

**Name of the faculty: Prof. Dr. T. B. Pawar**



<b>Designation</b>	Professor
<b>Name of the department</b>	Chemistry
<b>E-mail</b>	<a href="mailto:Tbpawar03@gmail.com">Tbpawar03@gmail.com</a>
<b>Qualification</b>	<b>Ph.D.</b> [ Department of Chemistry M.S.G. College Malegaon, (affiliated to University of Pune), 2003] <b>M.Sc.</b> Organic Chemistry, [ Department of Chemistry S.S.V.P.S. College Dhule, (affiliated to University of Pune), 1990] <b>B.Sc.</b> [Arts, Science and commerce college Satana, Nashik, (affiliated to University of Pune), 1988]
<b>Teaching Experience: 30 Year</b>	
<b>Awards / Recognitions</b> <b>1. Recognized as a Brand Ambassador of Bentham Science</b>	
<b>Research Guidance for M.Phil./Ph.D./Project</b> 1. Guiding 06 students for the Ph.D. degree as a guide 1. Guided many students for M.Sc. Project work	
<b>Research project</b> • Two minor research projects completed.	
<b>Reviewer of Journals</b> 1. Material Science Research India	
<b>Patent / Copyright</b> 1. One Indian patent entitled SYNTHESIS OF NOVEL COMPOUND (E)-4-(2-(2-(1,2,6,7-TETRAHYDRO-8H-INDENO[5,4-b]FURAN-8-YLIDENE)HYDRAZINEYL)THIAZOL-4-YL)BENZONITRILE	
<b>Research Interests</b> 1. Synthesis of Heterocyclic compounds 2. Synthesis of BiologicaActive Compounds 3. Density functional studies (DFT) 4. Thermodynamic study of electrolyte and non-electrolyte solutions 5. Material Sciences	
<b>Research paper published/presented</b> 1. Synthesis, molecular structure, electronic, spectroscopic, NLO and antimicrobial study of N-benzyl-2-(5-aryl-1,3,4-oxadiazol-2-yl)aniline derivatives. 2. Exploration of catalytic performance of nano-La <sub>2</sub> O <sub>3</sub> as an efficient catalyst for dihydropyrimidinone/thione 3. Microwave prompted solvent-free synthesis of new series of heterocyclic tagged 7-arylidene indanone hybrids and their computational, antifungal, antioxidant, and cytotoxicity study (2021)	

4. Synthesis, Computational, Antibacterial and Antifungal Investigation of Two Tri-Fluorinated Chalcones of 1-(2,3- Dihydrobenzo[b][1,4]dioxin-6- yl)ethan-1-one (2021)
5. Design, fabrication, antitubercular, antibacterial, antifungal and antioxidant study of silver doped ZnO and CuO nano candidates: A comparative pharmacological study
6. DFT computational insights into structural, electronic and spectroscopic parameters of 2-(2- Hydrazineyl)thiazole derivatives: a concise theoretical and experimental approach
7. Efficient Synthesis, Antibacterial, Antifungal, Antioxidant and Cytotoxicity Study of 2-(2- Hydrazineyl)thiazole Derivatives
8. DFT computational insights into structural, electronic and spectroscopic parameters of 2-(2- Hydrazineyl)thiazole derivatives: a concise theoretical and experimental approach
9. Solvent-free grindstone synthesis of four new (E)-7-(arylidene)-indanones and their structural, spectroscopic and quantum chemical study: a comprehensive theoretical and experimental exploration
10. Experimental and theoretical exploration on single crystal, structural, and quantum chemical parameters: A comparative study
11. Aqua-mediated rapid and benign synthesis of 1,2,6,7-tetrahydro-8H- indeno[5,4-b]furan-8-one-appended novel 2-arylidene indanones of pharmacological interest at ambient temperature
12. Superfast synthesis, antibacterial and antifungal studies of halo-aryl and heterocyclic tagged 2, 3-dihydro-1 H- inden-1-one candidates
13. Ultrasound Promoted Stereoselective Synthesis of 2,3-Dihydrobenzofuran Appended Chalcones at Ambient Temperature
14. Transition metals Fe<sup>3+</sup>, Ni<sup>2+</sup> modified titanium dioxide (TiO<sub>2</sub>) film sensors fabricated by CPT method to sense some toxic environmental pollutant gases
15. Spectroscopic (FTIR and UV), quantum Chemical, antifungal and antioxidant investigations of (E)-7-(4- (trifluoromethyl)benzylidene)- 1,2,6,7-tetrahydro-8H-indeno[5,4- b]furan-8-one: A combined experimental and theoretical study
16. Molecular structure, frontier molecular orbital and spectroscopic examination on dihydropyrimidinones: a comparative computational approach
17. Investigation of Structural and Spectroscopic Parameters of Ethyl 4- (4-isopropylphenyl)-6-methyl-2-oxo- 1,2,3,4-tetrahydropyrimidine-5- carboxylate: a DFT Study
18. Synthesis, Molecular Structure, HOMOLUMO and Spectroscopic Investigation of (E)-1-(2,4- Dichloro-5-fluorophenyl)-3-(2,6-dichlorophenyl)prop-2-en-1-one: A DFT Based Computational Exploration
19. Transition Metals Ni<sup>2+</sup>, Fe<sup>3+</sup> Incorporated Modified ZnO Thick Film Sensors to Monitor the Environmental and Industrial Pollutant Gases
20. Poly (ethylene glycol)(PEG-400): A green approach towards synthesis of novel pyrazolo [3, 4-d] pyrimidin-6- amines derivatives and their antimicrobial screening
21. Efficient Synthesis, spectroscopic and quantum chemical study of 2, 3- dihydrobenzofuran labelled two novel arylidene indanones: A comparative theoretical exploration
22. Molecular structure, electronic, chemical and spectroscopic (UV- visible and IR) studies of 5-(4- chlorophenyl)-3-(3,4-dimethoxyphenyl)-1-phenyl-4, 5- dihydro-1H-pyrazole: combined DFT and experimental exploration
23. Molecular structure, frontier molecular orbitals, MESP and UV– visible spectroscopy studies of Ethyl 4-(3, 4-dimethoxyphenyl)-6-methyl-2-oxo-1, 2, 3, 4-tetrahydropyrimidine- 5- carboxylate: A theoretical and experimental appraisal
24. Experimental and Theoretical Studies on the Molecular Structure, FT-IR, NMR, HOMO, LUMO, MESP, and Reactivity Descriptors of (E)-1-(2, 3- Dihydrobenzo [b][1, 4] dioxin-6-yl)-3- (3, 4, 5-trimethoxyphenyl) prop-2-en- 1-one

25. Synthesis, Characterization and DFT Studies of 2-[(2-substitutedphenyl) carbamoyl] benzoic acids
26. Density and Viscosity of LiCl, LiBr, Lil and KCL in Aqueous Methanol at 313.15K
27. Photocatalytic Applications of Doped Fe<sub>3</sub>O<sub>4</sub> Nanoparticles for Degradation of Methyl Orange and Methylene Blue Dyes: A Review
28. Synthesis, Molecular Structure, HOMO-LUMO, Spectroscopic (UV-Vis and IR), Thermochemical Study of 5-Acetyl-4-(4-chlorophenyl)-6-methyl- 3,4-dihydropyrimidin-2(1H)-one: A DFT Study, Asian Journal of Organic and Medicinal Chemistry.
29. Synthesis and characterization of ZnO/CuO nanocomposites as an effective photocatalyst and gas sensor for environmental remediation
30. Limiting ionic partial molar volumes of R<sub>4</sub>N<sup>+</sup> and Br<sup>-</sup> in aqueous ethanol at 298.15 K
31. Ultrasonic velocity and allied parameters of symmetrical tetraalkyl ammonium bromides in aqueous ethanol at 298.15 K

#### Books published / chapters in a book

1. Intermediates and Rearrangements in Organic Synthesis, Himalaya Publishing House, ISBN- 978-93-5262-001-2

#### International Visit

- Visited Mauritius and presented research Paper.

#### Conferences/Seminars/ Workshop organized / attended

1. Participated and Attended many International, National, State and Regional Level conferences, seminars and workshops.
2. Worked as convenor, coordinator, co-convenor and co-coordinator for workshops and conferences

#### Other

- Worked as
1. **Acting principal**,  
Arts, Science and commerce College Nampur Tal- satana Dist Nashik. (2010-2011)
  2. **Vice-Principal**,  
Arts, Science and commerce College Surgana, Tal- Surgana, Dist Nashik. (2013).
  3. **Principal**,  
Arts, Science and commerce College Surgana, Tal- Surgana, Dist Nashik.  
(17 October 2013 to 02 July 2015).
  4. **Coordinator**, To Celebrate the International Year of Chemistry -2011
  5. **Secretary**, PUCTO (Local Level).2009-2010,2010-2011.
  6. **Chairman**, PUCTO (Local Level). 2012-2013.
  7. **Member** of College Development Committee of L.V. H. Arts, Science and Commerce College Panchavati Nashik.
  8. **Camp on Adulteration awareness** (especially Edible oil) at Rural area  
(At Tehare, Tal Malegaon Dist Nashik) in September 2003.
  9. **Convener**: National conference on “Emerging Trends in Chemistry and Nano sciences” (ETCF)
  10. **Coordinator** : International conference on “Innovations in Teaching, Learning and Evaluation Higher Education” (ICITLE – 2019)
  - 11 Worked as a **Co-ordinator of International Conference** on “Current Research in Chemistry and Nano Sciences” (CRCNS-2022) During 18<sup>th</sup> to 20<sup>th</sup> January2022
  - 12 Worked as **Observer** at different centers of the Examinations JEE Main, JEE advance, NEET, Conducted by National Testing Agency.

- 13 Worked as **Observer** at different centers of the Examinations JEE Main, JEE advance, NEET, Conducted by National Testing Agency.
- 14 Worked as Officer on Special Duty (**OSD**) for “National Institute of Open Schooling” NIOS. Examinations.

**E-content developed**

1. **Youtube channel:**

[https://www.youtube.com/channel/UCUu\\_Ff-6YoEh5hk3BGcM9tg](https://www.youtube.com/channel/UCUu_Ff-6YoEh5hk3BGcM9tg)

**Social Media links**

<b>Research gate</b>	<a href="https://www.researchgate.net/profile/Thansing-Pawar">https://www.researchgate.net/profile/Thansing-Pawar</a>
<b>Google Scholar</b>	<a href="https://scholar.google.com/citations?user=98duliAAAAAJ&amp;hl=en">https://scholar.google.com/citations?user=98duliAAAAAJ&amp;hl=en</a>
<b>Orcid Id</b>	<a href="https://orcid.org/0000-0003-2032-3109">https://orcid.org/0000-0003-2032-3109</a>