


Curriculum Vitae

1. Personal Details

(i)	Name	Dr. Deepti Mokati	
(ii)	Father's Name	Shri Govind Das Maheshwari	
(iii)	Date of Birth	18/11/1983	
(iv)	Address for Communication	Flat No. 203, Gangotri Apartment, C-1, Goyal Nagar, Near Shakuntala Devi Hospital, Indore (M.P.)-452001	
(v)	Permanent Address	Flat No. 203, Gangotri Apartment, C-1, Goyal Nagar, Near Shakuntala Devi Hospital, Indore (M.P.)-452001	
(vi)	Contact Details	9926073057	
(viii)	Nationality/Religion	Indian	

2. Educational Qualifications

No.	Degree	Year	University/Institute	Division	Specialization
1.	Ph. D.	2022	School of Studies in Mathematics, Vikram University, Ujjain (M.P.)		Mathematics
2.	M.Phil.	2007	School of Studies in Mathematics, Vikram University, Ujjain (M.P.)	First	Mathematics
3.	M.Sc.	2006	School of Studies in Mathematics, Vikram University, Ujjain (M.P.)	First	Mathematics
4.	B.SC.	2004	Madhav Science College, Vikram University, Ujjain (M.P.)	First	Computer Science
5.	HSC	2001	St. Meera's Convent School, MP Board	First	Mathematics

PhD Title : A Study on Mathematical Models for Bacterial Infectious Diseases

3.	<u>Present Position Held</u>	Assistant Professor Department of Applied Mathematics and Computational Science Shri G. S. Institute of Technology and Science, Indore
4.	<u>Career History and Profile of Work Experience:</u>	
(a)	Achievements	
1.	Merit holder in M.Sc. (Mathematics) in Vikram University, Ujjain (M.P.)	
2.	NPTEL courses : (a) Numerical Methods, IIT Roorkee, Aug.-Oct. 2019. (8 week course) (b) Graph Theory, IISER Pune, Jan.-Mar. 2020. (8 week course) (c) Matrix Analysis with Applications, July-Sep. 2024. . (8 week course)	
3.	Moodle Test for Teachers , Site Administrators under Moodle Learning Management System remotely conducted by the Spoken Tutorial project, IIT Bombay during 12-18 July 2024.	

4.	"ENERGY LITERACY TRAINING " conducted by SGSITS Indore, in collaboration with the Indore Municipal Corporation and the Energy Swaraj Foundation in 2024.
5.	Reviewer in BP International, west Bengal,India and London,UK.
6.	Institute Criteria 6 section sub coordinator in NAAC 2023.
7.	Website coordinator of Department of Applied Mathematics and Computational Science, SGSITS, Indore from 2023.
(b)	Academic / Teaching Experience and subjects taught :
1.	Teaching Experience : 14 Years
2.	Mathematics I , Mathematics II, Mathematics III, Mathematics IV(UG-B.Tech.)
3.	Applied Mathematics (PG-M.Sc.,MCA,M.Tech.)

5. Research Experience : 8 Years

	<u>Area of Research Interest:</u> Mathematical Modeling in Epidemiology
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(a)	<u>P.G. Dissertation Guidance</u> 08 M.Sc. Dissertation (Applied Mathematics)
(b)	<u>Research Papers Publications</u>
1.	Deepti Maheshwari,Bijendra Singh, Ashok Ganguly,A model of cyclic type with temporary immunity for the transmission of Pertussis ,Bulletin of Pure & applied Mathematics, Jodhpur, Volume 3, Number 1 , 2009 ,128-134 .
2.	Deepti Mokati,Ashok Ganguly, Local & global stability of a time delay SIRS epidemic model with varying immunity period , International J. of Math Sci. & Engg. Appls. Vol 8 No. 3, May 2014,67-75
3.	Deepti Mokati, Stability analysis and uniform persistence of a generalized malaria model with relapse , International J. of Computer & Mathematical Sciences Vol. 4 Issue 6 ,June 2015, 21-30 .
4.	Deepti Mokati, Stability analysis of a generalized SEIR epidemic model with limited resource for treatment , International J. of Applied Mathematics & Statistical Sciences , Vol. 4 , issue 4, Jun-July 2015,39-50 .
5.	Deepti Mokati, V.H. Badshah, N. Gupta, Mathematical Modeling and Stability Analysis for a SIS Typhoid Transmission Dynamics,JETIR,Vol.6,Issue3,2019,1125-1134.
6.	Deepti Mokati, V.H. Badshah, N. Gupta, A Mathematical Model for SIS Cholera Epidemic with Quarantine Effect, American Journal of Applied Mathematics,7(5),2019,145-151.
7.	Deepti Mokati, V.H. Badshah, N. Gupta, Modeling and Stability Analysis of SEIQ Tuberculosis Transmission Dynamics, Vikram Mathematical Journal, Vol. 39-40, 2019-2020, 7-21.
8.	Deepti Mokati, V.H. Badshah, N. Gupta, Mathematical Analysis for SEIQRS Typhoid Fever Model, Vikram Mathematical Journal,Vol.39-40,2019-2020,22-36.
9.	Deepti Mokati, V.H. Badshah, N. Gupta, Stability Analysis for an SEIQR Epidemic Model with Saturated Incidence Rate, Springer Proceedings in Mathematics & Statistics 308, Springer Nature Singapore Pte Ltd.,2020,51-589.(UGC-CARE Group-II SCOPUS Indexed)
10.	Deepti Mokati, V.H. Badshah, N. Gupta, Mathematical Modeling of SIQS Cholera Dynamics with Vaccination, Juni Khyat ,Vol.10(6),2020,468-477. (UGC-CARE Group-I)

11.	Deepti Mokati, V.H. Badshah, N. Gupta, Mathematical Analysis for a SEIS Typhoid Epidemic Model ,Journal of Xi'an Shiyu University, Natural Science Edition,Vol.16(9),2020,206-213. (UGC-CARE Group-II SCOPUS Indexed)
12.	Deepti Mokati, V.H. Badshah, N. Gupta, Modeling and Stability Analysis of SIQS Cholera Transmission Dynamics ,Journal of Xi'an Shiyu University, Natural Science Edition,Vol.16(9),2020,255-266. (UGC-CARE Group-II SCOPUS Indexed)
13.	Deepti Mokati, V.H. Badshah, N. Gupta, Mathematical Analysis of a Vaccinated Model with Immigration and Generalized Saturated Incidence Rate Function, Reliability: Theory and Applications for the December 2020 special vol(16)(1)January 2021,98-110. (UGC-CARE Group-II SCOPUS Indexed)
14.	Deepti Mokati, Shubhra Jain, Mathematical Modelling and Stability Analysis for an VSEIHRVbB Typhoid Fever Model,Journal of Technology,Vol.11 Issue 8,2023,160-172. (UGC-CARE Group-II SCOPUS Indexed)
15.	Deepti Mokati, Stability Analysis of an SEIE Epidemic Model with Non-Monotonic Saturated Incidence Rate, Journal of Systems Engineering and Electronics, Vol. 34 issue 12 ,2024,622-630. (UGC-CARE Group-II SCOPUS Indexed)
(c)	<u>Research Papers presented in conferences</u>
1.	A model of cyclic type with temporary immunity for the transmission of Pertussis presented in the Conference of Indian Mathematical Society held by Department of Mathematics, University of Pune, College of Engineering, Pune and Fergusson College , Pune in December 2007.
2.	Stability Analysis for an SEIQR Epidemic model with Saturated Incidence Rate ,presented in the International conference on Mathematical Modeling and Scientific Computing with applications organized by Indian Institute of Technology(IIT) , Indore(M.P.) during July 19-21,2018 . (Published through conference)
3.	Mathematical Modeling of SIQS Cholera Dynamics with Vaccination presented in international conference on RS:SRIDRTAS-2020 organized by Department of Chemical Science ,Christian Eminent College, Indore(M.P.) during 31 st May-2 nd June 2020. (Published through conference)
4.	Mathematical Analysis of a Vaccinated Model with Immigration and Generalized Saturated Incidence Rate Function, presented in 2 nd international conference(Digital) on Research and Innovations in Science, Engineering and Technology ICRISETR-2020 organized by Birla Vishwakarma Mahavidhayalaya Engineering College,Gujrat India,during 4-5 th Sep.2020. (Published through conference)
5.	Mathematical Analysis for SEIQRS Typhoid Fever Model presented in International Conference on Advances in Physical, Mathematical & Computational Sciences organized by the Faculty of Physical Sciences , St. Aloysius' College (Autonomous) , Jabalpur during 12-13 June2020.
6.	Stability Analysis of an SEIE Epidemic Model with Non-Monotonic Saturated Incidence Rate presented in International Conference on Mathematical Sciences, Physical Sciences and their Applications (ICMSPSA-2024) organized by Department of Mathematical Sciences, A.P.S. University, Rewa(M.P.), India, Mangosuthu University of Technology, Durban, University of Zululand, Kwa-Dlangezwa, South Africa and School of Studies in Mathematics, Vikram University, Ujjain(M.P.), India during 13-14 November 2024.

6.	<u>Membership of Professional Societies</u>
1.	Life Time Membership for Vigyan Bharati Parishad

7.	<u>List of Conference/Workshops Organized</u>
1.	National Workshop on “Recent Advances in Mathematics and its Applications” , organized by Department of Applied Mathematics and Computational Science ,Shri G.S. Institute of Technology and Science, Indore (M.P.) during January 20-21, 2017 .
2.	International Conference on “Computational Mathematics and its Applications”, organized by Department of Applied Mathematics and Computational Science ,Shri G.S. Institute of Technology and Science, Indore (M.P.) with Department of Mathematics IIT, Indore during 12-14 Nov. 2019.
3.	One day workshop on National Mathematics day-2020 , organized by Department of Applied Mathematics and Computational Science ,Shri G.S. Institute of Technology and Science, Indore (M.P.) supported by National Council of Science & Technology Communication, DST, New Delhi and M.P. Council of Science & Technology Communication, Bhopal(M.P.), held on 07-26 December 2020.
4.	Two days workshop on National Science day-2021 , organized by Department of Applied Mathematics and Computational Science ,Shri G.S. Institute of Technology and Science, Indore (M.P.) supported by National Council of Science & Technology Communication, DST, New Delhi and M.P. Council of Science & Technology Communication, Bhopal(M.P.), held on 07-08 March 2021.
5.	One Day workshop on “Engineering Applications of Mathematics”, organized by Department of Applied Mathematics and Computational Science ,Shri G.S. Institute of Technology and Science, Indore (M.P.), 1 st October 2022.
6.	One Week Workshop on “ MATLAB for Beginners”, organized by Department of Applied Mathematics and Computational Science ,Shri G.S. Institute of Technology and Science, Indore (M.P.) during 6 th -11 th December 2021.
7.	Three days workshop on National Mathematics day-2022 , organized by Department of Applied Mathematics and Computational Science ,Shri G.S. Institute of Technology and Science, Indore (M.P.) supported by National Council of Science & Technology Communication, DST, New Delhi and M.P. Council of Science & Technology Communication, Bhopal(M.P.), held on 26 th ,30 th December 2022 and 5 th Jan.2023.
8.	Two days workshop on National Science day-2023 , organized by Department of Applied Mathematics and Computational Science ,Shri G.S. Institute of Technology and Science, Indore (M.P.) supported by National Council of Science & Technology Communication, DST, New Delhi and M.P. Council of Science & Technology Communication, Bhopal(M.P.), held on 02-03 March 2023.
9.	Two days workshop on National Mathematics day-2023 , organized by Department of Applied Mathematics and Computational Science ,Shri G.S. Institute of Technology and Science, Indore (M.P.) supported by National Council of Science & Technology Communication, DST, New Delhi and M.P. Council of Science & Technology Communication, Bhopal(M.P.), held on 4 th -5 th Jan.2024.
10.	Three Days workshop on Bhartiya Ganit Shastra : Processes and its Applications in Modern Mathematics , organized by Department of Applied Mathematics and Computational Science in Collaboration with JKMS Foundation ,Ahmedabad held on 9th to 11th Feb 2024.
11.	National Science Week 2024 organized by Department of Applied Mathematics and Computational Science ,Shri G.S. Institute of Technology and Science, Indore (M.P.) supported by National Council of Science & Technology Communication, DST, New Delhi and M.P. Council of Science & Technology Communication, Bhopal(M.P.), held on 11 th -15 th March 2024.
12.	One Day workshop on Intellectual Property Rights (IPR) , organized by the Department of Applied Mathematics and computational science in collaboration with the Madhya Pradesh Council of Science and Technology Communication, Bhopal(M.P.), held on 20 th September 2024.

8.	<u>List of Seminars / Workshops/Summer/Winter Courses Attended</u>
1.	International conference on “ Mathematical Modeling and Scientific Computing”, organized by Indian Institute of Technology(IIT) , Indore(M.P.) during July 19-21,2018 .
2.	TEQIP-III sponsored National Workshop on (Role and Importance of Mathematics in Industries”, organized by Department of Applied Mathematics and Computational Science ,Shri G.S. Institute of Technology and Science, Indore (M.P.) during April 27-28,2018
3.	Summer school on “ Industrial Mathematics” , organized by Department of Applied Science, SIRT, Sage University, Indore(M.P.) during 11-16 May 2020.
4.	TEQIP III sponsored Three days FDP on “ Mathematical and Computational Modeling”,organized by Lakshmi Narain College of Technology and Science,Bhopal(M.P.) during 18-20 May 2020.
5.	Summer School on “ Numerical Computational Method and its Application”,organized by Department of Applied Science,Sage University Indore (M.P.) during 26-29 May 2020.
6.	National webinar on “Python Programming and Computer Vision “,organized by Department of Computer Science,Govt. Holkar Science College,Indore(M.P.) during 25-26 May 2020.
7.	One day webinar on “ Large scale Machine learning Algorithms”,organized by Department of Applied Mathematics and Computational Science ,Shri G.S. Institute of Technology and Science, Indore (M.P.) on 5 th June 2020.
8.	One day webinar on “ Artificial Intelligence and Influence of Mathematics”, organized by Department of Applied Mathematics and Computational Science ,Shri G.S. Institute of Technology and Science, Indore (M.P.) on 7 th June 2020.
9.	TEQIP III under RGPV Bhopal sponsored Three days FDP on “ Innovative Research Methodologies for challenging problems of future in science, Technology, Engineering and Management “,organized by Department of Engineering Sciences and Humanities,IIST,Indore(M.P.) during 5-7 June 2020.
10.	One week International FDP on “ Fixed point Theory and its Applications”, organized by Department of Mathematics and Statistics,School of Basic Sciences, Manipal University,Jaipur during 15-19 2020.
11.	TEQIP III sponsored e-training FDP on “ Mathematics with MATLAB and Mathematica”, organized by Department of Mathematics,IIT,Indore(M.P.) during 23-28 November 2020.
12.	One week National Online FDP on “Advanced Opportunities and implicit Research Technologies in Sciences”, organized by Institute of Science and Research ,IPS Academy, Indore(M.P.) during 7 th -12 th June 2021.
13.	One Week Short Term Course on “Implementation of Numerical Methods using MATLAB”, organized by Department of Mathematics,IIT,Indore(M.P.) during 3rd-8th January 2022.
14.	One Week Short Term Course on “Sampling Theory and Its Applications:Signal, Image Processing and Data Science”, organized by Department of Mathematics,IIT,Indore(M.P.) during 24th-29th January 2022.
15.	Two Day workshop on”Mathematical Ecology and Epidemiology”, organized by Department of Mathematics,IIT,Indore(M.P.) during 17 th -18 th June 2022.
16.	One week FDP on “Optimization Techniques using Mathematical Methods and Evolutionary Algorithms” organized by Division of Mathematics, School of Advanced Sciences, Vellore Institute of Technology, Chennai from 13th - 17th February 2023.
17.	Three-Day International Workshop on “Optimization Models for Machine Learning & Applications” held during 20th- 22nd July, 2023.
18.	One week FDP on Data Analysis Using Advanced Computational Techniques Organized by Department of Statistics and Mathematics, Amity University Calcutta from 24-28 July 2023.

19.	Online Short-Term Course on Mathematical Modelling and Numerical Simulation (MMNS 2023) organized by Dr B. R. Ambedkar National Institute of Technology Jalandhar, India during July 24 - 28, 2023.
20.	FDP on Data Analysis using Advanced Computational techniques organized by Department of Statistics and Mathematics , Amity University, Kolkata during 24-07-2023 to 28-07-2023.
21.	Online Short-Term Course on Mathematics with Computational Learning for Engineering and Technological Applications organized by Department of Mathematics , Dr. B. R. Ambedkar National Institute of Technology, Jalandhar, Punjab, India during 20-11-2023 to 24-11-2023.
22.	FDP on Mathematics in engineering and Science - Importance and Applications organized by the Department of Mathematics, School of Advanced Sciences, VIT-AP University, Andhra Pradesh during 02-01-2024 to 06-01-2024.
23.	FDP on Recent Advances In Mathematical Modelling & Optimization organized by Department of Mathematics, CSSR & SRRM Degree & PG College Kamalapuram, YSR, A.P., India during 08-01-2024 to 12-01-2024.
24.	FDP on Empowering Faculty through IPR-ICT-NEP Integration & Research Methodology organized by Department of Applied Science Sagar Institute of Research and Technology-Excellence, Bhopal(M.P.),India during 19-02-2024 to 23-02-2024.
25.	Short Term Training Programme on MATLAB organized by Department of Mathematics, CSSR & SRRM Degree & PG College Kamalapuram, YSR, A.P., India during 08-04-2024 to 14-04-2024.
26.	FDP on Wavelet and its Applications organized by Division of Mathematics , School of Advanced Sciences, VIT, Chennai during 15-04-2024 to 19-04-2024.
27.	Workshop on SCILAB organized by Department of Mathematics, CSSR & SRRM Degree & PG College Kamalapuram, YSR, A.P., India during 29-04-2024 to 04-05-2024.
28.	Online FDP on Exploring Recent Trends in Applied Mathematics and Machine Learning organized by Department of Mathematics , Koneru Lakshmaiah Educational Foundation(Deemed to be University), Bachupally Campus, Hyderabad. during 20-05-2024 to 24-05-2024.
29.	Workshop on Recent Development of Mathematical Sciences on Biological and Dynamical Systems with Fuzzy and Fractional Environments organized by the Department of Mathematics, Mahadevananda Mahavidyalaya, Monirampore, Barrackpore, North 24 Parganas during 19-06-2024 to 29-06-2024.
30.	Online FDP on Moodle Learning Management System organized by Shri Govindram Seksaria Institute of Technology and Science, Indore with course material provided by Spoken Tutorial Project, IIT Bombay during 12-07-2024 to 18-07-2024.
31.	Online FDP on Recent Trends in Computational Sciences organized by Amity University of Applied Sciences, Department of Statistics and Mathematics, Amity University during 22-07-2024 to 26-07-2024.
32.	Online FDP on Python organized by Department of Computer Science & Applications, CSSR & SRRM Degree & PG College Kamalapuram, YSR, A.P., India during 14-10-2024 to 19-10-2024.
33.	Online FDP on Algebra, Analysis and Number Theory organized by Department of Mathematics, SRM University, Andhra Pradesh during 16-12-2024 to 20-12-2024.

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