


## FACULTY PROFILE

<b>NAME</b>	<b>Dr. SHIKHI M</b>	
<b>DESIGNATION</b>	<b>Assistant Professor</b>	
<b>QUALIFICATION</b>	<b>M. Sc., M. Ed., M. Phil., Ph. D.</b>	
<b>EMAIL ID</b>	<b>shikhianil@gmail.com</b>	
<b>ADDRESS</b>	<b>Sree House, Panolimeethal, Kuthiravattam, Kozhikode-673016</b>	

### POSITIONS HELD IN COLLEGE

<ul style="list-style-type: none"><li>• Website committee convenor (2022-23)</li></ul>
<ul style="list-style-type: none"><li>• IQAC member (2022-23)</li></ul>
<ul style="list-style-type: none"><li>• NIRF committee member (2022-23)</li></ul>
<ul style="list-style-type: none"><li>• CCSS(UG) Committee member (2022-23)</li></ul>
<ul style="list-style-type: none"><li>• Scholarship Nodal Officer (2021-22)</li></ul>
<ul style="list-style-type: none"><li>• Website committee Member (2021-22)</li></ul>
<ul style="list-style-type: none"><li>• Admission Committee (UG) Member (2021-22)</li></ul>
<ul style="list-style-type: none"><li>• CCSS(UG) Committee Member (2021-22)</li></ul>
<ul style="list-style-type: none"><li>• COVID Protocol Cell Member (2021-22)</li></ul>

### TEACHING INTERESTS

Algebra, Discrete Mathematics, Topology

### RESEARCH AREAS

Algebraic graph theory

### RESEARCH GUIDESHIP AND CENTRE

RESEARCH CENTRE - N A

**Ph.D GUIDED: Nil**

**RESEARCH PROJECTS/GRANTS/FELLOWSHIPS RECEIVED: Nil**

**MEMBERSHIPS IN BOARD/ ASSOCIATION/ PROFESSIONAL AFFILIATIONS**

- Calicut University UG board member (2020-23)

**INVITED TALKS/IN MEDIA/ANY OTHER**

- Delivered an invited lecture on the topic ‘ Beauty of symmetry in groups’ in the multi-disciplinary webinar series organized by Sree Narayana Guru College, Chelannur on 30<sup>th</sup> September 2020.
- Delivered an invited lecture on the topic ‘ Non-Euclidean Geometry’ in the multi-disciplinary webinar series organized by Sree Narayana Guru College, Chelannur on 13<sup>th</sup> January 2022.
- Delivered an invited talk on ‘Automata- The modelling of a digital computer’ organized by Department of Mathematics, Malabar Christian college, Kozhikode on 07.02.2022.

**JOURNAL PUBLICATIONS**

SL.NO.	TITLE	NAME OF JOURNAL / VOL. NO / ISSUE NO / PAGE NOS	ISSN NO	MONTH / YEAR
1.	‘Common Neighbor Polynomial of Graphs’	Far East Journal of mathematical sciences, Volume 102, Number 6, 2017, Pages 1201-1221.	0972-0871	2017
2.	‘Common Neighbor Polynomial of Graph Operations’	Far East Journal of mathematical sciences, Volume 102, Issue 11, 2017, Pages 2629 - 2641.	0972-0871	2017
3.	‘CNP-Equivalent Classes of Graphs’	South East Asian Journal of Mathematics and Mathematical Sciences, Vol.13, No.2, 2017, pages 75-84.	0972-7752	2017
4.	On the stability of Common Neighbor Polynomial of Some Graphs.	South East Asian Journal of Mathematics and Mathematical Sciences, Vol.14, No.1, 2018, pages 95-102.	0972-7752	2018

5.	‘The Common neighbor polynomial of some graph constructions’	International Journal of Research in Advent Technology, Vol.6, No.11, 2018, pages 3330-3334.	2321-9637	2018
6.	‘On the real roots of Common neighbor polynomial of graphs’.	Journal of Applied Science and Computations, Vol.6, Issue 4, 2019, pages 1424-1431.	1076-5131	2019
7	Generalized Common neighbor polynomial of graphs	International Journal of Mathematical Combinatorics, Vol.3, 2019, pages 80-89.	1937-1055	2019
8	Common neighbor polynomial of graphs and its significance in network data clustering	Journal of Xidian university, ol 14, Issue 4, 2020, Pages 857-862	1001-2400	2020
9	Common Neighbor Polynomial of Some Dendrimer Structures	Advances and Applications in Discrete Mathematics, Volume 28, Number 1, 2021, Pages 13-24	0974-1658	2021
10	Common neighbour polynomial of some special trees	Ratio Mathematica, Volume 42, 2022, Pages 195-204	1592-7415	2022

**CONFERENCE PUBLICATIONS:**

SL.NO	TITLE of the paper	NAME OF THE CONFERENCE	AUTHOR NAMES	ISBN NO.	MONTH/ YEAR

**ARTICLES IN PERIODICALS/MAGAZINES/ANY OTHER: Nil**

**BLOG/WEB ARTICLES: Nil**

**BOOKS AS AUTHOR/EDITED/CHAPTERS/REVIEWS**

SL.NO	TITLE	AUTHOR NAMES	ISBN NO.	MONTH/ YEAR
1.	Common Neighbor Polynomial of Graphs	Shikhi M, Anil Kumar V	978-620-4-72850-6	2021
2.				

**SEMINARS ORGANIZED : Nil**

## MOOC COURSE CONDUCTED Nil

### E-CONTENT DEVELOPED

SL.NO	SUBJECT	TOPIC	WEBSITE LINK
1.	Mathematics	The language of logic	<a href="https://youtu.be/mblqiICrlzs">https://youtu.be/mblqiICrlzs</a>
2.	Mathematics	Number theory and linear algebra	<a href="https://www.youtube.com/playlist?list=PLEdx4Y9P9rky_n_RiWsj2iW9dLgNxBqoLA">https://www.youtube.com/playlist?list=PLEdx4Y9P9rky_n_RiWsj2iW9dLgNxBqoLA</a> (Playlist)
3.	Mathematics	Logical connectives- part 2	<a href="https://youtu.be/si5eiToqlew">https://youtu.be/si5eiToqlew</a>
4.	Mathematics	Logical equivalence of compound propositions	<a href="https://youtu.be/3OrhrMzC7xI">https://youtu.be/3OrhrMzC7xI</a>
5.	Mathematics	Logical quantifiers	<a href="https://youtu.be/8VYriNN_Tzo">https://youtu.be/8VYriNN_Tzo</a>
6.	Mathematics	De'Morgan's Law of quantifiers	<a href="https://youtu.be/X_IgilM4fO4">https://youtu.be/X_IgilM4fO4</a>
7.	Mathematics	Proof methods 1	<a href="https://youtu.be/hXWQs6OpH90">https://youtu.be/hXWQs6OpH90</a>
8.	Mathematics	Proof methods 2	<a href="https://youtu.be/kmuBytTiGE4">https://youtu.be/kmuBytTiGE4</a>
9.	Mathematics	Algebra lecture series	<a href="https://www.youtube.com/playlist?list=PLEdx4Y9P9rkwbfQ-tftJnOLPNwiJ3Ktpf">https://www.youtube.com/playlist?list=PLEdx4Y9P9rkwbfQ-tftJnOLPNwiJ3Ktpf</a> (Playlist)
10.	Mathematics	Discrete Mathematics-I MSc Mathematics	<a href="https://www.youtube.com/playlist?list=PLEdx4Y9P9rky_OLMPtHBREQJc9Q5wU2qS3">https://www.youtube.com/playlist?list=PLEdx4Y9P9rky_OLMPtHBREQJc9Q5wU2qS3</a> (Playlist)
11.	Mathematics	Automata- I MSc Mathematics	<a href="https://www.youtube.com/playlist?list=PLEdx4Y9P9rkWLm-cKQ3kRdVV7zck-7Mae">https://www.youtube.com/playlist?list=PLEdx4Y9P9rkWLm-cKQ3kRdVV7zck-7Mae</a> (Playlist)
12.	Mathematics	Number theory- I BSc Mathematics	<a href="https://www.youtube.com/playlist?list=PLEdx4Y9P9rkzvnC2_u0cXydsvzsSYdEJp">https://www.youtube.com/playlist?list=PLEdx4Y9P9rkzvnC2_u0cXydsvzsSYdEJp</a> (Playlist)
13.	Mathematics	Boolean Algebra- I MSc Mathematics	<a href="https://www.youtube.com/playlist?list=PLEdx4Y9P9rkzvnC2_u0cXydsvzsSYdEJp">https://www.youtube.com/playlist?list=PLEdx4Y9P9rkzvnC2_u0cXydsvzsSYdEJp</a> (Playlist)

**PAPER PRESENTATION AT STATE / NATIONAL/ INTERNATIONAL PROGRAMMES**

SL.NO	TITLE OF THE PAPER	NAME OF THE INSTITUTION	NAME OF THE CONFERENCE/SEMINAR	VENUE & DATE
1.	Common neighbour polynomial of some graph structures	Birla Institute of Technology and Science (BITS) Pilani, Goa	International Conference on Discrete Mathematics and Its Application to Network Science	BITS Pilani, Goa during 7-10 July 2018.
2.	Generalized common neighbour polynomial of graphs	MES Mambad College	MESMAC- International conference	Online mode, 20-31 January 2022.
3.	Common neighbour polynomial of some special trees	Ayya Nadar Janaki Ammal College, Tamil Nadu	International Conference on Analysis and Applied Mathematics 2022	Online mode, 26-28 April 2022.
4.	Roman domination matrix	Manipal Institute of Technology, Manipal	2 <sup>nd</sup> International Conference on Computational Sciences-Modelling, Computing and Soft Computing	Online mode, 28-30 March 2022.

**SEMINARS/CONFERENCES/WORKSHOPS ATTENDED**

SL.NO	NAME OF THE PROGRAMME	NAME OF THE ORGANISER & SPONSORING AGENCY	VENUE & DATE	LEVEL *
	Workshop on 'Prime Numbers and Related Areas'	Kerala School of Mathematics	Kerala School of Mathematics 6 <sup>th</sup> to 10 <sup>th</sup> May 2012	State level
2	National seminar on 'Higher Education policies-Prospects and Challenges'	AKGCT	8 <sup>th</sup> March 2013.	National level
3	National Seminar on "Applications of discrete and fuzzy mathematics"	Govt. arts and science college, Kozhikode	Govt. arts and science college, Kozhikode Kerala School of Mathematics	National level
4	Refresher course for college teachers in Kerala state	Kerala School of Mathematics	Kerala School of Mathematics 11 to 14 October 2013	State level
5	Refresher course for college teachers in Kerala state	Kerala School of Mathematics	Kerala School of Mathematics 22 to 25 November 2013	State level

6	National seminar on ‘The Changing Contours of Higher Education’	AKGCT	7 <sup>th</sup> March 2014	National level
7	Refresher course for college teachers in Kerala state	Kerala School of Mathematics	Kerala School of Mathematics 9 to 12 October 2014	State level
8	National Seminar on “Graph Theory and its Applications”	MPMM SN Trusts College, Shoranur	MPMM SN Trusts College, Shoranur 28-29 October 2015.	National level
9	National Workshop on “Topology”	Department of Mathematics, University of Calicut	Department of Mathematics, University of Calicut 21-22 March 2016	National level
10	National seminar on ‘Ensuring Quality Assurance in Higher Education’	Internal Quality Assurance Cell of TMG College, Tirur	TMG College, Tirur 24 <sup>th</sup> January 2017	National level
11	National Seminar on “Topology and its Applications”	Department of Mathematics, University of Calicut	Department of Mathematics, University of Calicut 23-25 March 2017	National level
12	National Workshop on ‘Learning Management System-Moodle’	SARBTM Govt. College, Koyilandi	SARBTM Govt. College, Koyilandi 2-3 February 2017	National level
13	International seminar on ‘Educational and psychological perspectives of learning disorders’.	Council for Research and Management of Learning Disorders in collaboration with DLLE, University of Calicut	University of Calicut 17 <sup>th</sup> and 18 <sup>th</sup> November 2017	International level
14	National Seminar on “Recent trends in Latex”	Department of Mathematics, Government College, Mokeri	Government College, Mokeri 23-24 November 2017.	National level
15	Workshop on ‘Mathematical and Statistical Computations using R and Python’	Govt. Arts and Science College, Kozhikode	Govt. Arts and Science College, Kozhikode 8 <sup>th</sup> December 2017	State level
16	International Conference on ‘Recent Trends in Graph Theory and Combinatorics’	Cochin University of Science and Technology	Cochin University of Science and Technology 26-29 April 2017.	International level
17	International Conference on ‘Discrete Mathematics and Its	Birla Institute of Technology and Science (BITS) Pilani, Goa	BITS Pilani, Goa 7-10 July 2018	International level

	Application to Network Science'			
18	National Seminar on "Recent trends in Mathematical Analysis"	Department of Mathematics, University of Calicut	University of Calicut 11-12 October 2018.	National level
19	National Seminar on 'Recent developments in Graph Theory and its Applications'	Govt. Arts and Science College, Kondotty,	Govt. Arts and Science College, Kondotty, 22-23 October 2018.	National level
20	National Seminar on 'Topology and its applications'	Department of Mathematics, Government College, Mokeri	Government College, Mokeri 1-2 November 2018.	National level
21	National workshop on 'Digital Typography using Latex'	Sree Neelakanta Govt. Sanskrit College, Pattambi	Sree Neelakanta Govt. Sanskrit College, Pattambi 12-13 November 2018	National level
22	National Seminar on 'Recent Trends in Topology'	Department of Mathematics, University of Calicut	Department of Mathematics, University of Calicut during 7-9 February 2019.	National level
23	Workshop on 'Revised accreditation framework of NAAC and Quality systems in higher education'	IQAC, University of Calicut	University of Calicut on 6 <sup>th</sup> March 2019.	State level
24	National Seminar on 'Topology and Analysis'	Department of Mathematics, University of Calicut	University of Calicut 8-9 May 2019.	National level
25	National Workshop on 'The Language of Science Research: An introduction to techniques and tools'	Sree Neelakanta Sanskrit College, Pattambi	Sree Neelakanta Sanskrit College, Pattambi 20-21 November 2019.	National level
26	National Seminar cum workshop on 'Statistical methodology in Social science research'	Dept. of Commerce, T. M. Govt. College, Tirur	T. M. Govt. College, Tirur 9-13 December 2019.	National level
27	National Webinar on Mathematical Research: Ways and Means.	St. Stephen's College, Kottayam	St. Stephen's College, Kottayam 22.07.2020	National level
28	State level webinar on New Perspectives in Algebraic Graph Theory.	Newman College, Thodupuzha	Newman College, Thodupuzha 13.08.2020	State level

29	National webinar on Domination in Graphs and Its Applications	St. Peter's College, Kolenchery	St. Peter's College, Kolenchery 18.08.2020	National level
30	National webinar on Role of Fuzzy Algebra	Dwaraka Doss Goverdhan Vaishnav College, Chennai.	Dwaraka Doss Goverdhan Vaishnav College, Chennai. 27.08.2020	National level
31	National webinar on NAAC Revised Accreditation Framework: A Comprehensive Approach	IQAC, Kuriakose Elias College, Mannanam, Kottayam	Kuriakose Elias College, Mannanam, Kottayam 20.01.2021 21.01.2021	National level
32	Online International Workshop on Domination in Graphs	Indian Institute of Technology, Ropar and Academy of Discrete Mathematics and Applications	14.11.2021 15.11.2021 16.11.2021	International level
33	National seminar on 'A political approach to national education policy'.	Association of Kerala Govt. College Teachers	19.03.2022 20.03.2022	National level

**OTHER PROGRAMMES ATTENDED:** Teacher's Training Programme for College Teachers jointly organized by IISER Thiruvananthapuram and Collegiate Education Department, Govt. of Kerala during 15-17 July 2022 at IISER, Thiruvananthapuram.

**PARTICIPATION /DEPUTAED IN PROJECTS/EXTENDED ACTIVITIES INITIATED BY GOVERNMENT**

SL.NO	NAME OF THE PROGRAMME	NAME OF THE ORGANISER & SPONSORING AGENCY	PERIOD/DURATION
1.	DHANUS	Govt. of Kerala	2018-2020

**AWARDS/ACHIEVEMENTS/ POSITIONS/ OTHERS : Nil**

**OTHER RELEVANT INFORMATION IF ANY : Nil**