

C. V. of Dr. Sandeep Ashok Sankpal



Personal information:

Name in Full: Dr. Sandeep Ashok Sankpal
Designation: Associate Professor
Date of Birth: November 26, 1982
Nationality: Indian
Sex: Male
Phone No. Mo. +91-9420933147
E-mail: sandeeporg1@gmail.com, sas_chem@unishivaji.ac.in
Languages: Marathi, English, Hindi

Academic Qualifications:

Examination Passed	Subject	Year of Passing	Grade obtained	Board /University awarding Degree
Ph. D.	Chemistry	2011	-	Shivaji University, Kolhapur
SET	Chemistry	2009	--	UGC New Delhi
M. Sc.	Organic Chemistry	2005	A	Shivaji University, Kolhapur

Research Experience:

Ph. D. Degree: Awarded on January 2011.
Title of the Thesis: "Synthesis of Biologically Active Nitrogen and Oxygen Containing Heterocycles".
Name of Guide: Dr. M. B. Deshmukh
Department of Chemistry,
Shivaji University, Kolhapur

Current research:

❖ Application of heterogeneous catalysts in organic synthesis

- ❖ Synthesis Bioactive heterocycles
- ❖ Development of greener synthetic methodologies.

Teaching Experience:

- ❖ Worked as Teaching Assistant at Department of Industrial Chemistry, Shivaji University, Kolhapur from 13rd Feb. 2008 to 30th 2008
- ❖ Worked as Assistant Professor in Department of Agrochemicals and Pest Management, Shivaji University, Kolhapur from 10th Nov 2008 to 30th April 2009.
- ❖ Worked as teacher in Department of Chemistry, Shivaji University, Kolhapur from 13th Nov. 2009 to 31st Mar. 2010
- ❖ Currently working as Associate Professor in Department of Chemistry, Shivaji University, Kolhapur.

Details of Ongoing Projects:

Sr. No	Title of the project	Duration		Budget allocated	Sponsored by
		From	To		
1.	Development of greener methodologies using magnetically separable catalyst for the synthesis of novel quinoline-triazole hybrid molecules and their anticancer evaluation	2023	2026	28,35,210/-	SERB, New Delhi

Details of Completed Projects:

Sr. No	Title of the project	Duration		Budget allocated	Sponsored by
		From	To		
1.	Synthesis of Biologically active Heterocycles through Greener Methodologies	2012	2014	6,00,000/-	UGC-BSR New Delhi
2.	Design and synthesis of functionalized magnetic nano particles for catalytic applications	2019	2021	220000/-	Shivaji University, Kolhapur

Research Students:

- ❖ Students registered for Ph. D : 04
- ❖ Students completed M. Phil : 00
- ❖ Students awarded Ph.D. : 04
- ❖ Student submitted Ph.D. thesis : 01

Members of Committees:

- ❖ Programme officer, NSS, Department of Chemistry, Shivaji University, Kolhapur.
- ❖ Acted as secretary, in national conference on “Recent Trends in Chemistry and Materials Sciences” organized on 9th Feb. 2019.
- ❖ Member of organizing committee of National conference on Innovative Research in Chemical Science-2017 organized by Department of Chemistry, Shivaji University, Kolhapur during 1st and 2nd Feb. 2017.
- ❖ Member of organizing committee of National conference on Recent Advances in Integrated Pest Management-2016 organized by Department of Agrochemicals and Pest Management, Shivaji University, Kolhapur during March 1st and 2nd 2016.
- ❖ Member of organizing committee of National conference on Frontiers in Chemical and Material Sciences -2015 organized by Department of Chemistry, Shivaji University, Kolhapur.
- ❖ Member of organizing committee of AVISHKAR-2015 organized by Department of Chemistry, Shivaji University, Kolhapur.
- ❖ Member of organizing committee of National Science Day-2015 organized by Department of Chemistry, Shivaji University, Kolhapur.
- ❖ Member of organizing committee of National Science Day-2014 organized by Department of Chemistry, Shivaji University, Kolhapur.
- ❖ Member of organizing committee of National conference on Current Trends in Chemical and Nano Sciences organized by Department of Chemistry, Shivaji University, Kolhapur during 17th & 18th Jan. 2014.
- ❖ Member of organizing committee of National conference on Current Research in Chemical Sciences organized by Department of Chemistry, Shivaji University, Kolhapur during 22nd & 23rd Jan. 2013.
- ❖ Member of organizing committee AVISHKAR 2013-14.
- ❖ Team Manager, 7th Maharashtra state university Research convention held during 7th to 9th January 2013 at Dr. Balasaheb Sawant Kisan Agriculture University, Dapoli.
- ❖ Member of organizing committee of national workshop on Recent Advances in Agrochemicals held on 28th Feb 2012.

List of publications:

53) Bhosale, L., Gurav, A., Patil, P., Birajdar, N., Dagade, D., Phulwale, S., Sankpal, S., Hangirgekar, S. Silica-coated nickel ferrite magnetic nanoparticle-supported DMAP catalyst for

the efficient synthesis of bioactive spirooxindole-4H-pyrans and their Histo-toxicity and DFT study (2026) Journal of Molecular Structure, 1357. DOI: 10.1016/j.molstruc.2025.145120

52) Swami, P., Kshirsagar, D., Rochlani, S., Birajdar, N., Bhosale, L., Deshmukh, S., **Sankpal, S.**, Hangirgekar, S. LTTM mediated environmentally benign synthesis of novel thiazole derivatives: Computational & biological investigations, (2026) Journal of Molecular Structure, 1356. DOI: 10.1016/j.molstruc.2025.145094

51) Patil, P., Chavan, A., Sankpal, U., Yadav, R., Salunke, G., Ingale, S., Hangirgekar, S., **Sankpal, S.** Photoluminescent spirobenzodiazepine-fused indenoquinoxalines synthesis by Ionogel-catalyzed multicomponent reaction (2026) Journal of Molecular Structure, 1354. DOI: 10.1016/j.molstruc.2025.144786

50) Salunke, G., Patil, P., Takale, P.S., Choudhari, P.B., Sankpal, U., Chavan, A., Yadav, R., Hangirgekar, S., **Sankpal, S.** [MerTEA][OH]: An efficient and reusable polymer supported catalyst for one-pot synthesis of spirooxindoles and their anti-inflammatory study (2026) Journal of Molecular Structure, 1350. DOI: 10.1016/j.molstruc.2025.144021

49) Yadav, R., Zond, R., Dongare, P., Halade, S., Deshmukh, S., Bhosale, L., **Sankpal, S.**, Hangirgekar, S. Fe₃O₄@SiO₂-Pr-N-DETAAP-Cu(II): A new magnetically separable catalyst for efficient synthesis of 1,4-disubstituted 1,2,3-triazole using click reaction (2026) Journal of Molecular Structure, 1349. DOI: 10.1016/j.molstruc.2025.143615

48) Zond, R., Yadav, R., Birajdar, N., Ghane, S., Dongare, P., Satyanarayan, N.D., Sankpal, U., Hangirgekar, S., **Sankpal, S.** Fe₃O₄@SiO₂@CPTMS-PADETA nanocomposite-catalyzed one-pot three-component synthesis of spiroindoloquinazolines: A combined biological and computational profiling (2025) Journal of Molecular Structure, 1348. DOI: 10.1016/j.molstruc.2025.143368

47) Zond, R., Yadav, R., Satyanarayan, N.D., Dongare, P., Hangirgekar, S., **Sankpal, S.** Synthesis, docking simulation, DFT study, and anticancer evaluation of spiro[benzo[c]pyrano[3,2-a]phenazines] using [Fe₃O₄@SiO₂-Pr-DABCO-Pr-CH₃][OH]₂ as a novel magnetically separable catalyst (2025) Journal of Molecular Structure, 1342, 142475. DOI: 10.1016/j.molstruc.2025.142475

46) Gurav, A., Kuchekar, D., Bhosale, L., Swami, P., Chavan, P., Nerlekar, N., Dandge, P., Choudhari, P., Rochlani, S., **Sankpal, S.**, Hangirgekar, S. Design and Synthesis of Novel Bio-MOF UTSA-16 (Zn) Catalyst for One-Pot Synthesis of 3,3-Di(indolyl)indolin-2-ones: Their

molecular docking, anti-microbial, and anti-oxidant evaluation (2025) Applied Organometallic Chemistry, 39 (9), e70366. DOI: 10.1002/aoc.70366

45) Gurav, A., Bhosale, L., Chavan, P., Gurav, R., Nerlekar, N., Dandge, P., Rochlani, S., **Sankpal, S.**, Hangirgekar, S. One-pot synthesis of novel hydrazinyl thiazoles using rust and Ficus benghalensis leaf derived $\text{Fe}_2\text{O}_3/\text{ZrO}_2$ nano-catalyst: Their molecular docking, ADME, antidiabetic, and antioxidant study (2025) Journal of Molecular Structure, 1338, 42223.

DOI: 10.1016/j.molstruc.2025.142223

44) Gurav, A., Bhosale, L., Swami, P., Chavan, P., Ladkat, P.D., Patil, P.S., Nerlekar, N., Dandge, P., Rochlani, S., **Sankpal, S.**, Hangirgekar, S. Novel 1,4-disubstituted 1,2,3-triazoles accessed *via* click chemistry: Their molecular docking, anti-inflammatory and antioxidant evaluation (2025) ChemistrySelect, 10 (30), e01657. DOI: 10.1002/slct.202501657

43) Yadav, R., Zond, R., Havaldar, V., Mane, S., Sasane, U., Budake, B., **Sankpal, S.**, Hangirgekar, S. Synthesis, characterization, and catalytic application of novel magnetically separable $\text{Fe}_3\text{O}_4@\text{SiO}_2\text{-Pr-NH-TDI-VB1}$ for rapid synthesis of hydrazinyl thiazoles (2025) Applied Organometallic Chemistry, 39 (8), e70299. DOI: 10.1002/aoc.70299

42) Salunke, G., Patil, P., Nippu, B.N., Satyanarayan, N.D., Yadav, R., Sankpal, U., Hangirgekar, S., **Sankpal, S.** Synthesis, anticancer, and molecular docking studies of quinolone-thiosemicarbazones using $\text{Fe}_3\text{O}_4@\text{gly-SO}_3\text{H}$ as a magnetically separable nanocatalyst (2025) ChemistrySelect, 10 (26), e01861. DOI: 10.1002/slct.202501861

41) Kumari, N., Singh, D., Yadav, A.A., **Sankpal, S.**, Murugavel, S., Lakshmanan, D., Kant, R. Synthesis, X-ray structure, DFT, hirshfeld surface, QTAIM/RDG and molecular docking analysis of 3-methyl-4-nitro-1,1-biphenyl (3-MNB) (2025) Journal of Chemical Crystallography, 55 (2), 115 – 126. DOI: 10.1007/s10870-025-01043-8

40) Bhosale, L., Gurav, A., Patil, P., Dagade, D., **Sankpal, S.**, Hangirgekar, S. Sustainable synthesis of 2,3-Dihydroquinazolin-4(1H)-ones using $\text{Ni-Fe}_2\text{O}_3@\text{SiO}_2\text{-Pr-DMAP}$ novel nanocatalyst: a profiling approach by DFT (2025) Research on Chemical Intermediates, 51 (4), 1827 – 1861. DOI: 10.1007/s11164-025-05544-1

39) Zond, R., Kulkarni, A.S., Umape, S.R., Dandge, P., Yadav, R., Naik, N.M., Thorat, V.H., Choudhari, P.B., Hangirgekar, S., **Sankpal, S.** $\text{Fe}_3\text{O}_4@\text{SiO}_2\text{-Pr-THAM-(OSO}_3\text{H)}_3$: A novel magnetically separable catalyst for the synthesis of 4H-chromenes and their antioxidant and

antibacterial study (2025) Research on Chemical Intermediates, 51 (3), 1233 – 1256. DOI: 10.1007/s11164-025-05506-7

38) Gurav, A., Gurav, R., Chavan, P., Nerlekar, N., Dandge, P., **Sankpal, S.**, Hangirgekar, S. Design and synthesis of novel hydrazinyl thiazoles from biomass derived furfurals: Their molecular docking, anti-cancer, anti-oxidant, and anti-bacterial study (2025) Journal of Molecular Structure, 1323, 140541. DOI: 10.1016/j.molstruc.2024.140541

37) Sawant, S., Patil, P., Salunke, G., Kamble, R., Bharmal, M., **Sankpal, S.**, Sonawane, K., Hangirgekar, S. An efficient, catalyst-free synthesis of novel indenoquinoxaline fused hydrazinylthiazoles and their antimicrobial evaluation with molecular docking study (2025) Journal of Molecular Structure, 1321, 140069. DOI: 10.1016/j.molstruc.2024.140069

36) Sawant, S., Patil, P., Salunke, G., Hangirgekar, S., **Sankpal, S.** [(C₃H₇)₃N-SO₃H]Cl ionic liquid catalysed synthesis of 2,3-dihydroquinoxoline-4(1H)one derivatives (2025) Rasayan Journal of Chemistry, 18 (1), 454 – 460. DOI: 10.31788/RJC.2025.1819169

35) Bhosale, L., Gurav, R., Gurav, A., **Sankpal, S.**, Hangirgekar, S. Ni-Fe₂O₃@SiO₂-Pr-DBU: A novel efficient magnetically retrievable catalyst for one-pot synthesis of dihydropyrano [3,2-c] chromene (2024) Journal of Organometallic Chemistry, 1021,123341. DOI: 10.1016/j.jorganchem.2024.123341.

34) Kumari, N., Yadav, A.A., **Sankpal, S.**, Murugavel, S., Lakshmanan, D., Kant, R. Synthesis, crystal structure, quantum chemical computation and molecular docking analysis of 1-(4(tert-butyl)-4-methoxy-[1,1-biphenyl]-4-yl) ethenone (2024) Journal of the Iranian Chemical Society, 21 (6), 1669 – 1680. DOI: 10.1007/s13738-024-03032-8

33) Deshmukh, N., Deshmukh, J., Deshmukh, N., **Sankpal, S.**, Hangirgekar, S. [ZeoDABCO-SO₃H]Cl catalyzed synthesis, cytotoxicity against normal kidney cell line and molecular docking study of dihydropyrimidines-2-ones/thiones (2024) Journal of Molecular Structure, 1301, 137351. DOI: 10.1016/j.molstruc.2023.137351

32) Zond, R., Yadav, A.A., Yadav, R., Valekar, N., Pore, S., Chandam, D., Hangirgekar, S., **Sankpal, S.** Fe₃O₄@Thiosemicarbazide-Cu(II): An efficient magnetically separable catalyst for greener synthesis of 1,2,3-triazoles using click reaction (2024) Journal of Organometallic Chemistry, 1004, 122925. DOI: 10.1016/j.jorganchem.2023.122925

- 31) Yadav, A.A., Zond, R., Jadhav, S., Hangirgekar, S., **Sankpal, S.** Boronic acid functionalized silica-coated Fe₃O₄ as a novel magnetically separable catalyst for the synthesis of hydrazinyl thiazoles (2023) *Applied Organometallic Chemistry*, 37 (12), e7282. DOI: 10.1002/aoc.7282
- 30) Swami, P., Rathod, S., Choudhari, P.B., Patil, D., Patravale, A., Nalwar, Y., **Sankpal, S.**, Hangirgekar, S. Fe₃O₄@SiO₂@TDI@DES: A novel magnetically separable catalyst for the synthesis of oxindoles (2023) *Journal of Molecular Structure*, 1292, 136079. DOI: 10.1016/j.molstruc.2023.136079
- 29) Kumar Surve, S., Birmule, P.R., **Sankpal, S.**, Patil, S.B., Kalalawe, V.G., Salunke-Gawali, S., Hangirgekar, S. Synthesis of novel methylsulfonylacrylimidamide via click chemistry approach, computational analysis and α -glucosidase inhibition activity (2023) *ChemistrySelect*, 8 (29), e202302112. DOI: 10.1002/slct.202302112
- 28) Yadav, A.A., Patil, P., Birajdar, N., Gophane, A., Gunturu, K.C., Hangirgekar, S., **Sankpal, S.** An expeditious synthesis and histo-toxicological study of 1,2,3-triazoles catalyzed by a novel Fe₃O₄@SiO₂-Pr-Thiosemicarbazide-Cu(II) as a magnetically separable catalyst (2023) *Applied Organometallic Chemistry*, 37 (8), e7181. DOI: 10.1002/aoc.7181
- 27) Deshmukh, N., Deshmukh, J., Paymal, S., Sonawane, K., Wanale, S., **Sankpal, S.**, Hangirgekar, S. Zeolite@-Ag-S-CH₂-COOH catalyzed synthesis of bis-cyclohexenones and their antibacterial evaluation and molecular docking study (2023) *Journal of Organometallic Chemistry*, 994, 122710. DOI: 10.1016/j.jorganchem.2023.122710
- 26) Patil, P., B. N. , N., Satyanarayan, N.D., Pore, S., Zond, R., Gurav, A., Hangirgekar, S., **Sankpal, S.** Design, synthesis, docking studies and anticancer evaluation of spiro[indoline-3,4'-pyrano[2,3-c]pyrazole] derivatives on MIN-6 cancer cell line (2023) *Journal of Molecular Structure*, 1277, 134772. DOI: 10.1016/j.molstruc.2022.134772
- 25) Karande, V., Mohire, P., Deshmukh, S., Patravale, A., Desai, V., Chandam, D., **Sankpal, S.**, Deshmukh, M. An efficient synthesis of pyranopyrimidine derivatives by using glyoxylic acid:L-proline deep eutectic solvent as a novel designer reaction promoter (2023) *Indian Journal of Chemistry (IJC)*, 62 (4), 339 – 349. DOI: 10.56042/ijc.v62i4.428
- 24) Karande, V., Mohire, P., Deshmukh, S., Patravale, A., Desai, V., Chandam, D., **Sankpal, S.**, Deshmukh, M. Green and highly efficient synthesis of pyrimidine derivatives in a novel glycolic acid: urea-based low transition temperature mixture via C–C and C–O bond formation (2022) *Journal of Heterocyclic Chemistry*, 59 (12), 2130 - 2141. DOI: 10.1002/jhet.4547

- 23) Patil, P., Yadav, A.A., Chandam, D., Gurav, R., Hangirgekar, S., **Sankpal, S.** [MerDABCO-BSA][HSO₄]₂: A novel polymer supported Brønsted acidic ionic liquid catalyst for the synthesis of biscoumarins and ortho-aminocarbonitriles (2022) *Journal of Molecular Structure*, 1259, 132622. DOI: 10.1016/j.molstruc.2022.132622
- 22) Gurav, R., Nalawade, R.D., Sawant, S., Satyanarayan, N.D., **Sankpal, S.**, Hangirgekar, S. Biosynthesis of ZrO₂ for ZrO₂@Ag-S-CH₂COOH as the retrievable catalyst for the one-pot green synthesis of pyrazoline derivatives and their anticancer evaluation (2022) *Applied Organometallic Chemistry*, 36 (5), e6666. DOI: 10.1002/aoc.6666
- 21) Gurav, R., Gurav, A., Salunke-Gawali, S., Jadhav, S., Choudhari, P.B., **Sankpal, S.**, Hangirgekar, S. Ficus benghalensis leaf extract in biosynthesis of Fe₃O₄ for Fe₃O₄@Ag-S-CH₂-COOH: A novel catalyst for synthesis of new 3,4-dihydropyrimidin-2(1H)-ones and their anticancer evaluation (2022) *Applied Organometallic Chemistry*, 36 (3), e6547. DOI: 10.1002/aoc.6547
- 20) Yadav, A.A., Patil, P., Chandam, D., Jadhav, S., Ghule, A., Hangirgekar, S., **Sankpal, S.** Fe₃O₄@SiO₂-SO₃H-DABCO: A novel magnetically retrievable bifunctional catalyst for ecofriendly synthesis of diheteroarylmethanes (2021) *Journal of Molecular Structure*, 1245, 130960. DOI: 10.1016/j.molstruc.2021.130960
- 19) Singh, M., Anthal, S., Chandrasekaran, R., Murugavel, S., **Sankpal, S.**, Deshmukh, M., Kant, R. Crystallographic structure and in silico molecular docking analysis of 2-cyclohexylidene-hydrazine-carbothiomide (2021) *Crystallography Reports*, 66 (7), 1306 - 1310. DOI: 10.1134/S1063774521070178
- 18) Patil, P., Yadav, A.A., Bavkar, L., N. , N.B., Satyanarayan, N.D., Mane, A., Gurav, A., Hangirgekar, S., **Sankpal, S.** [MerDABCO-SO₃H]Cl catalyzed synthesis, antimicrobial and antioxidant evaluation and molecular docking study of pyrazolopyranopyrimidines (2021) *Journal of Molecular Structure*, 1242, 130672. DOI: 10.1016/j.molstruc.2021.130672
- 17) Shinde, P.S., Suryawanshi, P.S., Patil, K.K., Belekar, V.M., **Sankpal, S.**, Delekar, S.D., Jadhav, S. A brief overview of recent progress in porous silica as catalyst supports (2021) *Journal of Composites Science*, 5 (3), 75. DOI: 10.3390/jcs5030075
- 16) Patil, S.M., Vanalakar, S.A., **Sankpal, S.**, Deshmukh, S.P., Delekar, S.D. Sulfated TiO₂/SnO₂ nanocomposite as a green heterogeneous catalyst for direct amide formation reaction (2021) *Results in Chemistry*, 3, 100102. DOI: 10.1016/j.rechem.2021.100102

- 15) Gurav, R., Surve, S.K., Babar, S., Choudhari, P.B., Patil, D., More, V., **Sankpal, S.**, Hangirgekar, S. Rust-derived Fe₂O₃nanoparticles as a green catalyst for the one-pot synthesis of hydrazinyl thiazole derivatives (2020) *Organic and Biomolecular Chemistry*, 18 (24), 4575 - 4582. DOI: 10.1039/d0ob00109k
- 14) Patil, P., Salunke, G., Deshmukh, M., Hangirgekar, S., Chandam, D., **Sankpal, S.** Thiamine hydrochloride catalyzed synthesis of 1,2,4-triazolidine-3-thiones in aqueous medium (2019) *ChemistrySelect*, 4 (45), 13071 - 13078. DOI: 10.1002/slct.201903646
- 13) Patil, D.V., Patil, V.S., **Sankpal, S.**, Kolekar, G.B., Patil, S.R. Synthesis of novel probe 2-chloro-6-methoxy-3-phenyl hydrazone quinoline and its application to detection of persulphate in aqueous ethanol solution by fluorescence turn on (2018) *Journal of Inclusion Phenomena and Macrocyclic Chemistry*, 90 (1-2), 99 - 104. DOI: 10.1007/s10847-017-0767-8
- 12) **Sankpal, S.**, Choudhari, P.B., Kumbhar, S., Phalle, S., Deshmukh, M. One pot synthesis and docking study of some tetrahydrobenzo[b]pyran derivatives as extended spectrum class lactamase inhibitors for urinary tract infection (2016) *Thai Journal of Pharmaceutical Sciences*, 40 (4),190 - 193.
- 11) Mulik, A., Chandam, D., Patil, P., Patil, D., Jagdale, S., **Sankpal, S.**, Deshmukh, M. Polymer-supported sulfonic acid-catalyzed candid synthesis and photophysical properties of 2H-indazolo[2,1-b]phthalazinetriones (2015) *Journal of Heterocyclic Chemistry*, 52 (3), 931 - 937. DOI: 10.1002/jhet.2068
- 10) Jagadale, S.D., Sawant, A.D., Patil, P., Patil, D., Mulik, A., Chandam, D., **Sankpal, S.**, Deshmukh, M. Synthesis of novel dibenzo-18-crown-6- ether-functionalized benzimidazoles and its applications in colorimetric recognition to Hg²⁺ and as antifungal agents (2015) *Journal of Heterocyclic Chemistry*, 52 (2), 468 - 472. DOI: 10.1002/jhet.1958
- 09) Chandam, D., Mulik, A., Patil, P., Jagdale, S., Patil, D., **Sankpal, S.**, Deshmukh, M. Oxalic acid dihydrate: Proline (LTTM) as a new generation solvent for synthesis of 3,3-diaryloxindole and chromone based bis(indolyl)alkanes: Green, chromatography free protocol (2015) *Journal of Molecular Liquids*, 207, 14 - 20. DOI:10.1016/j.molliq.2015.02.036
- 08) Jagadale, S.D., Sawant, A.D., Patil, P., Patil, D., Mulik, A., Chandam, D., **Sankpal, S.**, Deshmukh, M. Synthesis of some novel quinone diimine derivatives of benzo-15-crown-5 for application in Hg²⁺ recognition (2014) *Luminescence*, 29 (6), 586 - 590. DOI: 10.1002/bio.2585

- 07) Jagadale, S.D., Mulik, A., Chandam, D., Patil, P., Patil, D., **Sankpal, S.**, Sawant, A.D., Deshmukh, M. Synthesis of some novel 3,5-diarylpyrazole derivatives of dibenzo-18-crown-6-ether (2013) Indian Journal of Chemistry - Section B Organic and Medicinal Chemistry, 52 (10), 1352 - 1356.
- 06) Mulik, A., Deshmukh, M., Chandam, D., Patil, P., Jagdale, S., Patil, D., **Sankpal, S.** Glycerol-promoted catalyst-free one-pot three component synthesis of 1H-pyrazolo[1, 2-b]phthalazinediones (2013) Der Pharma Chemica, 5 (2), 19 - 23.
- 05) Jagadale, S.D., Deshmukh, M., Mulik, A., Chandam, D., Patil, P., Patil, D., **Sankpal, S.** Crown ether complex cation like ionic liquids: Synthesis and catalytic applications in organic reaction (2012) Der Pharma Chemica, 4 (1), 202 - 207.
- 04) Patil, P., Deshmukh, M., Mulik, A., Chandam, D., Patil, D., Jagdale, S., Anbhule, P.V., Salunkhe, D.K., **Sankpal, S.** An efficient, greener synthesis of 2-aryl-1-arylmethyl-1H-benzimidazoles using polystyrene sulfonic acid as a catalyst (2011) Der Pharma Chemica, 3 (6), 599 - 605.
- 03) Deshmukh, M.B., Alasundkar, K.N., Salunkhe, S.M., Salunkhe, D.K., **Sankpal, S.**, Patil, D.R., Anbhule, P.V. Synthesis, X-ray diffraction and optical spectral study of benzo-18-crown-6 containing monoazo dyes (2009) Indian Journal of Chemistry - Section B Organic and Medicinal Chemistry, 48 (5), 737 - 740.
- 02) Deshmukh, M., Alasundkar, K.N., Salunkhe, S.M., Salunkhe, D.K., **Sankpal, S.**, Patil, D.R., Anbhule, P.V. Synthesis of dibenzo-18-crown-6 ether containing pyrimidine derivatives (2008) Indian Journal of Chemistry - Section B Organic and Medicinal Chemistry, 47 (12), 1915 - 1917.
- 01) Deshmukh, M., Anbhule, P.V., Jadhav, S.D., Jagtap, S.S., Patil, D.R., Salunkhe, S.M., **Sankpal, S.** A novel and environmental friendly, one-step synthesis of 2,6-diamino-4-phenyl pyrimidine-5-carbonitrile using potassium carbonate in water (2008) Indian Journal of Chemistry - Section B Organic and Medicinal Chemistry, 47 (5), 792 - 795.