

FORMAT –B

To be filled by Head of the Department of Campus / Constituent Colleges

OSMANIA UNIVERSITY

103rd Annual Report for the Year 2021 – 2022
(01.04.2021 to 31.03.2022)

1. (a) Name of the Department and its profile (not more than 500 words) : CHEMISTRY
(b) year of Establishment : 1917
2. Name of the College : University College of Science
3. Name of the Head with Qualification : Prof. U. Umesh Kumar, M.Sc., Ph.D
- 4 - **Brief Report on Academic and Research aspects during the year (*about 2 pages on each item*)**
 - 4.1 Academic Schedule of UG and PG courses - Common Schedule of University is followed
 - 4.2 Introduction of new courses and updating syllabi: None
 - 4.4 MoUs / Collaboration with National / International institutions: None
 - 4.6 Research projects – (i) Sanctioned during the year, (ii) Completed during the year and (iii) In progress during the year (Mention number only)

Sl.No	Department	Name of the Teacher	Major Project(or) Minor Project	Project title	Sponsoring agencies	Amount Rs.	Duration	Ongoing /Completed	Sanctioned Date/Completed Date
1	2	3	4	5	6	7	8	9	10
1	Chemistry	Dr G.Vijaya charan	Minor	“Green synthesis of SeO ₂ doped	DST-PURSE program	2,35,000	3 years	completed	2019 -2022

				metal oxides as an efficient photo catalyst and antibacterial agents using Tecoma stans leaf extract. ”					
2.	Chemistry	Dr P Saritha Reddy	Minor	“Green route for efficient synthesis of fluorine containing Schiff bases and their complexes as potent Bio active agents: DNA interaction, Docking, In vitro antimicrobial screening and Cytotoxic studies. ”	DST-PURSE program	2,35,000	3 years	completed	2019 -2022
3.	Chemistry	Dr A Hari Padmasri	Minor	“Development of Nano Photo-Catalytic Materials for Efficient and Cost-Effective Utilization of Solar Energy in the Conversion of Renewable	OU-DST-PURSE-II	0.75 L	2021-22	Completed	22/12/2021; 31-01-2022

				Alcohols to Hydrogen”					
4.	Chemistry	P. Muralidhar Reddy	Major	Development of a graphene-based direct Naisal cell-based mass spectrometry technique for the detection of biomarker molecules	Ministry of Science and Technology (MOST), R.O.C., Taiwan	9,48,250 (NTD) Rs. 25, 52, 106/-	2022-2023	Ongoing	August 1, 2022
5.	Chemistry	P. Muralidhar Reddy	Minor	Development of a Rapid and Cost-effective Advanced Mass Spectrometry Approach for the Evaluation of Vitamin D Deficiency	Project Related Grants (PRG), DST, Gol & TSCOST	4,00,000	2022-2023	Ongoing	March 21, 2022
6.	Chemistry	P. Muralidhar Reddy	Minor	Development and Standardization of Immunity Boosting Polyherbal Infusion Bags	Project Related Grants (PRG), DST, Gol & TSCOST	4,00,000	2022-2023	Ongoing	March 21, 2022
				Assembly of Surface Plasmon Resonance-induced Macrocylic	DST-PURSE-II programme	2,35,000	2020-2022	Completed	

				M(II) complexes as photocatalysts driven by visible light Irradiation					
7.	Chemistry	Dr. Someshwar Pola, Co-PI	Major	Development of Multiferroic tapes for Sensing and Energy Harvesting Applications	DMRL-DRDO	15,71,570	2021-2024	Ongoing	
8.	Chemistry	Prof. M Vijjulatha	Major		DST SERB Empowerment and Equity Opportunities for Excellence in Science	Rs. 42 Lakhs	2019-2023	Ongoing	
					CSIR	Rs. 21,80,400	2019-23	Ongoing	
9.	Chemistry	Prof D Ashok	Major		UGC-BSR Faculty Fellowship	Rs. 33 Lakhs	2019-22	Ongoing	
10.	Chemistry	Dr K Shivakumar	Major		CSIR	Rs. 30,20,157	2019-22	Ongoing	

4.7 Academic distinctions / reputation of the Department

- The Department received grants from various funding agencies such as UGC, UPE, DST-FIST, CSIR etc.
- It is a Nodal Centre for facilitating Ph.D. Programme in Chemistry for candidates from IICT, Dr. Reddy's Laboratory Pvt. Ltd., DRDL, DMRL, Mylan Laboratories, Hyderabad etc. due to low cost, simple procedures and above all the facilitating attitude of the Dean's office and The Department of Chemistry.

4.8 Conduct of Seminars / Workshops / Training Programs

S.No.	Title of conference/Seminar/Workshop	Date	Funding Agency
1	<p>Special Training Program for SC/ST students of the Dept. of Chemistry Offered by CMET, Hyderabad.</p> <p>Title of the Program: “Skill development training program for Schedule Caste & Schedule tribe students on E-waste dismantling/segregation technologies and testing of Restriction of Hazardous substance (RoHS)”</p> <p>12 students from 2019-21 batch under the category of SC/ST were selected and offered online theory classes in month of July and practical training at CMET with various instruments operations was given during the month of September 2021. A certificate of training was provided to students who attended at the end of the program.</p>	September 2021	CMET, Hyderabad
2	<p>OU-DST-PURSE-II SPONSORED ONE DAY WORKSHOP ON “X-RAY DIFFRACTION & FLOURESCENCE SPECTROSCOPY”</p> <p>On 31st DECEMBER 2021 was organized by the Dept. of Chemistry, UCS, OU for MSc students and Research Scholars</p>		
3	<p>CHEMFEST 2022: National Science Day Celebrations Theme: Integrated Science and Sustainability reflects India’s future course</p> <p>Events Organized Convened by Prof U Umesh Kumar, Head, Dept. of Chemistry, OU and Organized by the MSc students of the department in association with Indian Science Congress Association (ISCA) Hyderabad Chapter. On 5th March 2022 at the Dept. of Chemistry, OU</p> <p>Chem quiz, e-Poster and Just-A-Minute (JAM) talk competitions were conducted for UG/PG students from all the</p>	5 th March 2022	Indian Science Congress Association (ISCA) Hyderabad Chapter & Siddartha Institutions, Hyderabad

	constituent and affiliated colleges of OU.		
4	OU TAKSH: OPEN DAY was celebrated on 24th March 2022 with great enthusiasm by the Dept. of Chemistry, UCS, OU with many displays by the MSc Students exhibited for the students of Intermediate, UG & PG from various colleges from twin cities	24th March 2022	OU
5	OU TAKSH: ALUMNI DAY was also celebrated with great enthusiasm on 25th March 2022 and many distinguished Alumni from Academia and Industry have participated and expressed their views in this regard.	25th March 2022	OU

4.10 Journals published by the University departments / faculty and Books published by the Publication Division of the University / other publishers: **-NIL-**

4.11 Endowment lectures organized during the year: **-NIL-**

4.12 Development and use of e-learning packages / tools

- Use of software programmes – Arrange Lab, Hyperchem, chemaxon etc.
- Reference work by availing internet facilities.
- Use of Microsoft word, excel and power point etc. for documentation.
- Molecular Modeling Using Open Source Software's – Manual (For Beginners) Prof. M. Vijjulatha, Dr. S. Sree Kanth and Dr. S. Gururaj.

4.13 Best practices in teaching and research

- ✚ Demonstration through Models.
- ✚ Power point presentation of a topic after completion of teaching of a course.
- ✚ Conducting seminars.
- ✚ Arranging Guest Lectures.
- ✚ Illustration of Scientific exhibits.
- ✚ Assignments in Course works
- ✚ Tours to industries viz., Hetero Drugs etc and Institutions such as ARCI, CSIR-IICT etc.

5 - Brief Report on Contribution of the Teaching Staff (about 2 pages on each item)

5.1 Research papers published in ISSN Journals and Impact factor & citation index analysis

Research papers published in ISSN Journals and Impact factor & citation index analysis:

(Pls see enclosed **Annexure I**); No. of Research papers published: **86**

H-index of the Teachers

S.No.	Name of the Faculty	H-index
1	Prof U. Umesh Kumar	13
2	Prof. Ramchander	05
3	Prof P Leelavathi	NA
4	Prof P.V. Ananthalakshmi	NA
6	Prof G. Vijaya Charan	NA
7	Dr. P. Saritha Reddy	06
8	Dr D.A. Padmavati	NA
9	Dr. Boda Sakaram	10
10	Dr A Hari Padmasri	20
11	Dr P. Muralidhar Reddy	24
12	Dr D A Padmavathi	06
13	Dr A Hari Padmasri	19
14	Dr P Someshwar	15
15	Dr Raju J Reddy	21
16	Dr. K. Laxma Reddy	12
17	Dr. B. Vijaya Kumar	11
18	Dr. p. Jalapathi	NA

Sl.No	Department	Title of paper	Name of the author/s	Department of the teacher	Name of journal	Year of publication Volumes . Issue	ISSN number	Impact factor of the journal	Link to the recognition in UGC enlistment of the Journal
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1	2	3	4	5	6	7	8	9	10
	Chemistry	Characterisation, antibacterial and anticancer investigation of green synthesized silver nanoparticles utilizing gymnema sylverstre leaf broth (Podapathri) by microwave light strategy	Rekha, K. C., Yaku, G., & Kumar, U. U.	Utkoor Umesh kumar	<i>Rasayan Journal of Chemistry</i>	2021, 14(3).	2031–2039	1.5	Yes
2	Chemistry	Ultrasonically Assisted Thiocyanation of Aromatic and Heteroaromatic Compounds Using Silica-Supported Bronsted Acids (HClO ₄ -SiO ₂ and KHSO ₄ -SiO ₂) as Reusable Catalysts.	Vijay Shekar Pulusu, K. C. Rajanna *, U. Umesh Kumar, M. Anil Kumar, Yaku Guguloth, Yadagiri Pulusu	Utkoor Umesh kumar	<i>Journal o Advances in Chemical Sciences</i>	9(3)	226-235.	0	No
3	Chemistry	Validated UV Spectrophotometric Methods for the Simultaneous Estimation of Omeprazole and Domperidone.	Prashanthi Malyala, Yaku Gugulothu, Kasigari Chandra Rekha, Umesh Kumar Utkoor	Utkoor Umesh kumar	<i>Indian Journal of Advances in Chemical Sciences</i>	9(3)	77-82.	0	No
4	Chemistry	Synthesis and biological activity of novel-4H-benzo[e][1,3]oxazin-4one	Savitha Rasam1 Divya Komirishetti2 Sabitha G2 Yaku	Utkoor Umesh kumar	<i>International journal of science and research</i>	15(1)	06-12.	0	Yes

		linked [1,2,3]-triazole derivatives	gugulothu1 Umesh Kumar Utkoor1*, Yadagiri Swamy.P1						
5	Chemistry	Microwave-assisted green synthesis of silver nanoparticles using passion fruit peel extract for catalytic reduction of organic dyes.	Vani Vangari, Yaku Gugulothu, Areef Mohammed, Umesh Kumar U*, Panasa Reddy A.	Utkoor Umesh kumar	<i>Journal of advanced scientific research</i>	12 (4)		1	Yes
6	Chemistry	Characterization, and DNA-binding Studies of Synthesized Gold Nanoparticles using Orange (Citrus sinensis) Peels Extract.	Kasigari Chandra Rekha, Gugulothu Yaku, M. Prashanthi, Umesh Kumar Utkoor*	Utkoor Umesh kumar	<i>Indian Journal of Advances in Chemical Sciences</i>	14(3)	2031- 2039	0	No
7	Chemistry	Pd/C and TFA-promoted One-pot, Two-step Cascade Reaction: An Effective Synthesis of Oxepines.	Gugulothu, K., Ramulu Meesa, S., Kumar Utkoor, U., Rajasekhara Reddy, S., & Shiva Kumar, K.	Utkoor Umesh kumar	<i>Asian Journal of Organic Chemistry</i>	10(11)	3045– 3049	3	Yes
8	Chemistry	Silica supported acids (SiO ₂ -HClO ₄ , SiO ₂ -KHSO ₄) as eco-friendly reusable catalysts for bromination of	Vijay Shekar Pulusu, K. C. Rajanna*, U.Umesh Kumar, M. Anil Kumar,	Utkoor Umesh kumar	<i>Silicone Journal of Chemistry</i>				

		aromatic and heteroaromatic compounds using KBr under solvothermal and solvent-free conditions.	M. Satish Kumar, Hemanth Yelike, Yaku Gugulothu, Yadagiri Pulusu						
9	Chemistry	Synthesis of spiro chromanone sandwiched 15,16,18 membered (Z)-dioxo cycloalkenes by ring closing metathesis and homodimers of 8-allyl-7-((6-bromoalkyl) oxy) spirochroman-4-ones by cross metathesis.	Prathima, K., Ashok, D., Sarasija, M., Dharavath, R., Utkoor, U. K., Lakshmi, V. V. S., Ganji, S. K., & Sripadi, P.	Utkoor Umesh kumar	<i>Synthetic Communications</i>	52(5)			
10	Chemistry	Validated uv-spectrophotometric methods for the simultaneous estimation of dextromethorphan and cetirizine	Utkoor, U. K., Malyala, P., Gugulothu, Y., & Kasigari, C. R	Utkoor Umesh kumar	<i>Journal of Advanced Scientific Research</i>	13(03)			
11	Chemistry	Synthesis of 1,2,3-Triazole Tethered Indole Derivatives: Evaluation of Anticancer Activity and Molecular Docking Studies	Dharmasothu Veeranna,[a] Lakavath Ramdas,[a] Guguloth Ravi,[a] Sushmitha Bujji,[b] Vishnu Thumma,[c] and Jadav	Dr. J Ramchander	<i>Chemistry Select</i>	2022	2365-6549	2.307	https://doi.org/10.1002/slct.202201758

			Ramchander* [a]						
12	Chemistry	Quinoline and 2-nitroimino-1, 3-diazacycloalkane hybrids: Design, synthesis and insecticidal activity	J.Sowmya, B. Padma and P. Leelavathi	P. Leelavathi	<i>J Indian Chem. Soc</i>	2022 99 (1)	100279	0.25	
13	Chemistry	Microwave-assisted one-pot multicomponent synthesis of 2-(-4-oxo-2-(1-(2-oxo-2h-chromen-3-yl) ethylidene) hydrazono)thiazolidin-5-yl) acetic acid derivatives and their antiviral activity	V. Anjaneyulu, V. Krishnaiah, K. Vermeire and P. Leelavathi	P. Leelavathi	<i>J Heterocyclic Chem.</i>	2022, 1, 1-12		2.1	
14	Chemistry	A new stability-indicating RP-HPLC method for the determination of dicyclomine hydrochloride and dimethicone combination in tablet dosage forms	J. Saroja, P.V. Anantha Lakshmi , Y. Rammohan, D. Divya Reddy	Prof. P.V.Anantha Lakshmi	<i>Future Journal of Pharmaceutica I Sciences</i>	2021 7	2314-7253		https://doi.org/10.1186/s43094-021-00260-0
15	Chemistry	Investigation of DNA binding and bioactivities of furan cored Schiff base Cu (II), Ni (II), and Co (III) complexes:	K. Venkateswarlu, D.Sreenu, G.Ramesh, P.V.Anantha	Prof. P.V.Anantha Lakshmi	<i>Applied organometallic Chemistry</i>	2021 35(9)	0268-2605	4.105	https://doi.org/10.1002/aoc.6326

		Synthesis, characterization and spectroscopic properties	Lakshmi, Shivaraj						
16	Chemistry	Spectroscopic, quantum chemical calculations, antioxidant, anticancer, antimicrobial, DNA binding and photo physical properties of bioactive Cu(II) complexes obtained from trifluoromethoxy aniline Schiff bases	D.Sreenu A. Rambabu, G.Nirmala, G.Ramesh, P.V.Anantha Lakshmi , Shivaraj	Prof. P.V.Anantha Lakshmi	<i>Journal of Molecular Structure</i>	2021 1249	0022-2860	3.196	https://doi.org/10.1016/j.molstruc.2021.131601
17	Chemistry	Synthesis, spectroscopic and thermal studies of Cu ²⁺ , Ni ²⁺ and Co ³⁺ complexes of Schiff base containing furan moiety. Antitumor, antioxidant, antibacterial and DNA interaction studies	K. Venkateswarlu, P.V.Anantha Lakshmi , Shivaraj	Prof. P.V.Anantha Lakshmi	<i>Applied organometallic Chemistry</i>	2021 36(2)	0268-2605	4.105	https://doi.org/10.1002/aoc.6530
18	Chemistry	Nickel–Metformin Ternary Complexes: Geometrical, Thermal, DNA Binding, and Molecular Docking	K. Rajeshwari, P.Vasanth B.Sathish Kumar, P.V.Anantha	Prof. P.V.Anantha Lakshmi	<i>Biological trace element research</i>	2022	1559-0720	4.081	https://doi.org/10.1007/s12011-022-03100-1

		Studies	Lakshmi						
19	Chemistry	Novel metformin complexes: Geometry optimization, non-isothermal kinetic parameters, DNA binding, on-off light switching and docking studies	B.Shekhar, K.Rajeshwari, B.Jayasree, P.V.Anantha Lakshmi	Prof. P.V.Anantha Lakshmi	<i>Applied organometallic Chemistry</i>	2022 36(4)	0268-2605	4.105	https://doi.org/10.1002/aoc.6601
20	Chemistry	A Treatise on Furan Cored Schiff Base Cu(II), Ni(II) and Co(III) Complexes Accentuating Their Biological Efficacy: Synthesis, Thermal and Spectroscopic Characterization, DNA Interactions, Antioxidant and Antibacterial Activity Studies	K.Venkateswarlu, A.Rambabu, D.Shiva Shankar, P.V.Anantha Lakshmi , Shivaraj	Prof. P.V.Anantha Lakshmi	<i>Chemistry and biodiversity</i>	2022 19(3)	1612-1880	2.745	https://doi.org/10.1002/cbdv.202100686
21	Chemistry	Metformin-Derived Water-Soluble Cobalt Complexes: Thermal, Spectroscopic, DNA Interaction, and Molecular Docking Studies	K.Rajeshwari, P. Vasantha, B.Shekhar, P.V.Anantha Lakshmi	Prof. P.V.Anantha Lakshmi	<i>Applied Biochemistry and Biotechnology</i>	2022 194	0273-2289	3.094	https://doi.org/10.1007/s12010-022-03862-3
22	Chemistry	Visible Light Driven Photodegradation of Pathological	Lakshmi Madhuri Peddada,	Dr. G.Vijaya charan	<i>Materials Science inc. Nanomaterial</i>	Chemistry Select 2022, 7,		2.307	doi.org/10.1002/slct.202

		Effluents and Biological Evaluation of Green ZnO Nanoparticles	Someswar Rao Sagurthi, Vijaya Charan Guguloth Ratnamala Annapragada, and Phani Raja Kanuparthi*		<i>s & Polymers Chemistry Select</i>	e202200146 (11 of 11)			200146
23	Chemistry	Synthesis, structural, photocatalytic and anti-cancer activity of Zn doped Ni nano chromites by citrate gel auto combustion method	P. Sailaja Kumari a, G. Vijaya Charan a,*, D. Ravi Kumar b	Dr. G.Vijaya charan	<i>Inorganic Chemistry Communications</i>	Inorganic Chemistry Communications 139 (2022) 109393		2.495	https://doi.org/10.1016/j.inoche.2022.109393
24	Chemistry	Study of photocatalytic, antimicrobial activity, dielectric and ac impedance properties of Zn doped Mg nanoferrites synthesized from citrate gel auto combustion method	D. Ravi Kumar a,*, Ch Abraham Lincoln a, G. Vijaya Charan a, Guguloth Thara b, D. Ravinder c, M. Veeraswamy c, Pallati Naresh d	Dr. G.Vijaya charan	<i>Materials Chemistry and Physics</i>	Materials Chemistry and Physics 278 (2022) 125648		4.56	https://doi.org/10.1016/j.matchemphys.2021.125648
25	Chemistry	Biological evaluation, molecular docking, DNA interaction and thermal studies of new bioactive metal	Kavitha Bengi, Sravanthi Maddikayala Saritha Reddy Pulimamidi	Dr P Saritha Reddy	<i>Applied Organometallic Chemistry</i>	Volume 35, Issue 2 / e6085, 2021.	1099-0739	4.105	https://doi.org/10.1002/aoc.6085

		complexes of 2-Hydroxybenzaldehyde and fluorobenzamine Schiff base ligand							
26	Chemistry	DNA binding, cleavage, docking, biological and kinetic studies of Cr(III), Fe(III), Co(II), and Cu(II) complexes with ortho-vanillin Schiff base derivative	Kavitha Bengi, Sravanthi Maddikayala Saritha Reddy Pulimamidi	Dr P Saritha Reddy	<i>Applied Organometallic Chemistry</i>	Volume 36, Issue 1 / e6451, 2021.	1099-0739	4.105	https://doi.org/10.1002/aoc.6451
27	Chemistry	DNA binding, cleavage, molecular docking, antimicrobial and anticancer activities of Cr(III), Fe(III), Co(II), and Cu(II) complexes of o-vanillin and fluorobenzamine Schiff base ligand		Dr P Saritha Reddy	<i>Applied Organometallic Chemistry</i>	Volume 36, Issue 3, e6531, 2022.	1099-0739	4.105	https://doi.org/10.1002/aoc.6531
28	Chemistry	Coumarinyl (thienyl) thiazole molecules as fluorescent photo switches	K. Mahesh, D. A. Padmavathi	Dr.D.A.Padmavathi	<i>Asian Journal of Chemistry</i>	Volume 34 (2022)	0970-7077		
29	Chemistry	Is Hammett Correlation of Dipole Moments of mono-Substituted Benzenes Helpful to Distinguish o,p-Directing Groups from m-Directing	R. Sanjeev, D. A. Padmavathi, V. Jagannadham	Dr.D.A.Padmavathi	<i>World Journal of Chemical Education</i>	2021			

		Groups in an Aromatic Electrophilic Substitution? A Chemical Education Perspective							
30	Chemistry	Synthesis and characterization of 4-(4'-methoxy)benzylidene amino-5-phenyl-3-mercapto-1, 2, 4-triazole and its complexes with Cu(II), Mn(II)	Aliya Begum, P. Sateesh Kumar, D.A Padmavathi , B. Sireesha, K. Eishwari and Ch. Sarala Devi	Dr.D.A.Padmavati	<i>IJRAR</i>	2021, Volume 8, Issue 3	P- ISSN 2349-5138		
31	Chemistry	Synthesis, antimicrobial activities of novel 3-chloro-4-(2,4-difluorophenyl)-1-(3-aryl-1,8-naphthyridin-2-yl)azetidin-2-ones and 2-(2,4-difluorophenyl)-3-(3-aryl-1,8-naphthyridin-2-yl)thiazolidin-4-ones.	Kurumanna Adem, Sakram Boda , Rambabu Sirgamalla & Ramesh Macha	Dr BODA SAKRAM	<i>Synthetic communications</i>	2022	Print ISSN: 0039-7911 Online ISSN: 1532-2432	2.17	https://doi.org/10.1080/00397911.2022.2045321
32	Chemistry	Photocatalytic Degradation of Acid Alizarin – Violet N Dye in Visible Light over Nano TiO ₂ and Ag-doped Nano TiO ₂ Catalysts	B. Vijayalaxmi, Mamathasri, Ch.Vijayatha and A. Hari Padmasri*	Dr.A. Hari Padmasri	<i>IOSR Journal of Applied Chemistry (IOSR-JAC)</i>	2022; 15; 1-6	e-ISSN: 2278-5736	-	
33	Chemistry	Synthesis and Characterization of Oxo Zirconium (IV) Complexes of	S. Durga Bhavani, N. Naresh Reddy, A.	P. Muralidhar Reddy	<i>American Institute of Physics (AIP) Conf. Proc.</i>	2021	ISSN 0094-243X (print);	0.40	https://doi.org/10.1063/5.0060864

		Polydentate Ligands	Krishnam Raju, M. Radhika, P. Muralidhar Reddy and K. Bhaskar		2021		1551-7616 (web)		
34	Chemistry	Potential Applications of Nanoparticles Embedded U-bent Fiber Optic Probe	Revathy Sundara Moorthy, Rohini Rondla, M. Kavitha, P. Hima Bindu, Chand Pasha, and P. Muralidhar Reddy	P. Muralidhar Reddy	American Institute of Physics (AIP) Conf. Proc. 2021	2021	ISSN 0094-243X (print); 1551-7616 (web)	0.40	https://doi.org/10.1063/5.0060856
35	Chemistry	Synthesis and Rational Design of New Appended 1,2,3-Triazole-uracil Ensembles as Promising Anti-Tumor Agents via In Silico VEGFR-2 Transferase Inhibition	N. Naresh Reddy, A. Sanjeev, S. Bhaskar, M. Kumara Swamy, V. Srinivasa Rao, A. Krishnam Raju, K. Bhaskar, Anren Hu, P. Muralidhar Reddy	P. Muralidhar Reddy	Molecules	2021	1420-3049	4.927	doi: 10.3390/molecules26071952
36	Chemistry	Synthesis and characterization of Abacavir acetic acid salt polymorphic transition from Abacavir free base by	Veeraswamy Rama, Nagaraju Rajana, K. Sateesh Reddy,	P. Muralidhar Reddy	Bioscience Biotechnology Research Communications	2021	Print ISSN: 0974-6455 Online	1.783	http://dx.doi.org/10.21786/bbrc/13.15/36

		using Process Analytical Tools (PAT)	Siddaiah Vidavulur, T.V. Pratap, Siva Bandi, Rohini Rondla, M. Radhika, K. Bhaskar and P. Muralidhar Reddy				ISSN: 2321-4007		
37	Chemistry	Design and synthesis, biological evaluation of bis-(1,2,3- and 1,2,4)-triazole derivatives as potential antimicrobial and antifungal agents	Sampath Bitla, Akkiraju Anjini Gayatri, P. Muralidhar Reddy , Vijaya Kumar Bhukya, Jagadeshwar Vannada, Ramulu Dhanavath, Bhaskar Kuthati, Devender Kothula, Someswar Rao Sagurthi, Krisham Raju Atcha	P. Muralidhar Reddy	<i>Bioorganic & Medicinal Chemistry Letters</i>	2021	2.823	0960-894X	doi: 10.1016/j.bmcl.2021.128004.
38	Chemistry	An Efficient (TBA) ₂ S ₂ O ₈ Catalyzed Regioselective Solvent-Free One-Pot Synthesis of Fully Substituted Pyrazoles	Malles Magini, Sampath Bitla, P. Muralidhar Reddy Saritha Birudaraju,	P. Muralidhar Reddy	<i>Results in Chemistry</i>	2021	2211-7156		https://doi.org/10.1016/j.rechem.2021.100184

			Ramulu Dhanavath, Krishnam Raju Atcha						
39	Chemistry	Mono and Tri-cationic Imidazolium Salts: Use as Stabilizers for Silver Nanoparticles and Anticancer Study	R. Rohini, N. Naresh Reddy, A. Sanjeev, S. Bhaskar, and P. Muralidhar Reddy	P. Muralidhar Reddy	<i>Asian J. Org. Med. Chem.</i>	2021	2456-8937	1.08	https://doi.org/10.14233/ajomc.2021.AJOMC-P331
40	Chemistry	Synthesis, Characterization and in vitro Anticancer Studies of New Co(II), Ni(II), Cu(II) and Zn(II) Complexes of (E)-4-((Quinoline-8-ylimino)methyl)benzene-1,2,3-triol Ligand	A. Sanjeev, N. Naresh Reddy, M. Kumara Swamy, Rohini Rondla, S. Ranga Reddy, and P. Muralidhar Reddy	P. Muralidhar Reddy	<i>Asian J. Org. Med. Chem.</i>	2021	2456-8937	1.08	DOI: 10.14233/ajomc.2021.AJOMC-P345
41	Chemistry	Antiferromagnetic spin correlations above the bulk ordering temperature in NiO nanoparticles: Effect of extrinsic factors,	Tai-Yue Li, Ming-Kang Ho, Tus-En Hsu, Hsin-Hao Chiu, Kuan-Ting Wu, Jen-Chih Peng, Chun-Ming Wu, Ting Shan Chan, B Vijaya Kumar, P Muralidhar Reddy , Shyue-	P. Muralidhar Reddy	<i>Applied Surface Science</i>	2022	0169-4332	6.707	DOI: https://doi.org/10.1016/j.apsusc.2021.152081

			Chu Ke, Chia-Liang Cheng, Ashish Chhaganlal Gandhi, Sheng Yun Wu						
42	Chemistry	Synthesis and Biological Evaluation of Novel 2-Arylquinoline-3-Fused Thiazolo[2,3c]1,2,4-Triazole Heterocycles as Potential Antiproliferative and Antimicrobial Agents	Ramulu Dhanavath, Ravinder Dharavath, Devender Kothula, Sampath Bitla, Gugulothu Yaku, Saritha Birdaragu, P. Muralidhar Reddy , Krishnam Raju Atcha	P. Muralidhar Reddy	<i>Journal of Heterocyclic Chemistry</i>	2022	1943-5193	2.193	DOI: 10.1002/jhet.4460
43	Chemistry	Synthesis and Anticancer Activity of 3,4,5-Trimethoxycinnamamide-Tethered 1,2,3-Triazole Derivatives	A. Sanjeev, N. N. Reddy, S. Bhaskar, R. Rohini, A. K. Raju, B. V. Kumar, A. Huc, and P. M. Reddy	P. Muralidhar Reddy	<i>Russian Journal of Organic Chemistry</i>	2022	1070-4280	0.72	DOI: 10.1134/S1070428022010122
44	Chemistry	Overview of the Effect of Covid-19 Pandemic on Forensic Pathology	G. Swetha, Revathy Sundara Moorthy, K. Premalatha, M. Kavitha and P.	P. Muralidhar Reddy	<i>High Technology Letters</i>	2022	1006-6748	2.7	DOI: https://doi.org/10.37896/HTL28.05/5810

			Muralidhar Reddy						
45	Chemistry	One–Pot Hydrothermal Preparation and Defects Enhanced Photocatalytic Activity of Bi doped CdWO ₄ Nanostructures	Kura Narsimha, N. Anuradha, Kathi Sudarshan, Ashish Chhaganlal Gandhi, A. Krishnam Raju, P. Muralidhar Reddy , Radhika Mone, G. Upender, B. Vijaya Kumar	P. Muralidhar Reddy	<i>Physical Chemistry Chemical Physics</i>	2022	1463-9076 (print); 1463-9084 (web)	3.945	https://doi.org/10.1039/D1CP02885E
46	Chemistry	Stability Indicating Method Development and Validation, Stress Degradation Studies for Dacarbazine By Using RP-HPLC	A. Sanjeev, Narmada Vallakeerthi, N. Naresh Reddy, S. Bhaskar and P. Muralidhar Reddy	P. Muralidhar Reddy	<i>NeuroQuantology</i>	2022	1303-5150	1.576	doi: 10.14704/nq.2022.20.9.NQ44735
47	Chemistry	Diisobutylaluminium hydride mediated efficient synthesis of Morita–Baylis–Hilman adducts through α -functionalization of alkyl Propiolates	Sailam Sri Gogula, Ramakrishna Konakalla, Kamalaker Reddy Kamireddy, P. Muralidar Reddy , Ch. Abraham	P. Muralidhar Reddy	<i>Journal of Heterocyclic Chemistry</i>	2022	1943-5193	2.193	DOI: 10.1002/jhet.4602

			Lincoln and B.V. Subba Reddy						
48	Chemistry	Nanoparticle Drug Delivery System for the Treatment of Neurological Disorder	K. Laxma Reddy, P. Muralidhar Reddy* and M. Kavitha	P. Muralidhar Reddy	<i>NeuroQuanto logy</i>	2022	eISSN: 1303-5150	1.576	doi: 10.14704/nq.2022.20.9.NQ44736
49	Chemistry	Precise Sn-Doping Modulation for Optimizing CdWO ₄ Nanorod Photoluminescence	K. Manjunatha, Ming-Kang Ho, Tsu-En Hsu, Hsin-Hao Chiu, Tai-Yue Li, B. Vijaya Kumar, P. Muralidhar Reddy , Ting San Chan, Yu-Hao Wu, Bi-Hsuan Lin, Artashes Karmenyan, Chia-Liang Cheng, Ashish Chhaganlal Gandhi and Sheng Yun Wu	P. Muralidhar Reddy	<i>Int. J. Mol. Sci.</i>	2022	1422-0067	6.208	https://doi.org/10.3390/ijms232315123
50	Chemistry	Modulation of Magnetic and Luminescence Properties via Control Cu-Doped in CdWO ₄ Nanorods for Photocatalytic	Ashish Chhaganlal Gandhi, Hsin-Hao Chiu, Ming-Kang Ho, Tsu-En Hsu, Tai-Yue	P. Muralidhar Reddy	<i>ACS Appl. Nano Mater.</i>	2022	1422-0067	5.097	https://doi.org/10.1021/acsanm.2c03092

		Applications	Li, Yu-Hao Wu, B. Vijaya Kumar, P. Muralidhar Reddy , Bi- Hsuan Lin, Chia-Liang Cheng, and Sheng Yun Wu						
51		Effect of surface and contact points modification on the output performance of triboelectric nanogenerator	S. Mishra, P. Supraja, D. Haranath, R. R. Kumar, Someshwar Pola,	Dr. Someshwar Pola	<i>Nano Energy</i>	2022	, 107964		
52		Benzodithiophene- Based, Donor– Acceptor– π –Donor– Acceptor Systems as Hole Transporting Materials for Efficient Perovskite Solar Cells	R. Gade, M. Basude, R. Vummadi, Someshwar Pola		, <i>Water Research & Technology</i> ,	2022	3065– 3078		
53		Benzodithiophene- Based, Donor– Acceptor– π –Donor– Acceptor Systems as Hole Transporting Materials for Efficient Perovskite Solar Cells,	K. Manda, R. Kore, M. Ambapuram, P. Chetty, S. Roy, V. Jadhav, S. N. Babu, R. gundla, R. Mitty, Someshwar pola		<i>ChemPhotoC hem</i>	2022	e20220 0062		
54		Organic materials based on hetero	Suresh Kilaru, Ramesh Gade,		<i>Materials Science in</i>	2022	106730		

		polycyclic aromatic hydrocarbons for organic thin-film transistor applications,	Yadagiri bhongiri, Anuj Tripathi, Prabhakar Chetti, Someshwar Pola		<i>Semiconductor Processing</i>				
55		Photooxidation of 2,20- (Ethyne-1,2-diyl)dianilines: An Enhanced Photocatalytic Properties of New Salophen-Based Zn(II) Complexes,	Maresh Subburu, Ramesh Gade, Prabhakar Chetti, Someshwar Pola		<i>Photochem</i>	2022			
56		Evolution of photocatalytic activity of CeO ₂ -Bi ₂ O ₃ composite material for wastewater degradation under visible-light irradiation, Optical Materials	K Masula, Y Bhongiri, GR Rao, PV Kumar, Someshwar Pola, M Basude		<i>Optical Materials</i>	2022	112201		
57		Synthesis and Optical Properties of Mono- and DiSubstituted 1, 3, 5-Triazines Functionalized with Thiophene and Furan,	V. M. Vidya, Someshwar Pola,* P Chetti,		<i>Journal of Molecular Structure,</i>	2022	132408		
58		Enhanced photocatalytic activity of CdWO ₄ /BaTiO ₃ heterostructure for dye degradation,	S. P. Sai Sushma, G. Swarupa, T. Nagesh, Someshwar Pola, P.		<i>New J. Chem</i>	2021	19723-19732		

			Rajitha, B. Vijaya Kumar, G. Upender						
59		Efficient, Dopant free Phenazine based Hole Transporting Materials for High Performance Perovskite Solar Cells.	G. Maddala, R. Gade, J. Ahemed, S. Kalvapalli, N. B. Simhachalam, P. Chetti, Someshwar Pola,* R. Mitty		<i>Solar Energy</i>	2021	501-512		
60		New Zn (II) Complex-Composite Material: Piezo-Enhanced Photomineralization of Organic Pollutants and Wastewater from Lubricant Industry	Venkateshwar Rao D, Mahesh Subburu, Ramesh Gade, Manohar Basude, Chetti Prabhakar, Narendra S. Babu, Nagababu penumaka Yadagiri Bhonogiri and Someshwar Pola,		<i>Environ. Sci.: Water Res. Technol</i>	2021	1737-1747		
61		New indolo[1,2-c]quinazolines for Single-crystal field effect transistor (SCFET): A united Experimental and Theoretical Studies	Venkat Swamy Puli, Suresh K, Yadagiri Bhongiri, Anuj Tripathi, Prabhakar		<i>Journal of Physical Organic Chemistry</i>	2021	e4276		

			Chetti, Anindita Chatterjee, Kiran Kumar Vukoti and Someshwar Pola						
62		Synthesis of New Zn (II) Complexes for Photo decomposition of Organic Dye Pollutants, Industrial Wastewater and Photo-oxidation of methyl Arenes under Visible-light	J. Ahemed, J. Pasha, V. Rao D. R. Kore, R. Gade, Y. Bhongiri, P. Chetti, Someshwar Pola		<i>Journal of Photochemistry & Photobiology, A: Chemistry</i>	2021	113455		
63		New Indolo[3,2-b]indole based small organic molecules for Organic Thin Film Transistors (OTFTs): A combined experimental and DFT Study	V. S. Puli, M. Subburu, Y. Bhongiri, A. Tripathi, K.R.S. Prasad, A. Chatterjee, Someshwar Pola,* P. Chetti		<i>Journal of Molecular Structure</i>	2021	129491		
64		Optoelectronic and charge transport properties of D-n-A type 1,3,5-triazine derivatives: A combined experimental and DFT study, Spectrochimica Acta Part A: Molecular and Biomolecular	Vidya V. M., Someshwar Pola and Prabhakar Chetti		<i>Spectrochimica Acta Part A: Molecular and Biomolecular Spectroscopy</i>	2021	118940		

		Spectroscopy							
65	CHEMISTRY	Interrupted CuAAC-Thiolation for the Construction of 1,2,3-Triazole-Fused Eight-Membered Heterocycles from <i>O</i> -/ <i>N</i> -Propargyl derived Benzyl Thiosulfonates with Organic Azides	Reddy, R. J.* Waheed, Md., Kumari, A. H., and Krishna, G. R.	Dr. Raju J. Reddy	<i>Adv. Synth. Catal.</i> 2022 , 364 , 319-325	2022/364		5.981	
66	CHEMISTRY	Diethyl phosphite-mediated switchable synthesis of bis(imidazoheterocycles) derived disulfanes and sulfanes using imidazoheterocycles and octasulfur	Reddy, R. J.* Shankar, A., Kumar, J. J. Sharadha, N., and Krishna, G. R.	Dr. Raju J. Reddy	<i>New. J. Chem.</i> 2022 , 46 , 4784-4791	2022/46		3.925	
67	CHEMISTRY	Solvent-Dependent Mono- and Bis-Thiolation of (<i>E</i>)- β -Iodovinyl Sulfones with Thiols for Flexible Synthesis of 1,2-Thiosulfonylalkenes and 1,2-Dithioalkenes	Reddy, R. J.* Kumari, A. H., Sharadha, N. and Krishna, G. R.	Dr. Raju J. Reddy	<i>J. Org. Chem.</i> 2022 , 87 , 3934-3951.	2022/87		4.198	
68	CHEMISTRY	Base-mediated [3+2]-cycloannulation strategy for the synthesis of pyrazolo[1,5- <i>a</i>]pyridine derivatives using (<i>E</i>)- β -iodovinyl sulfones	Reddy, R. J.* Sharadha, N. Kumari, A. H.	Dr. Raju J. Reddy	<i>Org. Biomol. Chem.</i> , 2022 , 20 , 4331-4337	2022/20		3.890	

69	Chemistry	SARS-CoV-2 variants and spike mutations involved in second wave of COVID-19 pandemic in India	Radhakrishna Muttineni, Binitha R.N, Kalyani Putty, Kavitha Marapakala , Sandra K.P., Jaslin Panyam, Aravind Vemula, Shashi Mohan Singh, Subin Balachandran, Viroji Rao S.T. Anand Kumar Kondapi	Dr. M. Kavitha	<i>Transbound Emerg Dis</i>	March 2022		4.521	doi: 10.1111/tbed.14508.
70	Chemistry	Synthesis, structural characterization, in vitro DNA binding, cytotoxic activity properties of Ru(II) compounds containing NTIP and BTIP ligands	A. Dayanand, A. Vasantha, V.D. Shukla, Ch. Nagamani, P. Venkat Reddy, V. Ravi Kumar, K. Laxma Reddy , Prof. S. Satyanarayana	Dr. K. Laxma Reddy	<i>IJARSCT</i>	Vol.12, Issue 4, Dec 2021	2581-9429		
71	Chemistry	“Enhanced photocatalytic activity of CdWO ₄ /BaTiO ₃ heterostructure for Dye degradation”,	S. P. Sai Sushma, G. Swarupa, T. Nagesh, Someshwar	B. Vijaya Kumar	<i>New Journal of Chemistry</i>	2021	1144-0546	3.591	doi.org/10.1039/D1NJ01556G

		<i>New J. Chem. 45 (2021) 19723-732.</i>	Pola, P. Rajitha, B. Vijaya Kumar and G. Upender,						
72	Chemistry	Design and synthesis, biological evaluation of bis-(1,2,3- and 1,2,4)-triazole derivatives as potential antimicrobial and antifungal agents	Sampath Bitla, Akkiraju Anjini Gayatri, Muralidhar Reddy Puchakayala, Vijaya Kumar Bhukya , Jagadeshwar Vannada, Ramulu Dhanavath, Bhaskar Kuthati, Devender Kothula, Someswar Rao Sagurthi, Krisham Raju Atcha	B. Vijaya Kumar	<i>Bioorganic & Medicinal Chemistry Letters</i>	2021	0960-894X	2.823	doi: 10.1016/j.bmcl.2021.128004 .
73	Chemistry	“Vibrational, thermal and optical studies of 30TeO ₂ -39.5B ₂ O ₃ -(30-x)ZnO-xLi ₂ O-0.5V ₂ O ₅ (0=x =30 mol%) glass system”,	M. Anand Pandarinath, Muralikrishna, D. Suresh Babu, B. Vijaya Kumar , G. Upender	B. Vijaya Kumar	<i>Journal of Non Crystalline Solids</i>	2021	0022-3093.	4.453	doi.org/10.1016/j.jnoncrsol.2021.120875
74	Chemistry	Antiferromagnetic spin correlations above the bulk	Tai-Yue Li, Ming-Kang Ho, Tus-En	B. Vijaya Kumar	<i>Applied Surface Science</i>	2022	0169-4332	6.707	DOI: https://doi.org/

		ordering temperature in NiO nanoparticles: Effect of extrinsic factors,	Hsu, Hsin-Hao Chiu, Kuan-Ting Wu, Jen-Chih Peng, Chun-Ming Wu, Ting Shan Chan, B Vijaya Kumar , P Muralidhar Reddy, Shyue-Chu Ke, Chia-Liang Cheng, Ashish Chhaganlal Gandhi, Sheng Yun Wu						rg/10.1016/j.apsusc.2021.152081
75	Chemistry	Synthesis and Anticancer Activity of 3,4,5-Trimethoxycinnamamide-Tethered 1,2,3-Triazole Derivatives	A. Sanjeev, N. N. Reddy, S. Bhaskar, R. Rohini, A. K. Raju, B. V. Kumar , A. Huc, and P. M. Reddy	B. Vijaya Kumar	<i>Russian Journal of Organic Chemistry</i>	2022	1070-4280	0.72	DOI: 10.1134/S1070428022010122
76	Chemistry	Modulation of Magnetic and Luminescence Properties via Control Cu-Doped in CdWO ₄ Nanorods for Photocatalytic Applications	Ashish Chhaganlal Gandhi, Hsin-Hao Chiu, Ming-Kang Ho, Tsu-En Hsu, Tai-Yue Li, Yu-Hao Wu, B. Vijaya Kumar, P.	B. Vijaya Kumar	<i>ACS Appl. Nano Mater.</i>	2022	1422-0067	5.097	https://doi.org/10.1021/acsanm.2c03092

			Muralidhar Reddy, Bi-Hsuan Lin, Chia-Liang Cheng, and Sheng Yun Wu						
77	Chemistry	One-Pot Hydrothermal Preparation and Defects Enhanced Photocatalytic Activity of Bi doped CdWO ₄ Nanostructures	Kura Narsimha, N. Anuradha, Kathi Sudarshan, Ashish Chhaganlal Gandhi, A. Krishnam Raju, P. Muralidhar Reddy, Radhika Mone, G. Upender, B. Vijaya Kumar	B. Vijaya Kumar	<i>Physical Chemistry Chemical Physics</i>	2022	1463-9076 (print); 1463-9084 (web)	3.945	https://doi.org/10.1039/D1CP02885E
78	Chemistry	Precise Sn-Doping Modulation for Optimizing CdWO ₄ Nanorod Photoluminescence	K. Manjunatha, Ming-Kang Ho, Tsu-En Hsu, Hsin-Hao Chiu, Tai-Yue Li, B. Vijaya Kumar, P. Muralidhar Reddy, Ting San Chan, Yu-Hao Wu, Bi-Hsuan Lin,	B. Vijaya Kumar	<i>Int. J. Mol. Sci.</i>	2022	1422-0067	6.208	https://doi.org/10.3390/ijms232315123

			Artashes Karmenyan, Chia-Liang Cheng, Ashish Chhaganlal Gandhi and Sheng Yun Wu						
79	Chemistry	Acetic Acid-Water Mediated Efficient One-Pot Synthesis of Functionalized Isoxazolyl Amino Chromeno[4,3-b]pyridine Derivatives,	Ravinder Reddy Danda, P. Muralidhar Reddy, A. Krishnam Raju, V. Naveen Reddy, K. Santosh Kumar and B. Vijaya Kumar	B. Vijaya Kumar	<i>Asian Journal of Chemistry</i>	2023	0975-427X	0.16	doi.org/10.14233/ajchem.2023.26926
80	Chemistry	Characterization and photocatalysis of visible-light-driven Z-scheme Bi ₂ WO ₆ /Bi ₂ MoO ₆ heterojunction for Rhodamine B degradation,	B. Ashok, K. Ramesh, D. Madhu, T. Nagesh, B. Vijaya Kumar , G. Upender,	B. Vijaya Kumar	<i>Inorg. Chem.Comm.</i>	2023	1387-7003.	3.428	doi.org/10.1016/j.inoche.2023.110495
81		Synthesis, characterization and antimicrobial evaluation of some novel (3-methyl-5-((3-phenylisoxazol-5-yl) methoxy) benzofuran-2-yl)(phenyl)	A Kishore, Kumar, V Sunitha, P Shankaraiah, P Jalapathi*	P Jalapathi	<i>Indian Journal of Chemistry- Section B [NIScPR-CSIR, India]</i>	60B(08) 2021	0975-0983	0.592	

		methanones							
82		Some Novel [6-(Isoxazol-5-ylmethoxy)-3-methylbenzofuran-2-yl] phenylmethanone Derivatives, Their Antimicrobial Activity, and Molecular Docking Studies on COVID-19	N Umapathi, B Shankar, M Raghavender, T Vishnu, P Jalapathi*	P Jalapathi	<i>Russian Journal of General Chemistry</i> [Springer Nature]	92(2)2022 -	1070-3632	0.779	
83		Molecular docking studies on COVID-19 and antibacterial evaluation of newly synthesized 4-(methoxymethyl)-1,2,3- triazolean analogues derived from (E)-1- phenyl-3-(2-(piperidin-1-yl)quinolin-3-yl) prop-2-en-1-one	M Nagamani, T Vishnu, P Jalapathi M Srinivas *	P Jalapathi*	<i>Journal of the Iranian Chemical Society</i> [Springer Nature]	19(4)2022	1735-2428	2.271	
84		SYNTHESIS AND IN VITRO CYTOTOXIC EVALUATION OF NOVEL TRIAZOLE-BENZIMIDAZOLE EMBODIED PYRAZOLE DERIVATIVES AGAINST BREAST CANCER	Bala Narsimha Dhoddi, Ravi Kurapati , Govardhan Reddy Kundur2 , Sampath Bitla2	P Jalapathi*	<i>Rasayan Journal of Chemistry</i> [Springer]	15(2) 2022	0976-0083	1.30	

			, Balaswamy Puligilla ³ , and Jalapathi Pochampally						
85		Synthesis, antimicrobial and antioxidant activity of triazole, pyrazole containing thiazole Derivatives and Molecular docking studies on COVID-19	Matta Raghavender, Jalapathi Pochampally* , Bala Narsimha Dhoddi, Bhookya Shankar, Sampath Bitla, Anjini Gayatri Akkiraju	P Jalapathi*	<i>BMC Chemistry (In Press)</i>	2022	2661-801X	4.095	
86		Synthesis of newer substituted chalcone linked 1, 2, 3-triazole analogs and evaluation of their cytotoxic activities	Matta Raghavender, Bhookya Shankar, Nalla Umapathi, Pochampally Jalapathi*	P Jalapathi*	<i>Heterocyclic Communications</i>	28(1)2022	2191-0197	2.00	

5.2 Number of books published with ISBN reference & citation index analysis

1. Prof. P Leelavathi is the Author of Monograph on Monograph on Organic Synthesis-A Strategic Approach-2021, Telugu Academy, ISBN : 978-81-8180-674-1
2. Prof. P Leelavathi is the Co-author, Telugu Academy, TS ISBN : 978-81-8180-723-6, Textbook for B.Sc. II semester, 2021.
3. Dr. P. Muralidhar Reddy authored Chapters in A text book of Chemistry (For B.Sc II year, Semester-IV, Paper-VI); Edition 2021, Divya Lakshmi Publishers & Distributors, Lohia Nagar, Meerut-25001 (UP), India, ISBN: 9-788195-238446
4. Dr D A Padmavathi, Chapter-B.Sc. semester IV (Both Telugu and English medium), Theories of bonding in metals, 2021, Telugu Academy, TS.
5. Dr D A Padmavathi, Chapter-B.Sc. semester III (Both Telugu and English medium), Evaluation of analytical data, 2021, Telugu Academy, TS
6. Dr D A Padmavathi, Chapter-B.Sc. semester V (Both Telugu and English medium), Evaluation of analytical data, 2021, Telugu Academy, TS

Prof. P. Leelavathi

Year	Books authored		Chapters in Edited Book	Editor of Book		ISBN No.
	International Publishers	National Publishers		International Publishers	National Publishers	
-	-	-	-	-	-	-
2021		Textbook for B.Sc. II semester, (English and Telugu medium)			Telugu Academy	978-81-8180-723-6
2021		Monograph on Organic Synthesis-A Strategic Approach			Telugu Academy	978-81-8180-674-1

Please attach separate sheet clearly indicating the names and page numbers of the publications along with reprints of the complete publications.

Dr. B. Sakram

Year	Books authored		Chapters in Edited Book	Editor of Book		ISBN No.
	International Publishers	National Publishers		International Publishers	National Publishers	
2022			Organic Chemistry			978-93-90847-90-7
Please attach separate sheet clearly indicating the names and page numbers of the publications along with reprints of the complete publications.						
<div> <div>Editor Dr. M.R.Jay apal</div> <div>Kripa Drishti Publications, Pune, Chapter Edited by DR. B. Sakram Page No:97-118</div> </div>						

Dr. A. Hari Padmasri

Year	Books authored		Chapters in Edited Book	Editor of Book		ISBN No.
	International Publishers	National Publishers		International Publishers	National Publishers	

2022	Wiley-VCH GmbH Editor: Doan Pham Minh		Chapter-7: Selective Hydrogenation and Dehydrogenation Using Hydroxyapatite- Based Catalysts Vijay K. Velisoju, Hari Padmasri Aytam, Venugop al Akula pp. 241-268			ISBN:9783527348497
2022		Divya Lakshmi Publishers & Distributors Meerut (U.P.) Edited by Dr. A. Hari Padmasri	B.Sc II yr Chemistry text book by A. Hari Padmasri, G. Pranitha, K. Saritha Rani, Rafiya Sultana, B. Rajini			ISBN:978-93-91576-20- 2
Please attach separate sheet clearly indicating the names and page numbers of the publications along with reprints of the complete publications.						

Dr. P. Muralidhar Reddy

Year	Books authored		Chapters in Edited Book	Editor of Book		ISBN No.
	Internation al Publishers	National Publishers		International Publishers	National Publishers	
2021		A text book of Chemistry – Vol.6			Divya Lakshmi Publishers &	9-788195-238446

					Distributors	
2022		Encyclopedic Dictionary of Chemistry			Neelkamal Publications Pvt. Ltd.,	978-93-90897-47-6
Please attach separate sheet clearly indicating the names and page numbers of the publications along with reprints of the complete publications.						

Dr. P. Jalapathi

Year	Books authored		Chapters in Edited Book	Editor of Book		ISBN No.
	International Publishers	National Publishers		International	National Publishers	
2022	Devender Mandala Jalapathi Pochampally Raghavender Matta					9786205500408
2022	Jalapathi Pochampally and Raghavender Matta.					9786205497012
Please attach separate sheet clearly indicating the names and page numbers of the publications along with reprints of the complete publications.						

5.3 Number of patents applied for and sanctioned during the year

Sl.No	Name of the Department	Name of the Teacher	Title of patent filed	Filed/Approved/Granted	National / International	Country Name	Patent Registration Number
1	2	3	4	5	6	7	8
1.	Chemistry	P. Muralidhar Reddy	Novel Sensitive and Advanced Clinical Mass	Bundesrepublik Deutschland	International	German	20 2022 105 300 IPC: G01 33/82

			Spectrometry Kit for Evaluation of Vitamin-D Deficiency				
	Chemistry	P.Jalapathi	Antiproliferative 1,2,3-Triazole Analogues	Approved	National	INDIA	202241026111
	Chemistry	P.Jalapathi	Antiproliferative-active Piperzino methyl Triazole compounds	Approved	National	INDIA	202241033244

5.4 Consultancy ventures and income earned: -NIL-

Sl.No	Name of the Department	Name of the Teacher	Title of project	Organization	National/ International	Country	Nature of Consultancy	Funds Sanctioned	Funds Released till now	Sanctioned Date(or)Completed Date	Ongoing / Completed
1	2	3	4	5	6	7	8	9	10	11	12

5.5 Distinctions/honours/awards won by the faculty

1. **Prof. Shivaraj** appointed as Executive member of Telangana State Council of Higher Education.
2. **Prof. Shivaraj** appointed as Member, National Monitoring Committee for Education of SCs, STs and Persons with Disabilities by MHRD, Gol, New Delhi, India.
3. **Prof. Shivaraj** appointed as Boards of Governors of NIPER, Hyderabad, India
4. **Prof. Shivaraj** appointed as Members of the University Grants Commission (UGC), New Delhi, India
5. **Dr. P. Muralidhar Reddy** elected as member **Toxicology and Biomedicine Research Group**, Faculty of Applied Sciences, **Ton Duc Thang University**, Ho Chi Minh City, **Vietnam**

6. **Dr. P. Muralidhar Reddy** received “MOTHER TERESA GOLD MEDAL AWARD”, for “National Economic Growth through Individual Contribution” in various fields of Science, Medicine, Research, Industry and Social Service to strengthen India’s unity and economic development on 22nd May 2021 by Global Economic Progress & Research Association (Registration No. 283, Act XXVII of 1975), Tamil Nadu, India.
7. **Dr. Raju Jannapu Reddy:** Paper entitled: “Ni–Catalyzed Difunctionalization of Alkynyl Bromides with Thiosulfonates and N-Arylthio Succinimides: A Convenient Synthesis of 1,2-Thiosulfonylethenes and 1,1-Dithioethenes,” was Shortlisted for the “Synthesis Best Paper Award-2021”

Sl.No	Name of the Department	Name of the teacher	Name of the Award	International/ National / State level	Nature of award	Date
1	2	3	4	5	6	
1.	Chemistry	P. Muralidhar Reddy	Mother Teresa Gold Medal Award	National	National Economic Growth through Individual Contribution	22 nd May 2021
2.	Chemistry	P. Muralidhar Reddy	BEST TEACHER AWARD-2021	State		5th September, 2021

5.6 Membership of the Faculty in important national bodies

- ✚ Member of **American Chemical Society.**
- ✚ Member of **Royal Society of Chemistry.**
- ✚ Member of **International Society of Heterocyclic Chemistry.**
- ✚ Life Member of **Indian Science Congress.**
- ✚ Life Member of **Chemical Research Society of India.**
- ✚ Life Member of **Indian Chemical Society.**
- ✚ Life Member of **Indian Council of Chemists.**
- ✚ Life Member of **Indian Society of Chemists and Biologists.**
- ✚ Life Member of **Indian Association of Chemistry Teachers.**
- ✚ Life Member of **Indian Institute of Public Administration.**
- ✚ Life Member of **Electrochemical Society of India, Bangalore.**
- ✚ Life Member of **The Society for Advancement of Electrochemical Science and Technology, Karaikudi.**

- ✚ Life Member of **Materials Research Society of India (MRSI)**
- ✚ Life Member of **International Congress of Chemistry and Environment.**
- ✚ Life Member of **Catalysis Society of India**
- ✚ Life Member of **International Society of Teachers and Researchers in Chemistry (ISRTC) & Journal of Teaching and Research in Chemistry (JTRC)**
- ✚ Life Member of **Osmania University Chemistry Alumni Association**
- ✚ Fellow of **Telangana Academy of Sciences**
- ✚ Member of **Taiwan society for mass spectrometry (TSMS)**
- ✚ Associate Fellow of **Telangana Academy of Sciences**

Sl.No	Name of the Department	Name of the teacher	Membership / Distinction earned	Organization	International / National / State level
1	2	3	4	5	6
1.	Chemistry	Dr B Sakram	Life member	Indian Science Congress	National
2.	Chemistry	Dr B Sakram	Life member	Indian Council Of Chemist	National
3.	Chemistry	Dr.B. Vijaya Kumar	Life Membership	Indian Science Congress Association	National
4.	Chemistry	Dr.B. Vijaya Kumar	Life Membership	Indian Council of Chemists	National
5.	Chemistry	Dr.B. Vijaya Kumar	Life Membership	Materials Research Society of India	National
6.	Chemistry	Dr.P. Muralidhar Reddy	Life Membership	Indian Science Congress Association	National
7.	Chemistry	Dr.P. Muralidhar Reddy	Life Membership	Indian Council of Chemists	National

5.7 Faculty attended / chaired session in Seminars / Conferences / events (National & International)

Sl.No	Department	Title of Seminar/ Conference	Name of the Teacher	National / International	Duration & dates	Sponsoring agencies	Remarks
1	2	3	4	5	6	7	8
1.	Chemistry	2-day National seminar on "Emerging Trends in Chemical and Materials Science Research."	Dr G.Vijaya charan	National	25 th & 26 TH February 2022		
2.	Chemistry	Use of Web of Science and Endnote in Research	Dr G.Vijaya charan	National	11 th ,Nov,2022		
3.	Chemistry	2-day International Virtual Conference on Disciplinary, Interdisciplinary and Multidisciplinary Research 2021	Dr P Saritha Reddy	International	14 – 15 th October 2021, IVC-DIMR Conference.		
4.	Chemistry	XXXX Annual Conference ICC Indian Council of Chemists	Dr P Saritha Reddy	National	29 th -30 th December, 2021.		
5.	Chemistry	2-day National seminar on "Emerging Trends in Chemical and Materials Science Research."	Dr P Saritha Reddy	National	21 & 22 January 2022		

6.	Chemistry	2-day International conference on “Chemical Advances for Sustainable Development CASD 2022”	Dr P Saritha Reddy	International	12 th and 13 th April 2022.		
7.	Chemistry	Chemistry based programs in Taksh, the Open house celebrations	Dr. D.A. Padmavati	National	24th – 26th March 2022		
8.	Chemistry	CHEM FEST 2022	Dr. D.A. Padmavati	National	5th Mar 2022		
9.	Chemistry	Chaired the Oral Presentations Session of Physical Chemistry Section in Annual conference Indian Council of Chemists -2021	Dr. A. Hari Padmasri	National	29 th -31 st December 2021.	Indian Council of Chemists	
10.	Chemistry	Invited Talk on “Thermodynamics ” in the Virtual Lecture Series on Basics in Chemistry to PG students on 23 rd July 2021	Dr. A. Hari Padmasri	National	23 rd – 26 th July 2021.		
11.	Chemistry	Emerging Trends in Chemical and	P. Muralidhar	National Seminar	Two days - 25th and 26th	Department of Chemistry,	P. Muralidha

		Materials Science Research” (ETCMSR-2022)	Reddy		February 2022	SR & BGNR Govt. Arts & Science College, Khammam - TSCOST	r Reddy acted as Chair person
12.	Chemistry	Current Trends & Futuristic Challenges in Chemical Sciences	P. Muralidhar Reddy	International Seminar	Two days - 29th and 30th July 2022		P. Muralidhar Reddy acted as Rapporteur
13	CHEMISTRY	JNOST	Prof. A. K. Sahoo	National	Jan 2022	NOST	
14	Chemistry	International winter school 2022 on Frontiers in Materials Science	Dr. B. Vijaya Kumar	International Seminar	05 th -9 th Dec 2022		
15	Chemistry	Emerging Trends in Chemical and Materials Science Research” (ETCMSR-2022)	Dr. B. Vijaya Kumar	National Seminar	Two days - 25th and 26th February 2022	Department of Chemistry, SR & BGNR Govt. Arts & Science College, Khammam - TSCOST	Dr. B. Vijaya Kumar
16	Chemistry	Current Trends & Futuristic Challenges in Chemical Sciences	Dr. B. Vijaya Kumar	International Seminar	Two days - 29th and 30th July 2022		Dr. B. Vijaya Kumar acted as Rapporteur
17	Chemistry	A two day National Seminar on Emerging	Dr. Someshwar Pola	National	25and 26 -02-2022	UGC	

		Trends in Chemical & Materials Science Research (ETCMSR-2022)					
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Details of research work presented in National Seminars / Conferences

Dr G. Vijaya charan

Year	Name of the workshop/ seminar	Number of Participants	Date From – To	Organised by	Whether presented a paper (yes/No) (of yes oral/post)	Link to the Activity report on the website
2021	2-day National seminar on “Emerging Trends in Chemical and Materials Science Research.”	2	25 & 26 Feb 2022	Department of Chemistry, SR&BGNR Arts & Science College, Khammam	Yes /Poster	
2022	2-day International conference on “Chemical Advances for Sustainable Development CASD 2022”	2	12 th and 13 th April 2022.	University College for Women, OU	Yes /Poster	

Year	Name of the workshop/ seminar	Number of Participants	Date From – To	Organised by	Whether presented a paper (yes/No) (of yes oral/post)	Link to the Activity report on the website
2021	2-day International Virtual Conference on Disciplinary, Interdisciplinary and Multidisciplinary Research 2021	3	14 – 15 th October 2021, IVC-DIMR Conference.		Yes /oral	
2021	XXXX Annual Conference ICC Indian Council of Chemists	3	29 th -30 th December, 2021.	Indian Council of Chemists	Yes /Poster	
2021	2-day National seminar on “Emerging Trends in Chemical and Materials Science Research.”	3	21 & 22 January 2022	Department of Chemistry, SR&BGNR Arts & Science College, Khammam	Yes /Poster	
2022	2-day International conference on “Chemical Advances for Sustainable Development CASD 2022”	3	12 th and 13 th April 2022.	University College for Women, OU	Yes /Poster	

Dr. D.A. Padmavathi

Year	Name of the workshop/ seminar	Number of Participants	Date From – To	Organised by	Whether presented a paper (yes/No) (of yes oral/post)	Link to the Activity report on the website
2022	Hot and Multi Electron Mediated Photoelectrochemical Methods of High Efficiency Water Splitting		21 - 22 January 2022	SPARC sponsored IITH-Hokkaido university workshop/Webinar	No	
	Emerging trends in Chemical & Materials Science Research		25 & 26 th February 2022	SR&BGNR GONT. ARTS & SCIENCE COLLEGE Khammam	Yes (Post)	

Dr. A Hari Padmasri

Year	Name of the workshop/ seminar	Number of Participants	Date From – To	Organised by	Whether presented a paper (yes/No) (of yes oral/post)	Link to the Activity report on the website
2021	Presented a paper entitled “Solar & Visible Light Induced Photocatalytic degradation of Acid Alizarin VioletN over	B Vijayalaxmi, M Vijayatha, Md Sajeeda, A Hari Padmasri*	29 th -31 st December 2021.	Organized by ICC & Department of Chemistry, Satavahana University,	Yes/oral	

2021	<p>Nano TiO₂ based catalysts” in Annual conference Indian Council of Chemists - 2021</p> <p>Presented a paper entitled “Effective Bioglycerol Conversion to Solketal over Sulphated Al-MCM 41 Catalysts” in the Annual conference Indian Council of Chemists -2021</p>	M Balakrishna, A Vennela and A Hari Padmasri*	29 th -31 st December 2021.	<p>Karimnagar, Telangana</p> <p>Organized by ICC & Department of Chemistry, Satavahana University, Karimnagar, Telangana</p>	Yes/oral	
2022	<p>Presented a paper entitled “Sulphated Al-MCM 41 Catalysts for the Effective Conversion of Bioglycerol to Solketal” in the Two Day National Seminar on “Emerging Trends in Chemical and Materials Science Research” (ETCMSR-2022).</p>	M Balakrishna, Ch Swaroopa Yadaiah Salwadi and A Hari Padmasri *	25 th & 26 th February 2022	<p>Organized by SR&BGNR. Govt. Arts & Science College (Autonomous), Khammam.</p>	Yes/oral	

Year	Name of the workshop/ seminar	Number of Participants	Date From – To	Organised by	Whether presented a paper (yes/No) (of yes oral/post)	Link to the Activity report on the website
2021	Virtual International Conference on Advances in Chemistry and Chemical Engineering 2021 (ACCE 2021)		April 16-17, 2021	Department of Chemical Engineering, Sardar Vallabhbhai National Institute of Technology, Surat	Oral Presentation - Synthesis, Characterization and Biological Applications of (E)-N-(2(methylthio)phenyl)-1-(pyridin-2-yl)methanimine Cobalt (II) Complexes"	
2021	International Virtual Conference on Disciplinary, Interdisciplinary and Multidisciplinary Research 2021.		(14-15 October 2021)	Research India Foundation, Bhubaneswar-751002, Odisha, India.	Oral presentation - Recent Applications of Functionalized Magnetic Nanoparticles in Food, Forensic and Environmental sciences	
2022	Recent Advances and Global Trends in Pharmaceutical Sciences		21 st & 22 nd day of January 2022	APP Karnataka State Branch in collaboration with APP American International Branch & APP Analytical Chemistry Division	Oral Presentation - Functionalized Magnetic Nanoparticles for the Detection Identification of Pathogens by Mass Spectrometry and Bio - Medical Applications	
2022	Virtual International Conference on		11th and 12th February	Department of Chemistry,	Oral Presentation - Analytical Method	

	Surface Chemistry		2022	Annamalai University	Development and Validation for the Simultaneous Estimation of Metformin and Atorvastatin by Rp-HPLC in Combined Dosage Form	
2022	Two Days Virtual International Conference on Chemical Advances on Sustainable Development (CASD 2022)		12th to 13th April, 2022	Department of Chemistry, University college for Women, Koti	Oral Presentation – Applications of Magnetic Nano Fe ₃ O ₄ in Environmental, Forensic and Food Sciences	
2022	Two-day International Seminar on "Current Trends & Futuristic Challenges in Chemical Sciences"		29th and 30th July 2022	Department of Chemistry, Osmania University, Hyderabad.	Oral Presentation - Synthesis, Structure, Antimicrobial, DNA binding and DFT Analysis of Bioactive Cu(II), Ni(II) and Co(II) complexes obtained from (thiophen-2yl) methanamine Schiff base Ligands	
2022	International Conference on Ultrasonic and Material Science for Advanced Technology (ICUMSAT-2022)		1st to 3rd August 2022	Telangana University, Dichipally, Nizamabad, Telangana in association with Ultrasonic Society of India	Oral Presentation - Benzimidazo Quinazoline Based Metal Complexes: Synthesis, Characterization and In vitro Anticancer Activity	
2022	Two Day National Seminar on		25th and 26th	Department of Chemistry, SR	Oral Presentation – Novel Synthesis of	

	“Emerging Trends in Chemical and Materials Science Research” (ETCMSR-2022)		February 2022	& BGNR Govt. Arts & Science College, Khammam	Oxoindolyl Derivatives from Isatins and Propiolates through DIBAL-H	
2022	Two-Day National Conference on Recent Innovations in Smart/Nano Materials (NCRISNM-2022)		29th to 30th April 2022	Department of Physics, University College of Science, Osmania University, Hyderabad, Telangana	Oral Presentation – Functionalized Iron Oxide Nanoparticles as Microplastic Adsorbents	
2022	AU- Pharmacon – 2022, 6 th National Conference on Trending Research and Innovations in Pharmaceutical Sciences		22nd & 23rd July 2022	School of Pharmacy, Anurag University, Hyderabad, Telangana	Oral Presentation – Development and Validation of RP-HPLC method in Simultaneous Estimation of Bilastine and Montelukast as tablet dosage form	
2022	Emerging Trends and Innovations in Pharmaceutical Sciences (ETIPS - 2022)		13th & 14th Oct 2022	University College of Pharmaceutical Science, Palamuru University, Mahabubnagar, Telangana	Oral Presentation – Quantitative Determination of Imipramine HCl & its Pharmaceutical Formulation Using FTIR & UV-Vis Spectroscopy	
2022	National Seminar on Bioinorganic & Medicinal Chemistry (BMC-2022)		29th & 30th November 2022	Department of Chemistry, University College, Telangana	Oral Presentation – Design, Synthesis & Biological Evaluation of Some New 1,3,4 Oxadiazoles”	

				University, Nizamabad, Telangana		
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Dr.M.Kavitha

Year	Name of the workshop/ seminar	Number of Participants	Date From – To	Organised by	Whether presented a paper (yes/No) (of yes oral/post)	Link to the Activity report on the website
2022	Stability indicating RP-HPLC method development and validation for the simultaneous determination of Empagliflozin and Lingliptin in bulk form and marked pharmaceutical dosage form” in a two day National seminar on Emerging Trends in chemical & Materials Science Research (ETCMSR-2022	3	25& 26 February 2022	Department of Chemistry, SR&BGNR Arts & Science College, Khammam	Yes /Poster	

Dr. K. Laxma Reddy

Year	Name of the workshop/ seminar	Number of Participants	Date From – To	Organised by	Whether presented a paper (yes/No) (of yes oral/post)	Link to the Activity report on the website

2022	DNA binding of Ru(II)poly pyridyl complexes” in a two day National seminar on Emerging Trends in chemical & Materials Science Research (ETCMSR-2022	3	25& 26 February 2022	Department of Chemistry,SR&BGNR Arts & Science College, Khammam	Yes /Poster	
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Dr. B. Vijaya Kumar

Year	Name of the workshop/ seminar	Number of Participants	Date From – To	Organised by	Whether presented a paper (yes/No) (of yes oral/post)	Link to the Activity report on the website
2022	International winter School 2022 on	35	05 th -9 th Dec 2022	JNCASR, Bangalore	Yes	
2022	Current Trends & Futuristic Challenges in Chemical Sciences		29th and 30th July 2022	Department of Chemistry	yes	

5.8 Subject related extension activities involving interaction with society/community/institutions

Guest Lectures delivered by the Faculty Members:

S.No.	Name of the Faculty member	Topic	Place/Date
1.	P. Leelavathi	Spectral data interpretation-an overview at online refresher course in chemical sciences.	By the UGC– HRDC, Osmania University, Hyderabad, Jan-2022
2.	P. Leelavathi	Synthesis of newer fused quinoline heterocycles of biological interest	ICC 2021 December
3.	P. Leelavathi	Asymmetric Synthesis: An overview” at FDP on “Enhancing Academic and Research Endeavors in Chemistry at Higher Education Institutions	St. Ann’s College for women, Mehadipatnam, Hyderabad, April-2022

4.	Prof. P. Saritha Reddy	Bonding in Metal Complexes	RBVRR Womens college on 22 nd June 2021
5.	Dr.D.A. Padmavati	INSTRUMENTATION : Bringing the instruments into the Lecture Hall	Department of Chemistry, St. Ann's College for Women, Hyderabad
6.	Dr.D.A. Padmavati	Molecular insights through computational analysis	UGC-HRDC ASC OU at REFRESHER COURSE IN CHEMICAL SCIENCES on 20 th Jan – 3 rd Feb 2022
7.	Dr.D.A. Padmavati	Thermodynamics	University College for women, Koti, Hyderabad on 29 th Nov 2021
8.	Dr.D.A. Padmavati	Quantum Chemistry	St Pious degree and PG college, Hyderabad on 17 th Nov 2021
9.	Dr. A. Hari Padmasri	“Heterogeneous Catalysis” to M.Sc Physical Chemistry students	PG centre, Mirzapur during April/June 2021.
10.	Dr. A. Hari Padmasri	“Thermodynamics” to UG/PG students	Dept. of Chemistry, RBVRR College for Women, Narayanaguda, Hyderabad on 17 th June 2021.
11.	Dr. A. Hari Padmasri	Invited online lecture on “Nanomaterials” to UG/PG students	Dept. of Chemistry, St. Pious UG & PG Collge, Nacharam, Hyderabad on 1 st September 2021
12.	Dr. A. Hari Padmasri	Invited online lecture on “Nanomaterials”	Anwar-ul-uloom PG College, Hyderabad on 18 th Nov’ 2021.
13.	Dr. A. Hari Padmasri	Invited webinar lecture on “Essentials of Thermodynamics” to UG/PG students	Dept. of Chemistry, Govt. Degree College for Women, Begumpet, Hyderabad on 16 th December 2021
14.	P. Muralidhar Reddy	How to Use EndNote Software For Academic Writing	UGC– HRDC, Osmania University 1.12.2021 to 31.12.2021
15.	P. Muralidhar Reddy	Advanced Technologies in Biological and Chemical Science	Government Degree College, Sadasivpet, On 28th January 2022
16.	P. Muralidhar Reddy	The Role of Functionalized Magnetic Iron Oxide Nanoparticles as Mouth Cleaners and Other Biomedical Applications	20.01.2022 to 03.02.2022 by the UGC– HRDC, Osmania University, Hyderabad
17.	P. Muralidhar Reddy	Recent Progress on Functionalized Magnetic Iron Oxide Nanoparticles: Synthesis, Bacterial Capture and Other Biomedical Applications	Department of Chemistry, Annamalai University, 11th and 12th February 2022
18.	P. Muralidhar Reddy	Development of a Rapid and Cost-	25th and 26th February 2022, organized by

		Effective and Feasible Method for the Evaluation of Vitamin D Deficiency Using Advanced Mass Spectrometry Based Methods	Department of Chemistry, SR & BGNR Govt. Arts & Science College, Khammam
19.	Dr. M. Kavitha	Delivered an Invited Talk on “COVID-19 and Medicinal Plants as Immunity Boosters to the participants of the online faculty induction programme organized by UGC-HRDC, Osmania University, Hyderabad on 22nd February 2022	UGC-HRDC, Osmania University, 22 nd February 2022
20.	Dr. B. Vijaya Kumar	Synthesis of Nanomaterials: An overview	UGC-HRDC, Osmania University, Hyderabad

8 - Brief Report on the analysis of Students Performance – Course-wise (Final Year only)

8.9 Analysis of student performance in the last five years.

Sl. No	Course	Students		2021-2022	2020-2021	2019-2020	2018-2019	2017-2018
1	2	3	4	5	6	7	8	9
1		Registered	Boys	26	29	28	26	39
			Girls	49	46	48	43	39
2		Passed	Boys	21	21	23	21	31
			Girls	40	39	40	35	32
3		Percentage	Boys	80.7%	79.3%	82.0%	80%	79%
			Girls	81.6%	82.6%	83.0%	80.10%	82%

8.10 Scholarships / Fellowships earned by students (State / Council agencies / University).

Sl. No	Course	No. of students	No. awarded	Nature of Scholarships						
				State Govt.	Amount	Central Govt.	Amount	Univ.	Amount	Total Amount

						Agencies				
1	2	3	4	5	6	7	8	9	10	11

8.15 Brief Report on the Alumni Associations, its activities and contribution to the University (*about 2 pages*)

- ❖ The Osmania University Chemistry Alumni Association is formed in the year 2009 by its Founder President Prof. K. Veera Reddy. The Alumni Association activities are in the areas of infrastructural developments, arranging endowments lectures, Institution of (3) Gold Medals to encourage students in the academics.
- ❖ Osmania University Chemistry Foundation (OUCF), a group of elite Alumni of the department consisting of the industrialists, bureaucrats and NRIs had been contributing immensely through the Entrepreneur Alumni viz., Dr B Parthasarathi Reddy, CEO of Hetero Drugs Ltd. And Dr M S N Reddy, CEO of MSN Labs in the renovation of MSc labs of the Department.
- ❖ A group of Alumni of OUCF & OUCAA formed a Mentors group to guide the research scholars and MSc students towards their career and have been interacting with them. A unique mentoring program is planned to introduce various mentors all over the globe who are successful in their fields to inspire and mentor the scholars and MSc students which is planned to be launched from June 2021.
 - Step-Up Mentoring Program Series A unique program, first of its kind was organized by Osmania University Alumni Association North America (OUCAA-NA), Osmania University Chemistry Foundation (OUCF) & Dept. of Chemistry, UCS, OU. The aim of this program is to provide support and guide research scholars and students to achieve their career aspirations and professional goals. Under this program, the Alumni Mentors were introduced through interactive sessions and talk by them to Research Scholars and MSc students every week through online mode during June - October 2021. By Dr Mahender B Dewal, Dr Madhavi Srikoti, Dr Prasanna Reddy, Dr HSP Rao, Dr Thallada Bhaskar, Dr Venkataramana D, Prof Challa Vijay Kumar, Dr Narahari Sastry, Dr Thota Ganesh, Dr K Aravind Babu
 - Entrepreneur Series of Step-UP Mentoring Program Interactive Sessions by Alumni who have established themselves as successful Entrepreneurs to motivate the research scholars and students to take up Entrepreneurship as a career were organized online in continuation to the earlier Step-UP mentoring program during October - November. By Dr Mahender B Dewal, Dr Bhaskar Rao Venepalli, Dr Jagath Reddy, Dr Paidi Yella Reddy.
 - Interactive Session by Dr Prasanna Reddy, Alumnus of the Dept. of Chemistry, OU Associate Director, Global Regulatory Affairs, CMC group, Merck, USA with MSc students, Research Scholars & Faculty Members of Dept. of Chemistry, UCS, OU was arranged on 14th October 2021 on her visit to India.
 - Distinguished Guest Lecture by Prof. Saptarshi Majumdar, On “Hovering Around Polymers: A Journey in Multi-Scale Engineering” Department of Chemical Engineering, IIT, Hyderabad was organized for MSc students, Research Scholars and Faculty members on 20th November 2021 at 10:30 a.m organized jointly by OUCF & the Dept. of Chemistry, OU

(c) Permanent teachers on rolls

Sl. No	Professors		Assoc. Professors		Asst. Professor		Total
	Male	Female	Male	Female	Male	Female	
1	2	3	4	5	6	7	8
	06	07	01	00	05	01	20

13.2. Temporary Teachers (Retired / Re-employed / Working on temporary / ad-hoc basis/ Academic Consultants)

Sl.No	Category of the teacher	Number		Total
		Male	Female	
1	2	3	4	5

13.3. Department-wise Seminars / Conferences organized:

Sl.No	Department	Title of Seminar/ Conference	Name of the Coordinator	National / International	Duration & dates	Sponsoring agencies	Remarks
1	2	3	4	5	6	7	8

13.4. Department-wise Workshops / Training programs organized//Name of the Coordinator

Sl.No	Department	Workshop/ Training programme	Name of the Coordinator	Teaching / Non-Teaching	Duration & dates	Sponsoring agencies	Remarks
1	2	3	4	5	6	7	8
1	Chemistry	OU-DST-PURSE-II	Prof U Umesh	Teaching	1 Day, 31st	OU-DST-	

		SPONSORED ONE DAY WORKSHOP ON "X-RAY DIFFRACTION & FLOURESCENCE SPECTROSCOPY" was organized by the Dept. of Chemistry, UCS, OU for MSc students and Research Scholars	Kumar		DECEMBER 2021	PURSE-II	
2	Chemistry	A refresher course on "Chemical Sciences"	Prof U Umesh Kumar & Dr. P. Someshwar (Co-coordinator)	Teaching	15 days, 20-01-2022 to 03-02-2022	UGC-HRDC	

13.5. Details of Minor/Major research projects sanctioned/Completed during the year

Sl.No	Department	Name of the Teacher	Major Project(or) Minor Project	Project title	Sponsoring agencies	Amount Rs.	Duration	Ongoing /Completed	Sanctioned Date/Completed Date
1	2	3	4	5	6	7	8	9	10
1	Chemistry	Dr G.Vijaya charan	Minor	"Green synthesis of SeO ₂ doped metal oxides as an efficient photo catalyst and antibacterial	DST-PURSE program	2,35,000	3 years	completed	2019 -2022

				agents using Tecoma stans leaf extract. ”					
2.	Chemistry	Dr P Saritha Reddy	Minor	“Green route for efficient synthesis of fluorine containing Schiff bases and their complexes as potent Bio active agents: DNA interaction, Docking, In vitro antimicrobial screening and Cytotoxic studies. ”	DST-PURSE program	2,35,000	3 years	completed	2019 -2022
3.	Chemistry	Dr A Hari Padmasri	Minor	“Development of Nano Photo-Catalytic Materials for Efficient and Cost-Effective Utilization of Solar Energy in the Conversion of Renewable Alcohols to Hydrogen”	OU-DST-PURSE-II	0.75 L	2021-22	Completed	22/12/2021; 31-01-2022
4.	Chemistry	P. Muralidhar Reddy	Major	Development of a graphene-based direct	Ministry of Science and Technology	9,48,250 (NTD)	2022-2023	Ongoing	August 1, 2022

				Naisal cell-based mass spectrometry technique for the detection of biomarker molecules	(MOST), R.O.C., Taiwan	Rs. 25, 52, 106/-			
5.	Chemistry	P. Muralidhar Reddy	Minor	Development of a Rapid and Cost-effective Advanced Mass Spectrometry Approach for the Evaluation of Vitamin D Deficiency	Project Related Grants (PRG), DST, GoI & TSCOST	4,00,000	2022-2023	Ongoing	March 21, 2022
6.	Chemistry	P. Muralidhar Reddy	Minor	Development and Standardization of Immunity Boosting Polyherbal Infusion Bags	Project Related Grants (PRG), DST, GoI & TSCOST	4,00,000	2022-2023	Ongoing	March 21, 2022
				Assembly of Surface Plasmon Resonance-induced Macrocyclic M(II) complexes as photocatalysts driven by visible light Irradiation	DST-PURSE-II programme	2,35,000	2020-2022	Completed	

7.	Chemistry	Dr. Someshwar Pola, Co-PI	Major	Development of Multiferroic tapes for Sensing and Energy Harvesting Applications	DMRL-DRDO	15,71,570	2021-2024	Ongoing	
8.	Chemistry	Prof. M Vijjulatha	Major		DST SERB Empowerment and Equity Opportunities for Excellence in Science	Rs. 42 Lakhs	2019-2023	Ongoing	
					CSIR	Rs. 21,80,400	2019-23	Ongoing	
9.	Chemistry	Prof D Ashok	Major		UGC-BSR Faculty Fellowship	Rs. 33 Lakhs	2019-22	Ongoing	
10.	Chemistry	Dr K Shivakumar	Major		CSIR	Rs. 30,20,157	2019-22	Ongoing	

13.6. Department under SAP

Sl.No	Department	Year of Sanction	Phase	Amount Sanctioned	Research fellowships sanctioned	No. of seminars conducted	Any other info
1	2	3	4	5	6	7	8

13.7. Department under FIST / COSIST / any other.

Sl.No	Department	Category	Year of sanction	Amount Sanctioned	Major equipment purchased	Any other info
1	2	3	4	5	6	7

13.8. Department-wise Publications: **(Please refer to 5.1)**

Sl.No	Department	Title of paper	Name of the author/s	Department of the teacher	Name of journal	Year of publication Volumes. Issuee	ISSN number	Impact factor of the journal	Link to the recognition in UGC enlistment of the Journal
1	2	3	4	5	6	7	8	9	10
(Please refer to 5.1)									

13.9. Teacher participation in the Seminars / Conferences/ Work shop/symposia: **(Please refer to 5.7)**

Year	Name of the workshop/ seminar	Number of Participants	Date From – To	Organised by	Whether presented a paper (yes/No) (of yes oral/post)	Link to the Activity report on the website
	(Please refer to 5.7)					

13.10. Faculty visits abroad on academic purpose.

Sl.No	Name of the Department	Name of the teacher	Institution visited & period of visit	Country	Sponsoring agency	Activity undertaken
1	2	3	4	5	6	7

13.11. Awards / distinctions received by the teacher: **(Please refer to 5.5)**

Sl.No	Name of the Department	Name of the teacher	Name of the Award	International/ National / State level	Nature of award	Date
1	2	3	4	5	6	

(Please refer to 5.5)

13.12. Faculty distinction – nominated / elected to State / National / International bodies: **(Please refer to 5.5)**

Sl.No	Name of the Department	Name of the teacher	Membership / Distinction earned	Organization	International / National / State level
1	2	3	4	5	6
(Please refer to 5.5)					

13.13. Collaborative academic programs with other universities / organizations / industries/abroad : **NONE**

Sl.No	Name of the Department	Name of the program	Nature of Collaboration	Collaborating organization & Country	Objectives of MoU	Date of MoU
1	2	3	4	5	6	7

13.14 No. of M.Phil/ Ph.D scholars admitted /awarded during the year 2021-2022 (01.04.2021-31.03.2022)

S.NO	Dept. Name	Registration No.	Name	Supervisor name	Male/ Female	Caste (OC,BC-(A,B,C, D,E),SC, ST)	MINORITY	PWD (YES/ NO)	Title of thesis	Fellowship type	Fellowship granting agency	Duration of fellowship	QUALIFYING EXAM/ADMISSION TYPE (OU,SET,NET CSIR UGC, OTHERS)	Awarded Date
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1	2	3	4	5	6	7	8	9	10	11	12	13	14	15

Ph.Ds Awarded:

Sl.No	Name of the Department	No. of Ph.Ds. degrees awarded	No. tested with plagiarism software
1	2	3	4
	Chemistry	28	28

Prof. Utkoor Umesh Kumar

S.No	Name	Academic Year/ Degree awarded	Title of the PhD Thesis
1	K. R. VIJAYAPAL REDDY Reddy	2021	Synthesis of Some of Dimethyl-Tetrahydro Benzo cycloheptenone Derivatives And Multicomponent Construction of Novel Heterocyclic Scaffolds
2	K. CHANDRA REKHA	2022	A Novel Green Synthesis of Silver and Gold Nanoparticles, Characterization and applications.
3	VIJAYA SHEKAR PULUSU	2022	Co-Fe Prussian Blue Analogue and Silica Supported Acids as Efficient Catalysts for Certain Electrophilic Aromatic Substitution Reactions Under Solvothermal And Solvent Free Conditions

Prof. P. Leelavathi

S.No	Name	Academic Year/ Degree awarded	Title of the PhD Thesis
1	J. Soumya	Jan- 2022	Rational design, synthesis and biological evaluation of newer quinoline based hybrid heterocycles
2	P. Bharath Kumar Reddy	Feb - 2022	Synthesis of novel quinoline based heterocyclic compounds and their biological evaluation

Prof. P. Saritha Reddy

S. No	Name	Academic Year/ Degree awarded	Title of the PhD Thesis
1.	Dr. M.Sravanthi	2022	Binary and Ternary Schiff Base Transition metal complexes derived from o-hydroxyacetophenone – Synthesis, Spectral,DNA interaction, Biological, Kinetic and In Vivo anti-inflammatory studies
2.	Dr. A. Srinivas Reddy	2022	Development of suitable Analytical methods for identification of base alcohol in liquors and adulterants in toddy.

Prof. Boda Sakaram

S.N o	Name	Academic Year/Degree awarded	Title of the PhD Thesis
1	Kurumanna Adem	August 2021	A Facile Synthesis Of Some New-1,8-Naphthyridinyl Hetero Cycles and Their Biological Screening

Dr. P. Muralidhar Reddy

S. No	Name	Academic Year/ Degree awarded	Title of the PhD Thesis
1.	N. Naresh Reddy	July, 2021	“Design, Synthesis, Anticancer Evaluation and Molecular Docking Studies of New Uracil Based Five Membered Heterocycles”
2.	Siram Siddappa	September, 2021	Synthesis, Characterisation and Applications of Rocket Propellants and Zeolite Encapsulated Metal Complexes
3.	Ananthula Sanjeev	March, 2022	Stability Indicating Analytical Method Development and Validation of Selected Drugs by Using RP-HPLC and LC-MS Techniques

Dr. Raju J. Reddy

S. No	Name	Academic Year/ Degree awarded	Title of the PhD Thesis
1	Dr. Md. Waheed	2022/PhD	Development of novel methodologies for the synthesis and applications of thiosulfonates: a facile construction of 4,5-disubstituted-1,2,3-triazoles, submitted on 25-01-2022 and awarded on 05-July-2022.
2	Dr. A. Shankar	2022/PhD	Studies Towards the Synthesis of N-Sulfonyl Triazoles, Allyl Sulfones and C3-Functionalized Imidazo[1,2-a]pyridines under Metal-Free Conditions, submitted on 29-Apr-2022 and awarded on 18-Nov-2022.

13.15. Department –wise M.Phils awarded : **COURSE IS NOT OFFERED BY THE DEPARTMENT**

Sl.No	Name of the Department	No. of M.Phils. degrees awarded	No. tested with plagiarism software
1	2	3	4

13.16. Faculty on editorial board of refereed research journals. **NONE**

Sl.No	Name of the Department	Name of the Teacher	Status on the Editorial Board	Name of the Journal	ISSN Number	Periodicity of Publication	Year of inception of the Journal	Impact factor of the Journal
1	2	3	4	5	6	7	8	9

13.17. Number of Patents applied for and obtained

Sl.No	Name of the Department	Name of the Teacher	Title of patent filed	Filed/Approved/Granted	National / International	Country Name	Patent Registration Number
1	2	3	4	5	6	7	8
1.	Chemistry	P. Muralidhar Reddy	Novel Sensitive and Advanced Clinical Mass Spectrometry Kit for Evaluation of Vitamin-D Deficiency	Bundesrepublik Deutschland	International	German	20 2022 105 300 IPC: G01 33/82
2.	Chemistry	P.Jalapathi	Antiproliferative 1,2,3-Triazole Analogues	Approved	National	INDIA	202241026111
3.	Chemistry	P.Jalapathi	Antiproliferative-active Piperzino methyl Triazole compounds	Approved	National	INDIA	202241033244

13.18. Consultancy projects/ Services : **NONE**

Sl.No	Name of the Department	Name of the Teacher	Title of project	Organization	National/ International	Country	Nature of Consul	Funds Sanctioned	Funds Released till now	Sanctioned Date(or)Com	Ongoing /
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	t						tancy			pleted Date	Comple ed
1	2	3	4	5	6	7	8	9	10	11	12

13.19. No. of courses in which project work is introduced as part of the courses. **NONE**

Sl.No	Name of the Department	Name of the Courses	Duration of the project work	Sponsoring agency	No. of credits given
1	2	3	4	5	6

15. Student Performance profile – Statistical data

15.9 Analysis of student performance at entry level and exit level

Sl.No	UG / PG	Name of the Faculty	Average marks in the qualifying exam at entry level	Average marks in the qualifying exam at exit level
1	2	3	4	5
1. University Colleges				
	A) UG	1		
		2		
		3		
		4		
		5		
	B) PG			
		1		
		2		
		3		

		4		
		5		
2. Affiliated Colleges				
	A) UG	1		
		2		
		3		
		4		
		5		
	B) PG	1		
		2		
		3		
		4		
		5		

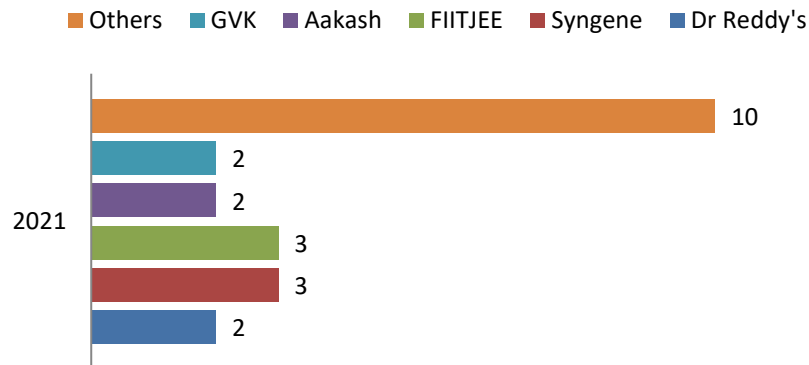
15.21 Students qualified in NET / SLET etc., **NONE**

Sl.No	Subject	No. of students qualified				
		NET	TSSET	UPSC Civil Services	TSPSC G-1	Total
1	2	3	4	5	6	7
1						

Any other information:

Students in general are placed every year with 10-15% - Industries such as Heterodrugs, Mylan, MSN labs, Suven life sciences, GVK Bio, Dr Reddys, Syngene laboratories etc 20-30% - Educational Institutions as Lecturers including placements from Akash institutions, FIIT-JEE etc., 40% - pursue Research.

Student Placements



STUDENTS ACHIEVEMENTS

- 1 Ms. Akshata Ms. Priya Sharma & Ms. Sushmitha of 2020-22 batch, MSc II yr have won first prize in the National Science Day quiz competitions held at the Dept. of Physics on 25th Feb'22.
- 2 Mr K Venkatesh, Ms Snehitha Reddy & Mr Vamshidhar won I prize in Chem quiz, Mr Hanumanth, Mr Naveen (MSc I yr) & Ms Divya won II prize in Chem quiz; Ms Akshata & Ms Priya Sharma won I prize and consolation prize in Just a minute event; Mr Sainath & Mr M Sandeep and Mr Fazil won II Prize and consolation prize respectively in e-Poster competitions of the CHEMFEST organized as a part of national science day celebrations held on March 5th 2022 at the Dept. of Chemistry, UCS, OU
- 3 Ms Akshata, Ms Hafsa Jabeen, Ms Divya, Ms Navyasree of MSc II yr got selected for the final rounds of Tutoroot Placements recently in April 2022.
- 4 Mr Tahirali Choudhary of MSc II yr was selected Summer Fellowship 2022 at IIT Bombay, FOSSEE SOUL

Signature
Head of the Department