Dr. K. ANITHA, M.Sc, M.Phil, Ph.D.,

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EDUCATIONAL QUALIFICATION:

S. No	Degree	Year	Specialization	Name of the School /College	Board /University
1.	Ph.D Physics	2017	Physics	A.A Government Arts College, Musiri	Bharathidasan University
2.	M.Phil Physics	2008	Physics	St.Joseph's college, Trichy	Affiliated to Bharathidasan University
3.	M.Sc Physics	2007	Physics	Seethalakshmi Ramaswami College,Trichy -2	Affiliated to Bharathidasan University
4.	B.Sc Physics	2005	Physics	Seethalakshmi Ramaswami College,Trichy -2	Affiliated to Bharathidasan University
5.	HSC	2002	Maths and Science	The Girls' Higher Secondary School, Lalgudi.	State board
6.	SSLC	2000	Maths and Science	The Girls' Higher Secondary School, Lalgudi.	State board

TEACHING EXPERIENCE:

S.No	Designation	Name of the Institution	Period	Years of Experience
1	PG Physics Assistant	SRV Matric High.Sec School, Samayapuram.	2-06-2008 to 17-08-2009	1 Year 2 month 15 days
2	Guest Lecturer	Govt. Arts and Science College (W), (Formerly Bharathidasan University Constituent College For Women), Orathanadu.	18-08-2009 to 07-09-2010	11 months 12 days
3	Guest Lecturer	Govt. Arts and Science College, (Formerly Bharathidasan University Constituent College), Lalgudi.	07-09-2010 to 14-09-2014	4 years 7 days
4	Guest Lecturer	Govt. Arts and Science College (W), (Formerly Bharathidasan University Constituent College For Women, Veppur.	15-09-2014 to 17-10-2014	One month 2 days

5	Guest Lecturer	Govt. Arts and Science College, (Formerly Bharathidasan University Constituent College), Lalgudi.	18-10-2014 to till now	Till now

Total years of experience: 15 years

RESEARCH EXPERIENCE:

(i) List of publications:

1. M. Premalatha, **K. Anitha**, B. Revathi, V. Balachandran, B. Narayana, A. Jayashree, N. Thirughanasambantham, Delving into 5-Amino-3-(4-chlorophenyl)-1-isonicotinoyl-2,3-dihydro-1H-pyrazole-4-carbonitrile ligand: Synthesis, spectroscopic (FT-IR, FT-Raman, NMR, UV- Vis), reactivity (ELF, LOL and Fukui), NCI, molecular docking and in silico ADMET studies by experimental and DFT methods, Journal of Molecular Structure(Elsevier), 1316 (2024) 138772. Impact Factor: 3.84; Indexed by: Scopus

2. **K. Anitha**, V. Balachandran, B. Narayana & B. Raja, Molecular orbital analysis, vibrational spectroscopic investigation, static and dynamic NLO responses of Ethyl 6-nitro-1H-indole-3- carboxylate, **Materials Research Innovations(Taylor&Francis)**http://dx.doi.org/10.1080/14328917.2017.1323989. **Impact Factor : 1.46; Indexed by: Scopus; Cited by 7**

3. B. Revathi, V. Balachandran, B. Raja & **K.Anitha**, Vibrational (FT-IR and FT-Raman) spectra and quantum chemical studies on the molecular structure of p-hydroxy-N-(p-methoxy benzylidene) aniline, **Indian Journal of Pure & Applied Physics**, Vol. 55, January 2017, pp. 43-59. **Impact Factor : 0.923; Indexed by: Scopus; Cited by 3**

4. B. Revathi , V. Balachandran , B. Raja, **K. Anitha** , M. Kavimani, Potentially useful to NLO materials: 4-Chloro-3-(trifluoromethyl) aniline, 4-bromo-3-trifluoromethyl)aniline and 4-fluoro-3-(trifluoromethyl)aniline are combined experimental and theoretical vibrational analysis, **Journal of Molecular Structure(Elsevier)**, 1141 (2017) 81-92. **Impact Factor: 3.196; Indexed by: Scopus; cited by 11.**

5. **K. Anitha**, V. Balachandran, Assessment of long-range corrected and conventional DFT functionalfor the prediction of second – Order NLO properties and other molecular properties of N-(2-cyanoethyl)-N-butylaniline – A vibrational spectroscopy study, **Spectrochimica Acta Part A: Molecular and Biomolecular Spectroscopy (Elsevier)**, 146 (2015) 66–79. **Impact Factor : 4.098; Indexed by: Scopus; Cited by 7.**

6. **K. Anitha**, V.Balachandran and B.Narayanan, Experimental and Theoretical (FT-IR, FT-Raman) Vibrational Spectroscopic Analysis and Second- and Third-Order NLO Properties of a (2E)-1-(4-bromophenyl)-3-(2-chlorophenyl) prop-2-en-1-one **, International Journal of Current Research and Academic Review** ISSN: 2347-3215 Vol. 3, No. 9 (September-2015) 70-89. NAAS Score: *2.78 (2018); **Indexed by: Cross ref**

7. V.Balachandran, **K. Anitha** & M. Karunanidhi, Polarizability, hyperpolarizability, optical gap and hardness of halogenated aniline derivatives – A comparative study using conventional and long-range corrected hybrid functional, **Asian Journal of Physics**, Vol 22, No 3(2013) 71-76. Cited by

8. B. Raja, V. Balachandran, B. Revathi & **K. Anitha**, Molecular structure, vibrational spectroscopic, natural bond orbital analysis, frontier molecular orbital analysis and thermodynamic properties of N-tert-butoxy carbonyl-L-phenylalanine by DFT methods, **Materials Research Innovations(Taylor&Francis),** https://doi.org/10.1080/14328917.2018.1477544, **Impact Factor : 1.46; Indexed by: Scopus; Cited by 3.**

9. V.Balachandran, **K. Anitha**, B.Narayanan, M. Karunanidhi & B. Revathi, Spectroscopic investigation, molecular orbital studies, frequency and solvent dependent NLO properties of (2E)-1-(4-bromophenyl)-3-phenylprop-2-en-1-one, **Materials Research Innovations(Taylor&Francis),** Vol 23, (2019) 385 - 396. https://doi.org/10.1080/14328917.2018.1495877, **Impact Factor: 1.46; Indexed by: Scopus; Cited by 2.**

10. V.Balachandran, **K. Anitha**, B.Narayanan, Molecular orbital studies, frequency and solvent dependent NLO properties of (2E)-1-(4-bromophenyl)-3-(4-nitrophenyl) prop-2-en-1-one, **Indian Journal of Pure & Applied Physics**, Vol 56, No 2(2018) 91-107, **Impact Factor: 0.923; Indexed by: Scopus; Cited by 1.**

11. B. Revathi, V. Balachandran, B. Raja & **K.Anitha**, Structural study, NCA, FTIR, FT-Raman spectral investigations, NBO analysis and thermodynamic functions of N-benzyloxy carbonyl-L-alanine, **Indian Journal of Pure & Applied Physics**, Vol 56, No 7(2018) 509-521, **Impact Factor : 0.923; Indexed by: Scopus; Cited by 1.**

(ii) List of programs presented/participated:

S.No	Name of the Programme	Title of the Programme	Dates of the Programme	Organized by
1.	National Seminar	Current Trends in Material Science and Nanostructure Materials	23 rd - 24th Jan 2013	Department of Physics and Chemistry, Cauvery College For Women, Trichy-620 018.
2.	Training Program	Trainers of Training Programme(TOT), an Ecology District Level Conference	11th Feb 2013	Department of school of education, Trichy.
3.	National conference (UGC & SERB SPONSORED)	Perspectives in Material Science	6th- 7th Aug 2013	PG department of Physics, Govt.Arts College for Women (Autonomous), Pudukkottai-622 001
4.	National workshop	Computer Aided Drug Design	21st -23rd Aug 2013	PG & Research Department of Biotech &Bioinformatics, Holy Cross College, Trichy-620 002
5.	National symposium cum workshop	Recent Trends in Structural BioInformatics and Computer Aided Drug Design	21st Feb 2014	Alagappa University, Karaikudi.

6.	International conference (TEQIIP SPONSORED)	Chemistry and Materials	14th – 15th Nov 2014	Department of chemistry, Bharathidasan Institute of Technology (BIT), Anna University, Trichy
7.	National workshop	Right to Education with special reference to Education of Persons with Disabilities	10th Mar 2015	Centre for Differently Abled Persons, Bharathidasan University, Trichy
8.	National seminar (UGC SPONSORED)	Recent advancements in materials	15th Feb 2017	PG & Research Department of Physics, Jamal Mohammad college (Autonomous), Trichy.
9.	Tamil Nadu State Council for Higher Education (TANSCHE)-FDP	Design, Develop and Deliver online courses through MOODLE platform	29 & 30 May 2020	Tamil Nadu State Council for Higher Education (TANSCHE), Chennai.
10.	Webinar	Thermodynamics: a Conservative partner of our life & Z-Scan measurements for non-linear optical materials	16th June 2020	PG & Research Department of Physics, Adhiyaman Arts & Science college for Women, Krishnagiri.
11.	National level Webinar	Research Methodology	12th & 13th June 2020	Loyola College (Autonomous), Chennai.
12.	National Level online FDP	Advancements in Material Science	5th & 6Th June 2020	Jeppiaar Institute of Technology, Sriperumbudur.
13.	One day Training Cum Orientation Programme in association with TANSCHE	One day Training Cum Orientation Programme in association with TANSCHE	30th Sep 2020	Department of English and Foreign Languages and Department of Linguistics, Bharathiar University, Coimbatore.
14.	National Level online FDP	Digital Skills for Smart Teaching	22nd & 23rd June 2020	Raja Doraisingam Government Arts College, Sivaganga.
15.	National Virtual Conference	Novel Materials, Characterisation and Applications	9th & 10th June 2020	Department of Physics, Auxillium College (Autonomous), Vellore.
16.	Certificate Course	Digital Teaching Techniques	31st to 04th Sep 2021	ICT Academy
17.	Virtual Workshop	Density Functional Theory and its Applications	8th to 12th Sep 2021	Department of Physics, Assam University (A Central University), Sichar.
18.	Two Days FDP	Recent Developments in Material Science	23rd & 24th Sep 2021	Srimad Andavan Arts and Science College (Autonomous), Trichy