


NAME	BALJINDER KAUR			
DESIGNATION	Assistant Professor			
DEPARTMENT/SECTION/ SUBJECT	Yadavindra Department of Sciences/PUGKC, Talwandi Sabo/Physics			
OFFICIAL ADDRESS	Yadavindra Department of Sciences, PUGKC, Damdama Sahib (Talwandi Sabo)			
CONTACT NO. (s)	9646100419			
E-MAIL (S)	bk581974@gmail.com b.k1974@yahoo.co.in			
ACADEMIC QUALIFICATIONS				
DEGREE	DEGREE NAME	UNIVERSITY		
PH.D.	STUDY OF MULTIFERROIC PROPERTIES OF BISMUTH BASED METAL OXIDE NANOSTRUCTURED MATERIALS	I.K. Gujral Punjab Technical University, Jalandhar		
POSTGRADUATION	M.Sc. (Physics)	Guru Nanak Dev University, Amritsar		
GRADUATION	B.Sc. (Non Medical)	Guru Nanak Dev University, Amritsar		
ANY OTHER	UGC (CSIR) NET Cleared			
THRUST AREAS/RESEARCH INTERESTS	1. Material Science 2. Nanomaterials 3. Ferroelectric, Multiferroic Materials			
SUBJECTS TAUGHT	1. Applied Physics 2. Engineering Physics 3. Condensed Matter Physics 4. Statistical Physics and Thermodynamics 5. Optics and Laser Physics 6. Mechanics 7. Nuclear Physics			
TOTAL EXPERIENCE: XX	TEACHING EXPERIENCE: 24	INDUSTRY EXPERIENCE: NIL		
	RESEARCH EXPERIENCE: 11			
EMPLOYMENT HISTORY				
	Lecturer in Physics (Ad-hoc)	SGAD College, Khadoor Sahib, Amritsar	25/07/1997	31/03/1998
			17/07/1998	5/03/1999
			17/08/1999	29/02/2000
	Lecturer in Physics (Part Time)	Govt. Brijindra College, Faridkot	13/09/2000	13/09/2003
	Lecturer in Physics	Thapar Polytechnic, Patiala	15/09/2003	01/08/2005

	Assistant Professor	Yadavindra College of Engineering	01/08/2005	01/09/2021
	Assistant Professor	Yadavindra Department of Sciences	02/09/2021	Till date
MEMBERSHIP OF PUNJABI UNIVERSITY ACADEMIC BODIES	1. Member, Faculty of Sciences, Punjabi University Patiala.			
ADMINISTRATIVE/ACADEMIC DUTIES PERFORMED	1. Section In charge AS&H 2. Member, Time Table Committee 3. Member, Academic Council of Department 4. Convener, Discipline Committee 5. Student counsellor			

FACUTLY RESEARCH PROFILE

GOOGLE SCHOLAR ID	bk581974@gmail.com			
IMPACT FACTOR	1.5+1.5+0.563+0.78+0.78+0.697			
	CITATION INDEX	66	I10-INDEX	1
	H-INDEX	3	SJR	
	SNIP			
NO. OF CANDIDATES (COMPLETED PH.D.)	Nil	NO. OF CANDIDATES (PH.D. ONGOING)	Nil	
PG THESIS GUIDED	Nil	PG THESIS ONGOING		
RESEARCH PROJECTS	COMPLETED	Nil		
	ONGOING	Nil		
	SUBMITTED	Nil		
NO. OF PAPERS PUBLISHED	INTERNATIONAL JOURNALS	15		
	NATIONAL JOURNALS	nil		
	INTERNATIONAL CONFERENCES PROCEEDINGS	03		
	NATIONAL CONFERENCES PROCEEDINGS	03		
PAPER PRESENTATION IN CONFERENCE	INTERNATIONAL CONFERENCES	10		
	NATIONAL CONFERENCES	26		
NO. OF FOREIGN COUNTRIES VISITED FOR ACADEMIC PURPOSES	Nil			

NO. CONFERENCES ATTENDED	INTERNATIONAL	XX	
	NATIONAL	3	
NO. BOOKS PUBLISHED	AS SINGLE AUTHOR	Nil	
	AS JOINT AUTHOR	01	
NO. OF EDITED BOOKS	Nil	NO. OF BOOK CHAPTERS	XX
NO. OF INTERNATIONAL CONFERENCES/ WORKSHOPS/ SEMINARS/STCs/FDPs ORGANIZED	Nil		
MEMBERSHIPS OF PROFESSIONAL BODIES	INTERNATIONAL	1. Life membership of International Association of Engineers (IAENG) 115117, Sep 14, 20112.	
	NATIONAL	1. Life membership of Indian Association of Physics Teachers (IAPT) 8154 L4736, March 29, 2008 2. Life membership of Indian Physics Association (IPA) Gen/LM/12784, Sep 6, 2011 3. Materials Research Society of India (MRSI) LMB 228, Feb 20, 2014 4. Life membership of The Indian Science Congress Association L 30536, Sep 6, 2016	

PUBLICATION IN SCI AND SCUPUS INDEX JOURNALS

S. No.	Title with page no.	Journal	ISSN/ISBN No.	Whether peer reviewed. /Indexed (Impact factor, if any)
1	Evaluation of Structural and Ferroelectric Properties in Spray Deposited $(\text{NH}_4)_{0.39}\text{K}_{0.61}\text{NO}_3$: PVA Composite Films (pp 454-460)	Mater. Focus, Vol. 2, Dec 2013	ISSN: 2169-429X (Print) EISSN: 2169-4303 (online)	International peer reviewed

2	Ferroelectricity in Memory Devices	International Journal of Engineering Sciences; Issue Dec 2014 Volume 13 (p 111)	ISSN: 2229-6913 (Print) ISSN: 2320-0332 (online) http://ijoes.vidyapublications.com/paper/Vol13/23-Vol13.pdf	An open access, biannual, peer reviewed, indexed referred journal Sr. No. 63019 in the UGC's approved Journal List(till may 2018)
3	Composites of 'Ferroelectric Ceramics' and Polymers- a Potential Source of Non-Volatile Memory	International Journal of Engineering Sciences; Issue Dec 2014 Volume 13 (p 115)	ISSN: 2229-6913(Print) ISSN: 2320-0332(online)	An open access, biannual, peer reviewed, indexed referred journal Sr. No. 63019 in the UGC's approved Journal List(till may 2018)
4	Effect of Fuel to Oxidizer Ratio on Metal Oxide Nanomaterials Synthesized by Combustion Method	International Journal of Surface Engineering and Materials Technology Volume 5 No. 2 July-December 2015	ISSN 2249-7250	International
5	AC Impedance Spectroscopy Conductivity and Optical Studies of Sr doped Bismuth Ferrite Nanocomposites pp	Int. J. Electrochem. Sci., vol 11, Issue 5, 2016 4120-4135	ISSN: 1452-3981	International peer-reviewed (Impact Factor 1.5)
6	Structral Analysis of Enhanced Ferroelectricity in Nanocomposite Films of Sodium Nitrite in Polyvinyl Alcohol Matrix Fabricated at Moderate Elevated Temperature	Int. J. Electrochem. Sci., vol 11, Issue 5, 2016 pp 4037- 4049	ISSN: 1452-3981	International peer-reviewed (Impact Factor 1.5)
7	Study of A-site divalent doping on multiferroic properties of BFO nanoparticles processed	Advanced Materials Letters, Volume 7(12), 2016, pp: 1015-1020.	ISSN: 0976-3961	(a) Peer-Reviewed Indexed in Scopus and Research Gate RG Journal

	via combustion method			Impact: 1.46 (b) Sr. No. 1176 in the UGC's approved Journal List
8	Tailoring Combustion Method Synthesized Bismuth Ferrite Nanomaterials by varying Fuel and Fuel to Oxidizer Ratio	International Journal of Theoretical & Applied Sciences, Volume 9 (2) Pp 309-313 October 2017	ISSN No. (Print): 0975-1718; (Online): 2249-3247	Peer-Reviewed It was at Sr. No. 63302 in the UGC's approved Journal List and in 4305 journals' list that was removed in May/June 2018, It is at S.No.1399
9	Predictive Role of 0°, 90°, 180° and non-180° Aligned Domains in Backswitching and Switching Kinematics of Ferroelectrics	International Journal of Theoretical & Applied Sciences, Volume10 (1) pp281-284 April 2018	ISSN No. (Print): 0975-1718; (Online): 2249-3247	Peer-Reviewed It was at Sr. No. 63302 in the UGC's approved Journal List and in 4305 journals' list that was removed in May/June 2018, It is at S.No.1399
10	Switching related activation field for polarization-reversal and for polarization-saturation in NaNO ₂ -PVA thin composite films	Journal Ferroelectrics Letters Section Volume 45 Issue 4-6 Pages 84-93 2018/11/2 Publisher Taylor & Francis	ISSN: 0731-5171 (Print) 1563-5228 (Online)	International peer-reviewed Impact Factor 0.78 (2018)
11	Revisiting KAI theory and its application to mixed composite system "-PVA" fabricated at moderate elevated temperature	Journal Ferroelectrics Volume 540 Issue 1 Pages 88-102 Publication date 2019/2/17 Publisher Taylor & Francis	ISSN: 0015-0193	International peer-reviewed Impact Factor 0.697 (2018)
12	A comparative investigation of structural and optical properties of annealing modified mullite	Ferroelectrics Letters Section 46 (1-3), 52-63 28.06.19 (2019) Publisher Taylor &	ISSN: 0731-5171 (Print) 1563-5228 • 0.960	International peer-reviewed Impact Factor 0.78 (2018)

	bismuth ferrite	Francis	(2020) Impact Factor • 0.722 (2020) 5 year IF • 1.3 (2020) Cite Score (Scopus) • 0.499 (2020) SNIP • 0.231 (2020) SJR	
13	Switching related activation field for polarization-reversal and for polarization-saturation in PVA based NaNO ₂ -CsNO ₃ mixed system composite films fabricated at moderate elevated temperature	2019/12/27 Ferroelectrics Letters Section 46 (4-6), 73-81 Taylor & Francis (IF 0.563 2018) 3.12.2019	ISSN: 0731-5171 (Print) 1563-5228	(IF 0.563 2018)
14	Investigation of switching dynamics by fitting FGM and NLS models to PVA based NaNO ₂ -CsNO ₃ composite transients	Journal Materials Today: Proceedings Volume 46 Pages 8333-8339 Publication date 2021/1/1 Publisher Elsevier	ISSN: 2214-7853	Indexed in: Scopus, Conference Proceedings Citation Index, INSPEC
15	Fitting IGM, FGM and NLS switching models to NaNO ₂ -PVA composite transients for its microscopic parameter estimation	Journal Materials Today: Proceedings Volume 46 Pages 8340-8346 Publication date 2021/1/1 Publisher Elsevier	ISSN: 2214-7853	Indexed in: Scopus, Conference Proceedings Citation Index, INSPEC

BOOKS PUBLISHED:

S.NO.	AUTHOR (S)	TITLE	PUBLISHER	ISBN
1	Dr S C Varma Baljinder Kaur	Polytechnic Applied Physics - I	Ajay Publications July 2005	-

ORIENTATION / REFRESHER COURSES

Name of course	Duration	Name of institute
General Orientation Course	12-06-07 to 09-07-07	Academic Staff College, Guru Nanak Dev University Amritsar
Refresher Course in Physics	07-09-10 to 27-09-10.	Department of Physics, Punjab University, Chandigarh
Refresher Course in Physical Sciences	20-06-16 to 09-07-16	HDRC, Punjabi University, Patiala

PAPERS PUBLISHED IN CONFERENCE PROCEEDINGS

1. Understanding Various Techniques and Instruments Involved for Surface Analysis- A Review” at National Conference on “Latest Advancements in Science, Engineering & Research-2011” organized by Baba Farid College of Engineering and Technology, Bathinda 26-27 May, 2011. ISBN 978-93-81361-06-1 (pp. 27-35)
2. Ferroelectric Phenomenon in Oxides-A Review at National Conference on “Global Upcomings in Environment, Science & Technology – GUEST 12” organized by PTU GZS Campus, Bathinda 13-14 April, 2012. ISBN 978-93-81583-40-1 (pp. 208-215)
3. A Model Multiferroic- BiFeO_3 at National Conference on “Recent Advancements & Innovations in Science And Engineering, RAISE-2012” organized by Guru Ram Dass Institute of Engineering & Technology, Bathinda 6-7 Jan, 2012. ISBN 978-93 81583-16-6 (pp. 215-218)
4. Revival of Ethical Values and Humanism in Higher Education-A Challenge in 8th International Conference on Challenges in Higher Education organized by Desh Bhagat University, Mandi Gobindgarh, Punjab on 26-27 Sep, 2014. ISBN 978-93-83223-02-2 (pp. 244-249)
5. Maximizing Gross Enrolment Ratio and Excellence in Higher Education” in 8th International Conference on Challenges in Higher Education organized by Desh Bhagat University, Mandi Gobindgarh, Punjab on 26-27 Sep, 2014. ISBN 978-93-83223-02-2(pp 226-230)
6. Effect of Different Fuels on Combustion Method Synthesized Bismuth Ferrite at International Conference on Latest Developments in Material, Manufacturing & Quality Control organized by Department of Mechanical Engineering Giani Zail Singh College of Engineering & Technology, Bathinda 12– 13 February, 2016 (MMQC-2016). ISBN No: 978-93-5212-858-7 (pp. 633-637)

Expert Lectures/Invited Talks etc

1. Expert Lecture on the topic “Basics of X-Ray Diffraction” at Department of Applied Sciences, Baba Farid College of Engineering and Technology, Bathinda 11 Oct, 2011.
2. Invited talk on “Latest Trends in Thin Films” at PTU Sponsored National Conference on “Recent Advancements & Innovations in Science & Engineering-2012” Bathinda (6-7 Jan, 2012) organized by GRDIET, Lehra Bega, Bathinda.
3. Expert Lecture on the topic “Nanotechnology” at Department of Civil Engineering Baba Farid College of Engineering and Technology, Bathinda 15 March, 2013.
4. Invited talk on “Decline of moral values in youth” at M S K Girls College, Talwandi Sabo (Bathinda) 21Dec 2013.
5. Expert Lecture on the topic “Inculcating Science Temperament among the Students” at Government Senior Secondary School Wander (Moga) on 25.10.2016 for career counseling.
6. Expert Lecture on the topic “Fiber Optics” at Department of Civil Engineering, Baba Farid College of Engineering and Technology, Bathinda on 8.11.2016.
7. Expert Lecture on the topic “Science with Wisdom-A Boon for Humanism” at Webinar conducted by Fateh Group of Institutions, Rampura Phul, Bathinda on 15.02.2022.

SHORT TERM COURSE/FACULTY DEVELOPMENT PROGRAM

1. Short Term course “Computer Applications in Physics” conducted by Applied Science Deptt on 2-8 Aug, 2004 at NITTTR Chandigarh.
2. Short Term course “Laser Technology” conducted by Applied Science Deptt on 6-10 June, 2005 at NITTTR Chandigarh.
3. Short Term Course on “Advances in OFC Technology” being organized by the Department of Applied Science of NITTTR at Malout Institute of Management and Information Technology, Malout (Punjab) on 7-11 July 2014.
4. Short Term Course on “Water Harvesting, Water Recycling and Water Resource Management” being organized by the Department of Civil Engineering at GZCCET, Bathinda (Punjab) on 20-24 July 2015
5. Short Term Course on “MATLAB, A tool in Research” being organized by the Department of Mathematics at Malaviya National Institute of Technology Jaipur on 24-28 Dec, 2015
6. ICT based Short Term Course on “ Short Term Programme on the topic ‘Green and Energy Efficient Buildings’ being organized by the Department of Civil Engineering at GZCCET, Bathinda (Punjab) on 29 Feb - 4 March, 2016
7. Short Term Course on “ Engineering Today- 2016” being organized at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on November 21-25, 2016.
8. Short Term Course on “ Engineering Today- 2018” being organized at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on May 7-11, 2018

9. Short Term Course on “Research Methodology” being organized at HRDC, Punjabi University Patiala on 24-29 sep, 2018.
10. Short Term Course on “ Engineering Today- 2019” being organized at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on Jan 7-11, 2019.
11. Short Term Course on “ Engineering Today- 2020” being organized at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on Feb 24-28, 2020.
12. Short Term course ‘Nanomaterials: Characterization and Applications’ conducted by Applied Science Deptt on 18-22 Nov, 2013 at NITTTR Chandigarh
13. Online AICTE Recognized Faculty Development Programme on Nanomaterials and Devices from 27-04-20 to 01-05-20 (One Week) Organized by Applied Science Department NITTTR, Chandigarh.
14. One week online Short Term Course on “Advanced Functional Materials (AFMAT-2020)” organized by Department of Physics, Sant Longowal Institute of Engineering and Technology, Longowal held during Sept. 28 - Oct. 02, 2020.

WORKSHOPS/ SEMINARS ATTENDED

1. One day Patent Awareness Workshop held at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on Dec 11, 2009.
2. Three day Workshop on “Learning LaTeX for Document Writing” organized by Baba Farid College of Engineering and Technology, Bathinda on 22-24 Dec, 2010.
3. Three day Workshop on “Dynamic of Employee Motivation & Strategic Role of Leadership in Academic Institutions” organized by Baba Farid College of Engineering and Technology, Bathinda on 15-17 Dec, 2010.
4. One week Workshop on “Learning The Learner” held at Guru Kashi College, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on 9-14 July, 2012.
5. One week National workshop on ‘Nanoscience and Technology’ NST- 2013, held at NIT Hamirpur, June 3-7, 2013.
6. Two days Workshop on ‘Advanced Workshop on Dielectric Impedance Spectroscopy’ at University Science Instrumentation Centre, University of Delhi on 17-18 Jan, 2014
7. Two days National Workshop on Ion Beam Induced Growth and Engineering of Materials, March 11-12, 2014 held at Department of Physics Kurukshetra University, Kurukshetra.
8. Seminar on, “Promotion and Popularization of Science” held at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on Sep 18, 2014.
9. Three day Workshop on “Innovations in Science (IIS-2014)” held at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda 12-14 Nov, 2014
10. Two day Workshop on, “Innovations in Science (IIS-2015)” held at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on Oct 7-8, 2015.

11. One day “Acquaintance Program of Inter University Accelerator Centre, New Delhi” organized at Central University of Punjab, Bathinda on 4th April, 2016.
12. One day Workshop on, “Copyright, Plagiarism and Research Productivity” organized by Central Library IKGPTU, Kapurthala on Aug 30, 2016.
13. Two day Workshop on, “Innovations in Science (IIS-2016)” held at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on September 15-16,2016.
14. One day Workshop on Intellectual Property Rights held at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on Nov 18, 2016.
15. Two day Workshop on, “Innovations in Science (IIS-2017)” held at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on Nov 6-7,2017
16. Two day Workshop on, “Innovations in Science (IIS-2018)” held at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on Oct 16-17,2018
17. One day workshop on robotics held at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on Feb 7, 2018.
18. One day workshop on 3D Printing of Smart Materials held at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on Feb 7, 2019.
19. Workshop on, “Innovations in Science (IIS-2019)” held at YCoE, Punjabi University Guru Kashi Campus, Talwandi Sabo, Bathinda on Nov 14-15,2019.
20. Five day National workshop on ‘Guru Teg Bahadur Bani; Tikakari and Koshkari, held at Guru gobind Singh department of religious studies, Guru Gobind Singh chair Punjabi University Patiala on July 1-5,2020.(online)
21. One day National Weninar on ‘Punjabi Bhasha; on Vartmaan Sthiti Te Rozgar De Mocke’ organized by Swami Swatantranand Memorial College, Dinnanagar, on Nov 9, 2020.
22. One Day Webinar on “Online Teaching and Effective Learning: Bridging the Gap’ organized by Society of Materials & Mechanical Engineers held on May 25, 2020.
23. One Day National Webinar on “COVID-19: Lessons for Educators” organized by Punjab Commerce and Management Association, held on May 25, 2020.
24. Two-day workshop on “Advanced Functional Materials” sponsored by TEQIP-III and organized by Department of Applied Sciences, Punjab Engineering College (Deemed to be University), Chandigarh held on July 25-26, 2020.
25. One Day International Webinar on “Post COVID-19 Education Scenario” organized by Baba Farid College of Engineering and Technology, Bathinda on June 26, 2020.
26. One Day Webinar on TEACHING AND LEARNING MODES POST COVID – 19, organized by Department of Electronics and Communication Engineering Punjabi University, Patiala, Punjab, India held on April 29, 2020.

27. One Day International Webinar on “21st Century: WOMANagers Challenges and Strategies” organized by Women Development Cell Baba Farid College of Engineering and Technology, Bathinda on June 30, 2020.