P 57 to P 69, Sole Author, Current Research in Statistics and Mathematics (Volume 1), Bright Sky Publications, tie up with International Publications: Weser Books, Germany & Rubicon, England.
- 2. Chapter 5, Probability 2, P 71 to P 94, Sole author, Current Research in Statistics and Mathematics (Volume 1), Bright Sky Publications, tie up with International Publications: Weser Books, Germany & Rubicon, England.
- 3. Chapter 3, Prime Numbers, Research Trends in Mathematics and Statistics (Volume 21)". Akinik Publications, P 37 to P 58, Sole author, tie up with International Publications: Weser Books, Germany.& Rubicon, England.
- 4. Chapter 4, Cryptography, Research Trends in Mathematics and Statistics (Volume 21). Akinik Publications, P 59 to P 72, Sole author, tie up with International Publications: Weser Books, Germany & Rubicon, England.
- * Books Edited 2, In Statistics.

JOURNAL ARTICLES:

- 1. Bicriteria in Special Flow shop Problems, Vol 33, No. 4, 435-441, Indian Journal of Pure and Applied Mathematics, April 2002, INSA *Scopus indexed. UGC care listed*, *IF 0.559*.
- 2. Minimizing Total Flow time in Two-Machines Specially Structured Flowshop Sequencing Problem, Vol 26, No.1-4, 1-15, 2001, in Journal of Combinatorics, Information and System Sciences, USA, Peer reviewed Refereed Journal.

- 3. Bicriteria in a Two –Stage Flow shop Scheduling Problem, Vol 31, No. 11, 1475-1481, Indian Journal of Pure and Applied Mathematics, Indian National Science Academy, Nov 2000, *Scopus* indexed, UGC care listed, *IF* 0.559.
- 4. Special Class of Flowshop Sequencing Problems, Vol 24, No. 1, 1-16, 1999, in IAPQR Journal.
- 5. Bicriteria in Flowshop Scheduling Problem, Vol 22, No.1, 63 83, 1997, in Journal of Combinatorics, Information and System Sciences, USA.
- 6. Minimizing Mean Completion Time for Special Flowshop Problem, Vol 40, No. 1, 85-100, 1997, in Optimization, Germany, *Scopus, IF 4.4 Reuter's JCR*.
- 7. Sequencing with Restrictions in Processing Times, Vol 34, No.2, 16–127, 1997, Opsearch, *Scopus indexed, Scopus, IF 1.6 Reuter's JCR.*
- 8. Minimizing Rental Costs in Three-Machine Sequencing Problem, Vol 21, No. 1, 1996, 73–77 in IAPQR Journal.
- 9. A Three Machine Sequencing Problem in Rental Situations, Vol 15, No. 1, 1-14, 1999, International Journal IJOMAS.
- 10. Scheduling in Office Management, IJRAR, Jan, 2022, Vol.9, Issue 1, 406 416, Peer reviewed, Refereed Journal, UGC approved Journal, Sole Author
- 11. Scheduling in Hospital Administration, OPD, Surgeries & Emergencies, World Journal of Advanced Research and Reviews, [WJARR], Coden [USA]: WJARAI, Jan, 2022, Vol.13, Issue 1, 818–831, Peer reviewed, Refereed journal. UGC approved Journal.
- 12. Scheduling Models for Economical and Budget Travel with Optimal Rental Cost, Journal of Mathematical Problems, Equations and Statistics, Feb., 2022, Vol.3, Issue 1, 72 -77, RJIF : 5.30, Peer reviewed, Refereed Journal, Sole Author.
- 13. Yoga Asans with Correct Mathematical Movements for Optimal Health Benefits, Journal JETIR, Feb., 2022, Vol.9, Issue 2, 814-841, Peer reviewed, Refereed Journal, UGC Approved, Sole Author.
- 14. Mathematical Lens to Glimpse Astrology, International Journal of Creative Research Thoughts [IJCRT, January, 2023, Vol.11, issue 1, 400 420, Peer reviewed, Refereed Journal UGC approved Journal, Sole Author.
- 15. Weather Forecasting Through Mathematical Ability , International Journal of Statistics and Applied Mathematics , Accepted on 09-02-2023, Vol.8, issue 2, P-83 89, Peer reviewed, Refereed Journal. Sole Author .
- 16. Robust and Reliable Statistical Projection during Opinion and Exit Polls in India Based on Sampling Forecast Models, IJSIMR, USA, 19.03.23, Vol.11, issue 1, P 13-29, Sole Author.

No.of Citations > 36.

| Papers presented in Seminars/conferences: |
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| Paper presented in International Conference - ORSI • Operation Research Society of India, National level, held in 1995, in Delhi. Minimizing Mean Completion Time for Special Flowshop problem, published in Optimization, Germany, was presented in the conference of Operational Research Society of India, held at Delhi, in December 1995, and has appeared in the proceedings of ORSI, Opsearch (March 1996), 33, 1, 55, entitled as 'Minimizing Mean Completion Time in Special Cases'. |
| National Workshops and Seminars Organised: |
| UGC SPONSORED SEMINAR ORGANIZED: 2 days programme JMC - 2014, UGC sponsored seminar. *Total No.of Seminars/Conferences/Workshops/other college University activities organised > 20 |

Talks/Lectures:

 Paper on 'Introduction to Computers', presented in 1998, in CPDHE, Delhi University, in Math –14.

Orientation and Refresher Courses: Courses Attended:

- Orientation Programme, from CPDHE, Delhi University, in 1991.
- Refreshers Course, from CPDHE, Delhi University, in May, 1992.
- Refreshers Course, from CPDHE, Delhi University, in 1998.
- Refreshers Course, from Jamia Milia Islamia University, in 1998.

Participation as Resource Person:

- MATH -3, Numerical Analysis & Computer Programming Resource person Refresher's course at CPDHE, Delhi University Computer workshop, Delhi University, May 1-21, 1992.
- Computer's workshop, in Refresher's course, by CPDHE, Delhi University, in the year 1992
- IGNOU-Academic Councillor, 1992-95.
- Subject Expert Selection of Teachers, in Moti Lal Nehru School of Sports, Rai, Haryana, in 1990.
- For empanelment as an Adviser/Subject Expert: Subject Expert for assisting the Union Public Service Commission for Interviews/PersonalityTest Boards.

OTHER DETAILS

WORKSHOP ATTENDED:

- Workshop on Foundation Course, conducted by CPDHE, Delhi University, in June 2013. *FDP on "Anti-Plagiarism Software in Higher Education: An Overview of Urkund on 18th June, 2022, by Dr. Shipra Awasthi, Assistant Librarian in Dr. B.R Ambedkar Central Library, JNU, organized by IQAC, Jesus & Mary College.
- Participated in the **FDP**, on 'Online Teaching Tools', Teaching Learning Centre, at Jesus & Mary College, University of Delhi, from 24.07.2020 to 25.07.2020.
- 6-Day International **Faculty Development Programme** on 'Quality Enhancement to Facilitate Academic Excellence and Well-being', organized by the IQAC, Jyoti Nivas College Autonomous, on 16 & 17.01.2024.
- Webinars Attended : > 35 [2020 onwards].
 - Attended Faculty Development Programme :

Topic: *"Revolutionizing Education: The Digital Transformation of Teaching Pedagogy."*, By Dr. Anubhuti Sharma

Dates:05/10/2024, Mode - Online.

Organised by:

St. Paul Institute of Professional Studies, Indore* in collaboration with *Xavier Board of Higher Education (Northern Region)*

- Participated in the Three Days National Level Online Workshop on "Writing and Publication Guidance for Scopus Journals" from 7th to 9th September, 2024, by Micro Enterprise under MSME, Govt. of India.
- Conference Date: 01st September 2024, on "Interdisciplinary Research on Management, Technology Social Science, Education, and Agriculture", organised by Research Education Solutions in association with "Institute of Management, Bhubaneswar".
- In-person attendance for *Budget 2025 The Verdict'* by CNBC-TV18 at The Oberoi, New Delhi, on Date*: 3rd February.
 Speakers:
 - Shri Hardeep Singh Puri / Shri Jyotiraditya Scindia / Shri Ashwini Vaishnaw.
 - Tuhin Kanta Pandey Finance & Revenue Secretary.
 - Shri Ravi Agarwal Chairperson, Central Board of Direct Taxes
 - *Shri Sanjay Kumar Agarwal Chairman, Central Board of Indirect Taxes and Customs & Special Secretary to the Government of India
 - Rajesh Kumar Singh: Defence Secretary
 - Sandeep Poundrik Secretary Ministry Steel
 - · Sumita Dawra Labour Secretary
 - · Nidhi Khare Consumer Affairs Secretary.

EXAMINATION WORK:

Involved extensively in University Examinations, as paper Setters & Superitendent.

COURSE FRAMEWORK:

Involved extensively in framing Courses, of Delhi University.

ADMINISTRATIVE WORK:

 ${\it In}$ volved extensively in Administrative work throughout.

- College Societies/ Committees in which involved, as Convenor/ Member:
- JMCEP, Peace Society, Green Society, Fees Concession Society, Puzzle Society, Sports Committee, Study Leave Committee, Grievance Cell.
- Head of the Department for 4 years & Association Incharge for 4 years.
- TIC in the dept.: 1998-2000 & 2014-16.
- Association Incharge in the dept.: 2012-14.
- Member of Selection Committees for Adhoc appointments in Dept. of Mathematics & Dept. of Computer Science.
- Member of Selection Committees for Permanent appointments in Dept. of Mathematics & Dept. of Computer Science, in the year 2015.
- Academic advisor, for IGNOU, for 3 years: 1992 95.

Membership in Professional Bodies:

- 1. Google Scholar
- 2. Research Gate
- 3. Springer.
- 4. Academia.edu.
- 5. LinkedIn
- 6.Twitter
- 7. DU alumni page.
- 8. JMC College website Official page.
- 9.Scopus.
- 10. ORCHID.
- 11. Web of Science, WoS.
- 12..Thomson Reuters.
- 13. Elsevier's.
- 14. Taylor & Francis.
- 15. IAENG.