

**DST PURSE Centre
Sri Venkateswara University Tirupati-517502**

Amount Sanctioned by DST (Nonrecurring and recurring)

Date and ref No. of DST Sanction Letter : SR/PURSE/Phase 2/19(G), Dated:25-09-2017.

Total grant sanctioned under this programe : Rs. 17,00,00,000-00

Amount Released during the financial year 2017-2019: Rs. 7,02,76,986-00

Major equipment procured : Nil

Proposed New Equipment : TEM (Transmission Electron Microscope)

Names of Science&Engineering Departments participated in PURSE

- Department of Virology
- Department of Biochemistry
- Department of Biotechnology
- Department of Home Science
- Department of Zoology
- Department of Microbiology
- Department of Botany
- Department of Chemistry
- Department of Environmental Sciences
- Department of Physics
- SVU Instrumentation Centre
- SVU College of Pharmacy
- SVU College of Engineering
(Civil, Mechanical, Chemical, Computer Science, Electronics & Communications)

No.of Faculty Members, researchers and students involved in PURSE

No.of Faculty Members: 45

No. of researchers and students: 650

Total manpower benefitted: 50

| | | |
|-----------------------|----------------|--------------------------|
| M. Praveena | Zoology | Prof. K. JayanthaRao |
| E. Anjaneyulu | Bio chemistry | Dr. M. Balaji |
| I. Rama Manohar Reddy | Bio Technology | Prof. T.Vijaya |
| P. Vijaya Kumar | Bio chemistry | Prof. O.V.S. Reddy |
| M. Ram Kumar | Zoology | Prof. G. Raja Rami Reddy |
| B. Mallikarjuna | Botany | Prof. G. Rama Gopal |
| K. Shivajee Ganesh | Physics | Prof. O. M. D. Hussain |
| O. VenkataSubbaRaju | Chemistry | Dr. Y. V. Rami Reddy |
| C. Sampath | Chemistry | Prof. C. VenkataRao |
| D. Soumya | Virology | Prof. D. V. R. SaiGopal |
| | | Dr. T. Madusudhana |
| B. Praveen Kumar | Chemistry | Reddy |
| C. Bhuvaneswar | Zoology | Prof. W. Rajendra |
| C. Kumara Swamy Naidu | Zoology | Dr. Y. Suneetha |
| T. BhanuPrakash | Chemistry | Prof. U. Padmavathi |
| R.Muni Kishore | Chemistry | Dr. A Padmaja |
| Tharanath.V | Virology | Prof. D. V. R. SaiGopal |
| B. Suman | Bio chemistry | Prof. K. Thyagaraju |
| S. ChennaKesava Reddy | Home Science | Dr. K.V. Sucharitha |
| A. Sreedhar | Physics | Prof.S. Uthanna |
| N. Kiran | Physics | Prof.S. Uthanna |
| K. VenkataSubbaiah | DST PURSE | Prof. D. V. R. SaiGopal |
| Y.SubbaRao | DST PURSE | Prof. A.Varada Reddy |
| K Peddanna | DST PURSE | Prof. Ch. AppaRao |
| M Saritha | DST PURSE | Prof. Ch. AppaRao |
| Swathi | DST PURSE | Prof. W.Rajendra |
| A Lakshmi Devi | DST PURSE | Prof. D. V. R. SaiGopal |
| Bhavaneeswari | DST PURSE | Prof. D. V. R. SaiGopal |
| Shalini | DST PURSE | Prof. D. V. R. SaiGopal |
| Dileep Kumar | DST PURSE | Prof. D. V. R. SaiGopal |
| S Reddi Prasad | DST PURSE | Prof. D. V. R. SaiGopal |
| K Praveena | DST PURSE | Prof. D. V. R. SaiGopal |
| Priyanka | DST PURSE | Dr.KManjula |
| Sandya | DST PURSE | Prof. D. V. R. SaiGopal |
| Rekha | DST PURSE | Prof. Savithramma |
| KedamVenkataSubbaiah | DST PURSE | Prof. Savithramma |

More than 40 research scholars have been benefitted and got awarded PhD's at SVU.

Photographs of Major Research facilities established under PURSE.



NMR 400MHz Jeol India



ICP-OES-8000 Perkin Elmer



Ultracentrifuge Optima XPN-100
Beckman



AFM-Edegetech Solver
Next



Particle Size Analyzer SZ-
100 Horiba



Ultra Pure Water System Milli Q
Direct 8 Elix



Fluorescence Microscope
Olympus-Bx53



Real Time PCR ABA
System Step one plus



Nano Drop-8000 Thermo
Scientific



-80°C Ultra Low Freezer



Bio safety Cabinet level-IIA



Bacteriological Incubator-Labline

Thrust Areas strengthened with PURSE Support, Research highlights

Proposed Research Activities:

The main objectives of the programme-

- **Biological Sciences-** Biotic and Abiotic molecules and their health effects and therapeutic applications.
- **Physical Sciences** - Material research for the development of micro and nanodevices.
- **Engineering Sciences-** Metals, soils, Structure investigations; scheduling, modeling, simulation of welding and advanced computing related to industry

Research Activities Studied:

- Bio-inspired Multifunctional Zinc Oxide nanoparticles by leaf extract of *Andrographis pilifolia* and their enhanced Antioxidant, Antimicrobial and Antidiabetic activity - A 3-in-1 System
- Microstructural and electrochemical properties of $\text{Ni}(\text{OH})_2$ electrodes for supercapacitor applications
- Synthesis of Biologically Active Organophosphonates.
- Tapping the Plant Source for the Production of Bio-nanoparticles; Characterization and Evaluation for Their Potential Applications in Groundnut Crop Fields.
- Studies on the Development of an efficient Protocol for *in vitro* Propagation of *Actinodaphnema deraspatana* Beed. ex Hook. fil and Synthesis of Nanoparticles and their Potential Applications.
- Detoxification Effect of Dietary Polyphenols- A Product and Process Development.
- Synthesis, Characterization of Metal oxide Nanoparticles and their Applications.
- Isolation and Screening of Pectinolytic Bacteria from Soil Disposed with Mango Pulp Waste.
- Synthesis of Bio-inspired Silver Nanoparticles by Ripen and Unripe Fruit extract of *Tinosporacordifolia* and its Antioxidant, Antibacterial and Catalytic Activities.

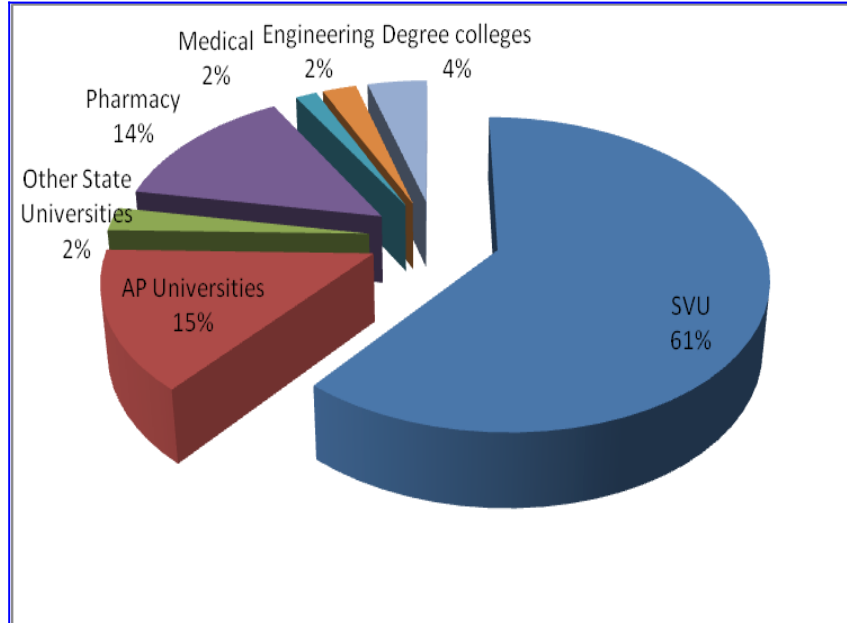
Utilization of DST-PURSE Facilities:

The major equipments procured are being utilized effectively by S.V. University (70%) and by outside universities / institutions (30%).

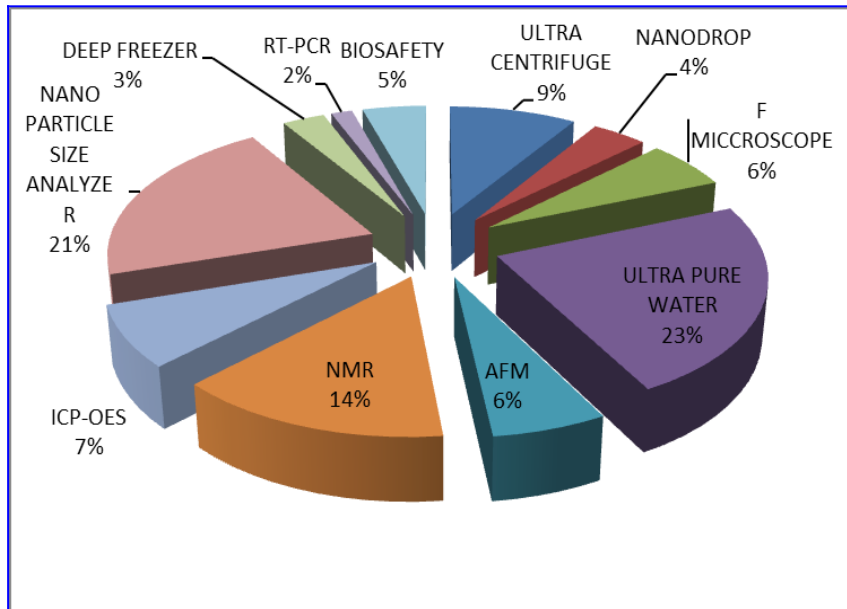
- **Universities/Colleges within Tirupati:** S.V. Veterinary University, SVIMS University, SP Mahila University, S.V. Medical College, S.V. Agriculture College, S.V. Ayurvedic College, S.V. Arts College, Sri Vidyanikethan college of Pharmacy and Biotechnology, Seven Hills Pharmacy College, Krishna Teja Pharmacy and Dental Colleges.
- **Institutions-** IIT-Tirupati, IISER- Tirupati.
- **Universities with in Andhra Pradesh:** Andhra University, Visakhapatnam; Acharya Nagarjuna University, Guntur; S.K. University, Anantapuram; Yogi Vemana University, Kadapa; Vikrama Simhapuri University, Nellore; Dravida University, Kuppam; Rayalaseema University, Kurnool.
- **Universities outside the Andhra Pradesh:** Periyar University, Salem; Bharath University, Chennai; Vels University, Chennai; VIT, Vellore; Thiruvalluvar

University, Vellore; Annamalai University, Tamilnadu.

UTILITY OF EQUIPMENT BY THE INSTITUTES



EQUIPMENT WISE UTILITY



Write-up on how PURSE has transformed the University

The Research activities are integrated with other Departments of SV University – Virology, Botany, Biochemistry, Biotechnology, Zoology, Physics, Chemistry, Environmental Science, Aqua Culture, Pharmacy, Animal Biotechnology, Bioinformatics, Microbiology and Home Science. The Research objectives of the DST-PURSE Programme are being carried out in different areas of Physical and Biological Sciences in respective departments. The main objectives of the programme are Physical Sciences – Material research for the development of micro and nano devices; Biological Sciences – Biotic and Abiotic molecules and their health effects and Therapeutic applications. The present research activities are as follows: green synthesis of nano particles and applications, antiviral activities of various bio-molecules by In vitro against certain human and animal viruses, isolation and screening of compounds from herbal origin for anti diabetic and anti hyperlipidemic activities, synthesis, characterization and evaluation of antioxidant activities of novel molecules, In silico analysis of cancer susceptibility genes, optimization and production of enzymes by using micro organisms through solid state and submerged fermentation, transgenic approach for heavy metal detoxification through plants, development of biogenic processed foods from prickly pear fruits, neurodegenerative and behavioral studies in animal models, comparison of different immuno – histological biomarkers in breast cancer patients. Physical sciences - Micro structural and electrical and optical chemical properties of various thin films, ion doped sodium – lead borophosphate lasses for red source laser applications, substrate bias influenced physical behavior of nanocrystalline silver copper oxide films, studies on carbonyl derivatives, surface thermodynamic properties of drugs, studies on uprolides by metathesis approaches. The DST-PURSE facilities had improved the quality of the research in our University and enhanced the best publications has published in Indexed journals with good impact factor. More than 200 research publications had acknowledged the SVU DST-PURSE facilities in their research publications. Due to enhanced research activity some of the faculty has submitted the Patent registration at Indian level.

Patents filed by the University as a result of PURSE grant.

1. **Indian patent** – Title of the invention: “*A Process for Manufacturing of Conditioned Graded and Packed (Cgp) Sand,*” Registered and published. Reg.no:744/CHE/2013 and filling date 25/02/2013.
2. **Indian patent** – Title of the invention: “*A process for manufacturing of blended fruit squash with Prickly year (Opuntiaficusindica and Opuntiadillenii) fruit and lemon juice*”. Patent Reg.no: 4485/CHE/2014 and fillig date 15/09/2014.
3. **Indian patent-** Title of the invention: “*Production of Alcohol (Naturo-Hol) from Agave albomarginata*”. Patent application numberof is 4352/CHE/2015 with the filing date of 20/08/2015.
4. **Indian patent-** Title of invention: “*Extraction of fish liver oil for treating viral infections*”, Patent applications submitted for registration dated 29/04/2015.

5. **Australian patent**-Title of Invention “*Computer-aided molecular docking, physicochemical and ADMET properties of novel bromopyrimidine analogues as potential anti-cancer agents*” Patent number: 2021106703 Registered and granted.

6. **International patent:** Title of the invention:” Green synthesis, computer –aided drug design, physicochemical, and ADMET properties of novel sulfonamides as potential antimicrobial drugs” Patent application number of is PCT/IB2021/059083 with the filing date of 04/10/2021.

Papers Published (Details are given in Annexure-I) during the last 5 years: 70

Total aggregate Impact factor: 148.142

Name & Contact details for the PURSE Coordinator of the University

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Annexure-I

1. SusmilaAparnaGaddam, **VenkataSubbaiahKotakadi**, GunasekharKalavakuntaSubramanyam, JosthnaPenchalaneni, Varadarajulu Naidu Challagundla, VisweswaraRaoPasupuleti. (2021) [Multifaceted phytogenic silver nanoparticles by an insectivorous plant Drosera spatulata Labill var. bakoensis and its potential therapeutic applications](https://doi.org/10.1038/s41598-021-01281-8). **Scientific Reports**11, 21969 (2021). <https://doi.org/10.1038/s41598-021-01281-8>(**Impact Factor: 5.133**)
2. GunasekharKalavakuntaSubramanyam, SusmilaAparnaGaddam, **VenkataSubbaiahKotakadi**, JosthnaPenchalaneni, SashikiranPalithya, Varadarajulu Naidu Challagundla(2021).[Argyrea nervosa \(Samudra pala\) leaf extract mediated silver nanoparticles and evaluation of their antioxidant, antibacterial activity, in vitro anticancer and apoptotic studies in KB oral cancer cell lines](https://doi.org/10.1080/21691401.2021.1996384). **Artificial Cells, Nanomedicine, and Biotechnology**.An International Journal, Volume 49, 2021 - Issue 1 pages 635-650. <https://doi.org/10.1080/21691401.2021.1996384>(**Impact Factor: 6.3**),
3. **Venkata S. Kotakadi**, SusmilaAparnaGaddam, PeddanaKotha, RajasekarAllagadda, AppaRaoCh, and SaiGopal D. V.R.(2021). [Bio-inspired multifunctional zinc oxide nanoparticles by leaf extract of Andrographis serpilifolia and their enhanced antioxidant, antimicrobial, and antidiabetic activity—A 3-in-1 system](https://doi.org/10.1080/02726351.2021.1966145). **Particulate Science and Technology**, 2021. Taylor and Francis <https://doi.org/10.1080/02726351.2021.1966145>(**Impact Factor: 2.356**)
4. SaikiranAita, Vishnu NayakBadavath, **Mohan Gundluru**,MuraliSudileti, Bakthavatchala Reddy Nemallapudi, SravyaGundala, GrigoriyVasilievichZyryanov, Naga RajuChamarti, Suresh Reddy Cirandur, Novel α -Aminophosphonates of Imatinib Intermediate: Synthesis, Anticancer Activity, Human Abl Tyrosine Kinase Inhibition and Drug-Likeness Prediction, **Bioorganic Chemistry** **109**, **104718**, **2021**. **Impact Factor: 5.275**
5. SashikiranPalithya, SusmilaAparnaGaddam, **VenkataSubbaiahKotakadi**, JosthnaPenchalaneni, NarasimhaGolla, Suresh Babu Naidu Krishna, C. V. Naidu(2021) [Green synthesis of silver nanoparticles using flower extracts of Aerva lanata and their biomedical applications](https://doi.org/10.1080/02726351.2021.1919259). **Particulate Science and Technology**, 2021. <https://doi.org/10.1080/02726351.2021.1919259>. (**Impact Factor: 2.356**)
6. Jaya Prakash N, Ramesh babu, **VenkataSubbaiahKotakadi** (2021). Analytical Standardization of KaphaketuRas. (2021) *Int. J. Pharm. Sci. Rev. Res.*, Volume. 67, Issue.1,Pages 125-130.
7. SashikiranPalithya, SusmilaAparnaGaddam, **VenkataSubbaiahKotakadi**, JosthnaPenchalaneni, Varadarajulu Naidu Challagundla (2021). [Biosynthesis of silver nanoparticles using leaf extract of Decaschistia crotonifolia and its antibacterial, antioxidant, and catalytic applications](https://doi.org/10.1080/17518253.2021.1876172). **Green Chemistry letters and Reviews** **Volume.14,Issue.1Pages.136-151**.Taylor and Francis (**Impact Factor: 4.990**),<https://doi.org/10.1080/17518253.2021.1876172>.
8. LokanathaOruganti, Karunakaran Reddy Sankaran, HarithaGoudDinnupati, **VenkataSubbaiahKotakadi**, BalajiMeriga.(2021).[Anti-adipogenic and lipid-lowering activity of piperine and epigallocatechin gallate in 3T3-L1 adipocytes](https://doi.org/10.1080/17518253.2021.1876172). **Archives of**

- Physiology and Biochemistry, 2021.** <https://doi.org/10.1080/13813455.2021.1908366>.
(Impact Factor: 4.076).
9. SanthisudhaSarva, RenukaDunnutala, SreekanthTellamekala, **Mohan Gundluru**, Suresh Reddy Cirandur, Green Synthesis and Antimicrobial Activity of Substituted diethyl (((5-(ethylthio)-1,3,4-thiadiazol-2-yl)amino)(phenyl)methyl)phosphonates, **Synthetic Communications (Accepted 2021). DOI: 10.1080/00397911.2021.2020844. Impact Factor: 2.007**
 10. YasminHaroonShaik, VenkataramaiahChintha, **Mohan Gundluru**, SanthisudhaSarva, Suresh Reddy Cirandur, An efficient Nano-FGT Catalyzed Green Synthesis of α -aminophosphonates and Evaluation of Their Antioxidant, Anti-inflammatory Activity and Molecular Docking studies, **Synthetic Communications (Accepted 2021). DOI: 10.1080/00397911.2021.2007402. Impact Factor: 2.007**
 11. Kiran Kumar Reddy Mallu, **Mohan Gundluru**, SanthisudhaSarva, BalajiKodigutta, and Suresh Reddy Cirandur, One-pot Green Synthesis of Functionalized 2-Methyl-7-(substituted phenyl)-5-phenylpyrazolo[1,5-a]pyrimidine Derivatives, **Russian Journal of Organic Chemistry (Accepted 2021). Impact Factor: 0.723**
 12. Kiran Kumar Reddy Mallu, **Mohan Gundluru**, SanthisudhaSarva, Suresh Reddy Cirandur, Synthesis and Antimicrobial Activity Studies of Diethyl ((substituted phenyl)(5-hydroxy-3-methyl-1-phenyl-1H-pyrazol-4-yl)methyl)phosphonates, **Russian Journal of General Chemistry (Accepted 2021). Impact Factor: 0.868**
 13. NadiveedhiMaheshwara Reddy, NuthalapatiPoojith, **Gundluru Mohan**, Yanamula Mohan Reddy, KallimakulaVenkatareddySaritha, PasupuletiVisweswaraRao, AvulaVijaya Kumar Reddy, VallelaSwetha, GrigoryVasilievichZyryanov, BalamSatheesh Krishna, Cirandur Suresh Reddy, Green Synthesis, Antioxidant Activity, Plant Growth Regulatory Activity, Molecular Docking, QSAR, ADMET and Bioactivity Evaluation Studies of Novel α -Furfuryl-2-alkylaminophosphonates, **ACS Omega 6(4), 2934-2948, 2021. Impact Factor: 3.512**
 14. MahammadSadikShaik, Maheshwara Reddy Nadiveedhi, **Mohan Gundluru**, SanthisudhaSarva, RajasekharAllagadda, AppaRaoChippada, NagarajuChamarthi, Suresh Reddy Cirandur, Green Synthesis of Phosphoramidates and Evaluation of Their α -Amylase Activity by *In silico* and *In vitro* studies, **Synthetic Communications 2021, 51(8), 1218-1231. Impact Factor: 2.007**
 15. MahammadSadikShaik, Maheshwara Reddy Nadiveedhi, **Mohan Gundluru**, UmamaheshKatike, VijayaSarathi Reddy Obulam, Suresh Reddy Cirandur, Efficient Catalyst Free Green Synthesis and In vitro Antimicrobial, Antioxidant and Molecular Docking Studies of α -Substituted Aromatic/HeteroaromaticAminomethyleneBisphosphonates, **Synthetic Communications 2021, 51(5), 741-764. Impact Factor: 2.007**

16. G. Sravya, A. Balakrishna, Grigory V Zyryanov, **G. Mohan**, C. Suresh Reddy, N. Bakthavatchala Reddy, Synthesis of aminophosphonates by the Kabachnik-Fields reaction, **Phosphorus, Sulfur, and Silicon and the Related Elements**, 196(4), 353-381, 2021. **Impact Factor: 1.082**
17. ManjulaAdoni, MrunaliniYadam, SusmilaAparnaGaddam, UshaRayalacheruvu, and **Venkata S Kotakadi**. [Antimicrobial, Antioxidant, and Dye Degradation Properties of Biosynthesized Silver Nanoparticles From Artemisia Annu L.\(2021\).Letters in Applied NanoBioScience](https://doi.org/10.33263/LIANBS101.19811992).Vol.10,Issue.1,2021,pages:1981-1992.<https://doi.org/10.33263/LIANBS101.19811992>.
18. *NagarajuRajuVallepu, SusmilaAparnaGaddam, VenkataSubbaiahKotakadi, PenchalaPratapGoli, SaiGopal D. V. R., SudarsanamGudivada.* (2020)[Biogenic silver nanoparticles can be an effective and efficient water purification agents of future. Inorganic and Nano-Metal Chemistry](https://doi.org/10.1080/24701556.2020.1817940)<https://doi.org/10.1080/24701556.2020.1817940> (**Impact factor: 1.716**).
19. S. R. Palle, J. Penchalaneni, K. Lavudi, S. A. Gaddam, **V. S. Kotakadi**, V. N. Challagundala(2020). [Green synthesis of silver nanoparticles by leaf extracts of boerhavia erecta and spectral characterization and their antimicrobial, antioxidant ad cytotoxic studies on ovarian cancer cell lines.](https://doi.org/10.33263/LIANBS93.11651176) Letters in Applied Nano Bio Science, 2020, **Volume 9, Issue 3, 2020, 1165 - 1176.** <https://doi.org/10.33263/LIANBS93.11651176>,
20. **Gundluru Mohan**,Sumit Kumar, Murali Sudileti, Chadive Sridevi, Pannuru Venkatesu and Cirandur Suresh Reddy, Excellency of pyrimidinyl moieties containing α -aminophosphonates overbenzthiazolyl moieties for thermal and structural stability of stem bromelain, **International Journal of Biological Macromolecules** 2020, 165, 2010-2021. **Impact Factor: 6.953**
21. **Mohan Gundluru**, Vishnu Nayak Badavath, Yasmin Shaik Haroon, Murali Sudileti, Bakthavatchala Reddy Nemallapudi, Sravya Gundala, Grigory V. Zyryanov andSuresh Reddy Cirandur, Design, synthesis, cytotoxic evaluation and molecular docking studies of novel thiazolyl α -aminophosphonates, **Research on Chemical Intermediates** 2020, 47 (3), 1139–1160. **Impact Factor: 2.914**
22. **Gundluru Mohan**,SarvaSanthisudha, SudiletiMurali, TellamekalaSreekanth, **YakkateSubbaRao**, NemallapudiBakthavatchala Reddy and Cirandur Suresh Reddy,Design and Synthesis of Diethyl(substituted 2-benzylbenzofuran-3-yl)phosphonates as Antioxidant and Antimicrobial Agents,**Journal of Heterocyclic Chemistry** 2020, 57(3), 1414-1427. **Impact Factor: 2.192**
23. V. R. Netala, M.S. Bethu, Sana Sivasankar, DugginaPragathi, **Venkata S Kotakadi**, V. Tartte(2020).[Eco-friendly synthesis of silver nanoparticles using leaf extract of Flemingia wightiana: spectral characterization, antioxidant and anticancer activity studies.](https://doi.org/10.1007/s42452-020-2702-7) SN Applied Sciences, 2, Article number: 884 (2020).Springer Nature. <https://doi.org/10.1007/s42452-020-2702-7>.
24. P Shaikshavali, T Madhusudana Reddy, T VenuGopal, G Venkataprasad, **Venkata S Kotakadi**, VN Palakollu, R Karpoormath.(2020)[A simple sonochemical assisted synthesis of nanocomposite \(ZnO/MWCNTs\) for electrochemical sensing of Epinephrine in human serum and pharmaceutical formulation.](https://doi.org/10.1007/s42452-020-2702-7) Colloids and Surfaces A: Physicochemical and

- Engineering Aspects** 584: page 124038.
<https://doi.org/10.1016/j.colsurfa.2019.124038>(**Impact Factor: 4.539**)
25. Praveena Kanagala, Susmila Aparna Gaddam, Priyanka Gunji, Venkata Subbaiah Kotakadi, Chandra Mouli Kalla, Vijaya Tarte, Divi Venkata Ramana Sai Gopal (2020). [Synthesis of Bio-Inspired Silver Nanoparticles by Ripe and Unripe Fruit Extract of *Tinosporacordifolia* and Its Antioxidant, Antibacterial and Catalytic Studies](#). *Nano Biomed. Eng.*, 2020., Vol.12. Issue.3 Pages:214-226. Oahost Publisher doi: 10.5101/nbe.v12i3.p214-226. (**Impact Factor: 1.697**)
 26. Madhu Kumar Reddy Kandula, Mohan Gundluru, Bakthavatchala Reddy Nemallapudi, Sravya Gundala, Peddanna Kotha, Grigory V Zyryanov, Sridevi Chadive, Suresh Reddy Cirandur, Synthesis, Antioxidant activity and α -glucosidase enzyme inhibition of α -aminophosphonate derivatives bearing piperazine-1,2,3-triazole moiety, *Journal of Heterocyclic Chemistry* 2020, 58(1), 172-181. **Impact Factor: 2.192**
 27. Mahammad Sadik Shaik, Maheshwara Reddy Nadiveedhi, Mohan Gundluru, Ananda Kumar Reddy Narreddy, Krishna Reddy Thathireddy, Ranjani Ramakrishna, Suresh Reddy Cirandur, 2-Amino-3-cyano-4H-chromene-4-ylphosphonates as Potential Antiviral Agents: Synthesis, *In ovo* and *In silico* Approach, *Journal of Heterocyclic Chemistry* 2020, 58(1), 137-152. **Impact Factor: 2.192**
 28. Sreelakshmi Poola, Mohan Gundluru, Maheshwara Reddy Nadiveedhi, Madhusudhana Saddala, Prasada Rao P T S R K, and Suresh Reddy Cirandur, Microwave-assisted synthesis, molecular docking and biological evaluation of α -thiazolyl aminomethylene bisphosphonates, *Phosphorus, Sulfur, and Silicon and the Related Elements* 2020, 195(5), 409-420. **Impact Factor: 1.082**
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 31. Vinayagam Ramachandran, Mariadoss Arokia Vijaya Anand, Ernest David, Karthikkumar Venkatachalam, Shalini Vijayakumar, Vijayalakshmi Sankaran, Agilan Balupillai, Casimeer C Sangeetha, KM Gothandam, Venkata Subbaiah Kotakadi, Alaa Ghidan, Tawfiq Al Antary, Baojun Xu. (2020). [Antidiabetic activity of gold nanoparticles synthesized using wedelolactone in RIN-5F cell line](#). *Antioxidants*, Vol.9 Issue.1 pages.8. (**Impact Factor: 6.313**).<https://doi.org/10.3390/antiox9010008>
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Details of Workshops/Seminar organized out of PURSE (Photographs may be incorporated)

1. The DST-PURSE Centre organized twodays workshop on“**Patenting**” from 3rd to 4thSeptember,2018. Faculty, Scientists, Research Fellows and Students of various disciplines from Biological, Physical, Pharmaceutical Sciences and Engineering were participated.
2. Scientific talk given by Eminent Scientist Dr.Christian Behn, International Scientist, INTAVIS, Germany on 6th August 2018 on “**In-situ Hybridization and Immuno Histology**” .

3. Interaction programme organized on **“United States of America Consulate Exchange Programs and opportunities for Students and Faculty”** by the Eminent Counsellor Mr.T.Senthil Kumar- Cultural Affairs Assistant, Affairs Section U.S Consulate General, Hyderabad on 28th September 2018.
4. Scientific talk on **“Sensitization on the Impact Factor of Research Publications & Swot Analysis”** by Eminent Scientist Dr. V. Rajagopal, Former Director CPCRI, Kerala on 13th November 2018.
5. Scientific talk on **“Molecular Imprinted Polymers in Therapeutic Monitoring and Allied Healthcare Applications”** by Dr.Yasuo Yoshimi, Professor and Head, Dept. of Chemical Engineering, Sabubura Institute of Technology, Tokyo, Japan on 22nd November 2018.
6. Scientific talk on **“Fungal Plasticity and Microbiome Shifts during Phymatotrichopsis Root Rot Disease”** by Dr.Prasanna Kankanala, Noble Research Institute, LLC, Ardmore, Oklahoma, USA on 17th December 2018.
7. Scientific talk on **“Nano Materials Nano Composites as Catalyst for Synthesis and Water Treatment”** by Prof. Sreekanth B Jonnalagadda, School of Chemistry & Physics, University of Kwazulu-Natal Durban, South Africa on 8th January 2019.
8. DBT-RRSFP Workshop on **“Modern Techniques in Molecular Biology (MTMB-2019)”** was organized at DST-PURSE Centre from 31st May to 4th June, 2019.

DST-PURSE PHOTO GALLERY

Guest Faculty:

| | | |
|--------------------------|--|---|
| Dr.SwamyAnantheswaran | Professor of Food Engineering & Director for Education by Non-Traditional Delivery, The Pennsylvania State University, University Park, Pennsylvania, US |  |
| Prof. Balaji Prakash | Principal Scientist and Head, Dept. of Molecular Nutrition, CSIR-Central Food Technological Research Institute (CFTRI) Mysore- 570 020, Karnataka, India |  |
| Dr.Christian Behn | International Scientist, INTAVIS, Germany |  |
| Mr. O.Prasad Rao | Deputy Controller of Patents and Designs, Government of India, Department of Industrial Policy & Promotion, Chennai. |  |
| Dr.B.Deepa | Indian Registered Patent Attorney, Advocate Madras High Court Intellpat Patent Solution, Chennai | |
| Mr.T. Senthil Kumar | Cultural Affairs Assistant, Public Affairs Section , U.S. Consulate General, Hyderabad | |
| Dr.Yasuo Yoshimi, Ph.D., | Professor of Chemical Engineering, Shibaura Institute of Technology, Toyosu Koto-ku, Tokyo, Japan |  |
| Dr.Bharath Prithiviraj | Adjunct Faculty, City University, New York, USA |  |
| Dr.Prasanna Kankanala | Noble Research Institute, LLC, Ardmore, Oklahoma, USA |  |

Images of Workshop/Training Programmes Organized by DST-PURSE Centre:

Interaction with Eminent Scientists, Professors and Students at DST-PURSE Centre:







Travel Support for participation in International/National Conferences/Workshops/Seminars: 10