

CURRICULUM VITAE

Dr. Sadanandam Abbagani

DAAD Fellow



**CSIR-Emeritus Scientist, Department of Biotechnology
Kakatiya University, WARANGAL- 506009**

PERSONAL RECORD

Name : Sadanandam Abbagani
Father's Name : Ramchandram
Date of Birth : 10-01-1956

ADDRESS

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ACADEMIC

1973-1976 **B.Sc.** with Botany, Zoology, Chemistry, Osmania University, Warangal, A.P., India.
1976-1978 **M.Sc.** in Botany with Cytogenetics, Kakatiya University, Warangal, A.P., India.
1978-1982 **Ph.D.** in Botany-Experimental Mutagenesis and karyomorphological studies in Capsicum, Kakatiya University, Warangal, A.P., India.

POST DOCTORAL RESEARCH

- At **Max-Planck Institute for Zuchtung Forschung, Koln, Germany** Worked with **Prof. Francisco Salamini, Director**, on protoplast culture and mutant selection in potato (DAAD Fellowship, Germany) 18 months.
- At **State Agricultural Biotechnology Centre, Perth, Australia** Worked with **Prof. MGK. Jones, Director**, on molecular approaches for engineering nematode resistance (Association of commonwealth Development fellowship London) 6 months.
- At **Biological Research Centre, Hungary** Worked with **Prof. Peter Medgyesy Group leader** on PEG Mediated Plastid transformation in tobacco (UNESCO-Biotechnology Action Council Fellowship France) 2 months.
- At **Botanical institute LMU Munich Germany** Worked with **Prof. Reinhold Herrmann**, on knock-outs of PS II genes (DAAD Re-invitation programme) 2 months.

AREA OF SPECIALIZATION: PLANT BIOTECHNOLOGY

PROFESSIONAL HISTORY

- 1982-1992** Lecturer, Department of Botany, Kakatiya University, Warangal, A.P., India.
- 1992-2000** Reader in Tissue Culture, Department of Botany, Kakatiya University, Warangal, A.P., India.
- 2000– 2016** Professor, Department of Biotechnology, Kakatiya University, Warangal, AP, India.
- 2016- 2019** UGC- BSR Faculty Fellow Department of Biotechnology, Kakatiya University, Warangal, TS, India.
- 2019-2021** CSIR-Emeritus Scientist, Department of Biotechnology, Kakatiya University, Warangal, TS, India.

TEACHING EXPERIENCE: 32 Years

RESEARCH EXPERIENCE: 36 Years

RESEARCH SUPERVISION

No of PhD's guided: 30

- Studies on Tissue Culture, Mutant Selection and Root-knot nematode infestations in *Solanum melongena*. **Mr. M.A.Farooqui, SRF CSIR** (1996), Kakatiya University, Warangal.
- Induction and selection of antibiotic resistant markers in members of *Solanaceae*, **Mr. A. Venkateshwar Rao, SRF CSIR; RA CSIR** (1997) Kakatiya University, Warangal.
- *In vitro* studies in certain species of *Solanaceae*, **Miss. T. Jayasree*, SRF UGC; RA CSIR** (1997), Kakatiya University, Warangal.
- Tissue Culture studies on Millets and Chickpea, **Miss. R.V. Ramana, SRF CSIR** (1997), Kakatiya University, Warangal.
- Genetical and Tissue Culture studies on Grain Legumes, **Mr. Ch. Venu** (1997), Kakatiya University, Warangal.
- Tissue Culture and Transformation studies in Mulberry, **Mr. R. Chakravarthy** (2000), Kakatiya University, Warangal.
- Tissue Culture studies in plants important for Sericulture Industry, **Mr. M. Ramesh** (2001), Kakatiya University, Warangal.
- Tissue Culture and Transformation studies in *Solanaceous* crops, **Mr. S. Shyam Prasad** (2002), Kakatiya University, Warangal.
- Genotype x Environment Interaction and phenotypic stability for yield, yield components and physico-chemical characters in promising cultures of Rice (*Oryza sativa* L.), **Mr. Noronha Franky** (2004), Kakatiya University, Warangal.
- Protoplast and transformation studies in Mulberry **Mr. U. Pavan Kumar**, DAAD Fellow** (2006), Kakatiya University, Warangal.
- *In vitro* Mutagenesis, tissue culture and Nematode infestation in Tomato *L.esculentum* **Mrs. K. Suneetha** (2006), Kakatiya University, Warangal.
- Tissue culture and transformation studies in egg plant (*Solanum melongena* L.) **Mr. K. Srinivas Reddy** (2008), Kakatiya University, Warangal.
- Transformation studies in Solanaceous plants **Mr. K. Venugopal Rao SRF CSIR, CAS-TWAS Fellow** (2010), Kakatiya University, Warangal.
- Biochemical and Molecular investigations on Plant – Nematode interactions **Mr. V. Anil Kumar** (2010), Kakatiya University, Warangal.

- Tissue culture and Genetic transformation studies in some medicinally important plants **Mr. Mahender Aileni, CAS-TWAS Fellow** (2010), Kakatiya University, Warangal.
- Plastid transformation studies in red pepper (*Capsicum annuum*) **Mrs. Kiranmayee Kasula SRF CSIR , CAS-TWAS Fellow** (2010), Kakatiya University, Warangal.
- Studies on biomarkers in assessment of breast and cervical cancers **Mr. Mahendar Porika JRF and SRF UGC, Postdoc (UGC) CAS-TWAS Fellow** (2010), Kakatiya University, Warangal
- Tissue culture studies on medicinally important plants **Mr.Rajesh Yarra, CAS-TWAS Fellow** (2011), Kakatiya University, Warangal
- Investigation of cotton leaf curl virus induced gene silencing and micropropagation of ethnomedicinal plants **Mr.Kranthi kumar Gadidasu, CAS-TWAS Fellow** (2011), Kakatiya University, Warangal
- Nuclear and plastid transformation studies in *Scoparia dulcis* L, **Kota Srinivas UGC-RGNF,CAS-TWAS Fellow** (2014), Kakatiya University, Warangal.
- Studies on the Role of Regulatory B” subunits of protein phosphatase 2A and improvement of salinity tolerance in plants, **Mallesham Bulle, CSIR-SRF (2015)**, Kakatiya University, Warangal.
- Genetic Transformation studies in *solanum melongena* L. and *Capsicum annuum* L. by using defensin (TVD1) gene, **L. Raghuvardhan, UGC-BSR fellow (2015)**, Kakatiya University, Warangal.
- Tissue Culture studies in Medicinally important plants, **R. Deepa Kumari, UGC –BSR fellow (2015)**, Kakatiya University Warangal.
- Engineering biotic stress tolerance in tomato and chilli through plastid transformation, **K. Bharath Kumar, UGC –BSR fellow (2016)**, Kakatiya University Warangal.
- Plastid transformation studies in *Momordica charantia* L and *scoparia dulcis* **L.N.Muralikrishna, Inspire Fellow (2016)** Kakatiya University Warangal.
- Tissue culture studies in selected endemized plants., **D.Rathnaprabha,UGC-RGNF (2017)**, Kakatiya University Warangal.

- Experimental mutagenesis studies in *Capsicum annuum* L., **V.Rajender(2017)**, Kakatiya University Warangal.
- Micropropagation, screening and enhancement of secondary metabolites in medicinal plant, *Melissa officinalis* L. by plant biotechnological approach; **Medhi kiani desfardi, UGC-foreign student fellowship** (2017) Kakatiya University Warangal.

* Supervised research work of **Dr. T. Jayasree, DST Woman Scientist Awardee** (2003 – 2006).

Jointly supervised research work of **Dr. Pavan Umate with **Prof. R. G. Hermann**, Botanical Institute, LMU, Munich, Germany, under DAAD Sandwich Fellowship scheme

*Supervised research work of **Dr. T.Yashodara, UGC Woman Scientist Awardee** (2012 – 2016).

*Supervised research work of **Dr. Mahendar Porika , UGC Postdoc** (2012 – 2016).

*Supervising research work of **Dr. Srinivas Kota , UGC Postdoc** (2015 – 2019).

No of Dissertations guided: 15

No of articles published in National Research Journals: 24

No of articles published in International Research Journals: 67

In **International Journals** like **Plant Physiology, TAG, PCR, PCTOC, IN VITRO DEVELOPMENTAL BIOLOGY (SPRINGER); PLANT SCIENCE, JPP (ELSIVIER); CYTOLOGIA (JAPAN); SERICOLOGIA (FRANCE); J. Herbs, Spices& Medicinal Plants (USA); Phytochemical Analysis (Wiley), 3 Biotech, Plant Biotechnology Reports.**

No of articles/papers presented in National Seminars/ workshops/ conferences: 27

No of articles/papers presented Inter National Seminars/ workshops/ conferences: 12

No of National seminars /Conferences attended: 15

No of National seminars /Conferences organized: 06

No of International Conferences attended: 04

No of International Conferences organized: 03

Organized National Conference on Frontiers in Bioinformatics and Biotechnology. 2008 January. 3rd to 4th.

Organized International Conference on Plant Biotechnology and Molecular Biology. 2008 Aug. 15th to 17th.

Organized International Conference on Biotechnology: A Global Scenario. 2010 Nov. 2nd to 4th.

Organized International Conference on Biotechnology: Human welfare. 2013 Feb. 7th to 9th.

AREAS OF RESEARCH

Genome Editing, Genetic Engineering, Plastid transformation, Plant tissue culture, Protoplast studies, Root-knot Nematode infestations

REVIEW WORK

- Plant Cell Reports - Springer
- Journal of Biotechnology - Elsevier
- Molecular Biology Reports - Springer
- Indian journal of Experimental Biology
- Indian journal of Biotechnology
- Acta Physiologiae Plantarum
- Journal of Agricultural Science and Technology
- International Journal of Agricultural policy and Research
- Scientia Horticulturae
- American journal of plant sciences (AJPS)
- BMC Microbiology
- Asia pacific journal of Molecular Biology & Biotechnology
- Journal of Pharmacy research
- Cell and Developmental Biology
- Current pharmaceutical Biotechnology
- Physiology and Molecular Biology of Plants
- Planta

MAJOR RESEARCH PROJECTS HANDLED

- 1991-1993** Selection of Biochemical mutants in *Solanum melongena*, scheme for young scientists, **DST**, Govt. of India, **Principal Investigator**.
- 1995-1996** Selection and characterization of antibiotic resistant mutants, **TWAS, Italy** (Equipment grant), **Principal Investigator**
- 1998-2001** Mulberry improvement through somatic fusion, **DBT**, Govt. of India, **Principal Investigator**.
- 1998-2001** Developing protocols for micropropagation and genetic transformation in *Terminalia tomentosa*, **DBT**, Govt. of India, **Principal Co- Investigator**
- 1999-2002** Plastid transformation in higher plants, National **UGC** Research Award, Govt. of India, **Principal Investigator**.
- 1999-2002** Engineering abiotic stress resistance using HVA1 gene in cultivated tomato, **AICTE**, Govt. of India, **Co-Principal Investigator**.
- 2009-2012** Developing plastid transformation system for expression of mustard annexin gene in tomato for engineering abiotic stress tolerance **UGC**, New Delhi. **11 lakhs**
- 2010-2013** Developing plastid transformation system for expression of defensin gene in *Capsicum annum*, **DST**, New Delhi **53 lakhs**
- 2012** UGC –BSR one time grant Scheme for guiding successfully 15 Ph. D in science and technology, UGC New Delhi **7 lakhs**
- 2012-2015** Genetic transformation of Turmeric (*Curcuma longa* L.) with *AtNPR1* gene and evaluation of transgenic plants for broad-spectrum disease resistance, **DBT**, New Delhi, **Co-Principal Investigator 43 lakhs**
- 2014-2017** Genetic engineering for male sterility by the expression of Cysteine Protease(CP) gene in Chilli Pepper (*Capsicum annum* L.) **DBT**, New Delhi, **Principal Investigator 42.64 lakhs**

TEACHING

- Faculty to teach Under Graduate (B.Sc.) students of University Arts & Science College, Kakatiya University, Warangal for **7** years.
- Faculty to teach Post Graduate (M.Sc.) students of University College, Kakatiya University, Warangal for **23** years.

BOOKS PUBLISHED -6

SPECIAL ASSISTANCE PROGRAMME

- As Head Department of Botany, succeeded in getting 48 lakhs from UGC New Delhi under SAP-DRS (2004-2007)
- As Coordinator SAP-DRS, UGC succeeded in developing International collaboration with SABC and CRS, Perth, Australia.
- As Head Department of Biotechnology succeeded in getting **70 lakhs** from **DBT (2006-2008)** for establishing Bioinformatics Infrastructure Facility (BIF) at Kakatiya University.
- As Head Department of Biotechnology succeeded in getting **55 lakhs** from **DST (2010-2015)** for establishing Infrastructure Facilities under FIST programme at Kakatiya University.

NEW COURSES

- Instrumental in planning, designing and starting a new P. G. Programme Integrated M.Sc Biotechnology
- Instrumental in introducing Ph.D programme in Biotechnology

INTERNATIONAL COLLABORATION

- Prof. R.G.Hermann, Botanical Institute, LMU, Munich, Germany, under DAAD Sandwich Programme.
- Prof. Laszlo Szabados BRC, Szeged, Hungary
- Prof. Zanmin Hu, Institute Of Genetic and Developmental Biology, CAS, China under CAS-TWAS Programme.
- Prof. Cathrine Lillo, Stavanger University, Norway
- Prof. R. Bassi, Verona University, Italy under Indo-Italian cultural cooperation.
- Prof. Ralph Bock, Max Planck Institute for Molecular Plant Physiology, Potsdam, Golm, Germany
- Prof. Zhen Zhu, Institute of Genetics & Developmental Biology, CAS, China under CAS-TWAS Programme.
- Prof. W.K. Zhang, Institute of Genetics & Developmental Biology, CAS, China under CAS-TWAS Programme.

- Prof. M G K Jones, State Agricultural Biotechnology Centre, Perth, Western Australia under UGC-SAP-DRS Programme.
- Prof. Zhang Peng, Shanghai Institutes for Biological Sciences, Chinese Academy of Sciences. China under CAS-TWAS Programme.
- Prof. Gabriele Saretzki, New Castle University, United Kingdom.
- Prof. Hans Ulrich Koop, LMU, Munich, Germany.
- Prof. Sussane Renner LMU, Munich, Germany.

VISIT TO FOREIGN COUNTRIES ON ACADEMIC ASSIGNMENTS

Country Visited	Purpose	Duration	Financial Assistance
Germany	Post-Doctoral Fellow	18 months	DAAD
Australia	Research	6 months	ACU, London
Hungary	Research	2 months	UNESCO-BAC, France
Germany	Research	2 months	DAAD
Netherlands	Conference	-	Max-planck Society
Germany	Research	1 month	DAAD Mentor Visit
Germany	Research	1 month	DAAD Revisit
Australia	Visiting Fellow	3 months	SABC Murdoch University International Collaboration

HONOURS AND AWARDS

- Panchanan Maheshwari Medal- Indian Botanical Society (2018)
- Fellow-Telangana Academy of Science (2016)
- UGC-BSR Faculty Fellow (2016)
- Visiting Research Professor Murdoch University, Australia (2010)
- AP State Meritorious Teacher Award (2009)
- AP Scientist Award (2008)
- DAAD Honorary Advisor (2006-2009)
- Best Teacher Researcher in Botany (2006)
- DAAD fellowship (Re invitation) (2006)

- Third World Academy of Sciences (TWAS) Associateship (2006-2009)
- DAAD Mentor visit (2004)
- National UGC Research Award (1999-2002)
- UNESCO Biotechnology Action Council (France) Fellowship(1997)
- DAAD fellowship (Re invitation) (1999)
- Third World Academy of Sciences Project for Young scientist from Developing countries (1995-96)
- Association of Common Wealth Universities (ACU, London) fellowship in Biotechnology (1993-94)
- DST Young Scientist Project (1990-91)
- DAAD Fellowship(1986-87)

ACADEMIC POSITIONS HELD

- Chairperson, Board of Studies, Biotechnology, nominated by Academic Council, Kakatiya University, Warangal (2008- 2010).
- External Member, Board of Studies, Botany, nominated by Academic Council, Osmania University, Hyderabad (2003-2005).
- Chairperson, Board of Studies, Biotechnology, nominated by Academic Council, Kakatiya University, Warangal (2002 - 2004).
- Programme Coordinator, SAP-UGC (2004 - 2009) nominated by the Expert Committee UGC-New Delhi.
- Programme Coordinator, BIF:DBT New Delhi (2006 to 2013)
- **Member Academic Senate, Kakatiya University (2005 to 2016)**
- External Member, Board of Studies, Biotechnology, nominated by Academic Council, Andhra University, Visakhapatnam (2009 - 2012).
- External Member, Board of Studies, Pharmaceutical Chemistry, nominated by Academic Council, Shatavahana University, Karimnagar (2010 - 2013)
- **Governor nominee for selections (2009) at Telangana University, Nizamabad.**
- **Governor nominee for selections (2009) at Nagarjuna University, Guntur.**
- **Subject expert in Biotechnology for MRP nominated by the Chairman UGC-New Delhi**
- **Member UGC-SAP Expert Review Committee nominated by the Chairman UGC-New Delhi**

MEMBERSHIP IN PROFESSIONAL /ACADEMIC BODIES

- Member Max-Planck Society, Germany.
- Fellow, Botanical Society of India.
- Member, New York Academy of Sciences, USA.
- Member American Association for the Advancement of Science (AAAS).
- Fellow, International Association of Plant Tissue Culture.
- Fellow, Indian Phyto- Pathological Society of India.
- Visiting fellow of Murdoch University (1993-1994).
- Member Genome India International Forum (GII).

ADMINISTRATIVE POSITIONS HELD

- **Dean, Faculty of Science, KU (2013- 2015)**
- Head, Department of Biotechnology, KU (2010 to 2013)
- Head, Department of Biotechnology, KU (2006-2008).
- Head, Department of Botany, KU (2003-2005).
- In charge Department of Botany University Arts & Science College (1998-2002).

PUBLICATIONS:

1. Sandhya, D., Jogam, P., Venkatapuram, A. K., Savitikadi, P., Peddaboina, V., Allini, V. R., & **Abbagani, S.** (2022). Highly efficient Agrobacterium-mediated transformation and plant regeneration system for genome engineering in tomato. *Saudi Journal of Biological Sciences*, 29(6), 103292. (IF: 4.05)
2. Pittampalli, B., Jogam, P., Thampu, R. K., **Abbagani, S.**, & Peddaboina, V. (2022). High-frequency plant regeneration and genetic homogeneity assessment of regenerants by molecular markers in turmeric (*Curcuma longa* L.). *In Vitro Cellular & Developmental Biology-Plant*, 58(1), 169-180. (IF: 2.34)

3. Sandhya, D., Jogam, P., Manokari, M., Shekhawat, M. S., Jadaun, J. S., Allini, V. R., & **Abbagani, S.** (2021). High-frequency in vitro propagation and assessment of genetic uniformity and micro-morphological characterization of *Origanum majorana* L.–A highly traded aromatic herb. *Biocatalysis and Agricultural Biotechnology*, 34, 102024.
4. Jogam, P., Sandhya, D., Shekhawat, M. S., Alok, A., Manokari, M., **Abbagani, S.**, & Allini, V. R. (2020). Genetic stability analysis using DNA barcoding and molecular markers and foliar micro-morphological analysis of in vitro regenerated and in vivo grown plants of *Artemisia vulgaris* L. *Industrial Crops and Products*, 151, 112476. (IF: 6.44)
5. Sandhya, D., Jogam, P., Allini, V. R., **Abbagani, S.**, & Alok, A. (2020). The present and potential future methods for delivering CRISPR/Cas9 components in plants. *Journal of Genetic Engineering and Biotechnology*, 18(1), 1-11.
6. Savitikadi, P., Jogam, P., Rohela, G. K., Ellendula, R., Sandhya, D., Allini, V. R., & **Abbagani, S.** (2020). Direct regeneration and genetic fidelity analysis of regenerated plants of *Andrographis echinoides* (L.)-An important medicinal plant. *Industrial Crops and Products*, 155, 112766. (IF: 6.44)
7. Sadhu, S., Jogam, P., Thampu, R. K., **Abbagani, S.**, Penna, S., & Peddaboina, V. (2020). High efficiency plant regeneration and genetic fidelity of regenerants by SCoT and ISSR markers in chickpea (*Cicer arietinum* L.). *Plant Cell, Tissue and Organ Culture (PCTOC)*, 141(3), 465-477. (IF: 2.72)
8. Rohela, G. K., Jogam, P., Mir, M. Y., Shabnam, A. A., Shukla, P., **Abbagani, S.**, & Kamili, A. N. (2020). Indirect regeneration and genetic fidelity analysis of acclimated plantlets through SCoT and ISSR markers in *Morus alba* L. cv. Chinese white. *Biotechnology reports*, 25, e00417.
9. Sirangi, S., Jogam, P., Nemali, G., Ajmeera, R., **Abbagani, S.**, & Raju, V. S. (2020). Intraspecific genetic variation in *Corynandra chelidonii* (Angiosperms: Cleomaceae) as revealed by SCoT, ISSR and RAPD analyses. *Journal of Plant Biotechnology*, 47(4), 289-297.

10. Kota, S., Hao, Q., Narra, M., Anumula, V., Rao, A. V., Hu, Z., & **Abbagani, S.** (2019). Improved plastid transformation efficiency in *Scoparia dulcis* L. *Journal of Plant Biotechnology*, 46(4), 323-330.
11. Kota, S., Lakkam, R., Kasula, K., Narra, M., Qiang, H., Rao Allini, V., & **Abbagani, S.** (2019). Construction of a species-specific vector for improved plastid transformation efficiency in *Capsicum annum* L. *3 Biotech*, 9(6), 1-11. (IF: 2.89)
12. Narra, M., Kota, S., Velivela, Y., Ellendula, R., Allini, V. R., & **Abbagani, S.** (2018). Construction of chloroplast transformation vector and its functional evaluation in *Momordica charantia* L. *3 Biotech*, 8(3), 1-11. (IF: 2.89)
13. Narra, M., Kota, S., Ellendula, R., Kasula, K., Kalva, B. K., & **Sadanandam, A.** (2018). Efficient chloroplast transformation in *Scoparia dulcis* L. using pFaadAII vector. *Indian Journal of Plant Physiology*, 23(3), 593-598.
14. Rohela, G. K., Jogam, P., Shabnam, A. A., Shukla, P., **Abbagani, S.**, & Ghosh, M. K. (2018). In vitro regeneration and assessment of genetic fidelity of acclimated plantlets by using ISSR markers in PPR-1 (*Morus* sp.): an economically important plant. *Scientia Horticulturae*, 241, 313-321. (IF: 4.34)
15. Narra, M., Ellendula, R., Kota, S., Kalva, B., Velivela, Y., & **Abbagani, S.** (2018). Efficient genetic transformation of *Momordica charantia* L. by microprojectile bombardment. *3 Biotech*, 8(1), 1-8. (IF: 2.89).
16. Narra Muralikrishna, Kota Srinivas, Kalva Bharath Kumar, **Abbagani Sadanandam.** (2016) Stable plastid transformation in *Scoparia dulcis* L. *Physiol Mol Biol Plants* 22(4):575–581 (IF:3.02).
17. D. Rathnaprabha, N. Muralikrishna, E. Raghu, V. Yashodhara, **A. Sadanandam*** (2016) Micropropagation of white palash tree (*Butea monosperma* [Lam.] Taub. Var. *lutea* [Witt.]) *Journal of Phytology*, 8: 1-4
18. Mallesh Bulle . Rajesh Yarra **Sadanandam Abbagani** (2016) Enhanced salinity stress tolerance in transgenic chilli pepper (*Capsicum annum* L.) plants overexpressing the wheat antiporter (TaNHX2) gene. *Mol Breeding* 36: (4), 1-12 (IF:3.29)

19. Mallesham Bulle, Deepa Rathakatla, Raghuvardhan Lakkam, Venugopal Rao Kokkiralala, Mahender Aileni, Zhang Peng, **Sadanandam Abbagani** (2015) *Agrobacterium tumefaciens*– Mediated transformation of *Woodfordia fruticosa* (L.) Kurz. **Journal of Genetic Engineering and Biotechnology** 13 (2), 201-207.
20. Yashodhara Velivela, Muralikrishna Narra, Raghu Ellendula, Srinivas Kota, **Sadanandam Abbagani** (2016). Establishment of *in vitro* regeneration from petiole explants and assessment of clonal fidelity by ISSR markers in *Luffa acutangula* L.Roxb. *Journal of Applied Biology & Biotechnology* Vol. 4 (03), pp. 041-045.
21. Kota Srinivas, Narra Muralikrishna, Kalva Bharath Kumar, Ellendula Raghu, Aileni Mahender, Kasula Kiranmayee, Velivela Yashodahara & **Abbagani Sadanandam**. (2016) Biolistic transformation of *Scoparia dulcis* L. *Physiol Mol Biol Plants* . vol-22, 61-68 (**IF:3.02**)
22. Yashodhara Velivela, Muralikrishna Narra, Raghu Ellendula, Bharath kumar Kalva, Rathnaprabha Dharavath and **Sadanandam Abbagani**. 2016. *in vitro* plant regeneration from petiole explants and assessment of genetic fidelity using ISSR markers in *momordica charantia* L. *Plant Cell Biotechnology And Molecular Biology*, ISSN No. : 0972-2025 17(1&2):49-56;
23. Kalva Bharath Kumar, Ellendula Raghu, Sateesh Suthari, Ajmeera Ragan, Vatsavaya S. Raju and **Abbagani Sadanandam** In Vitro Multiple Shoot Induction from the Nodal and Shoot Tip Explants of *Dysolobium pilosum* (Fabaceae) *Int. J. Curr. Res. Biosci. Plant Biol.* 2015, 2(9): 115-123
24. syam prasad sura, vijayapal reddy baireddy, Muralikrishna narra, **Sadanandam abbagani**. (2015), Protocol for quick isolation and purification of *capsicum* protoplasts using lower concentrations of macerozyme and cellulase. *International Journal of Advanced Research* Volume 3, Issue 3, 756-759 ,ISSN 2320-5407
25. Rajitha Gali, Janardhan Banothu, Ravibabu Velpula, Mahendar Porika, Rajitha Bavantula, **Sadanandam Abbagani** (2014) Synthesis and *in vitro* cytotoxic activity of novel coumarinylimidazo[2,1-*b*]thiazole derivatives. **RSC Adv.** 4, 53812-53819 (**IF:4.03**)

26. Janardhan Banothu, Manjulatha Khanapur, Srinivas Basavoju, Rajitha Bavantula, Muralikrishna Narra' **Sadanandam Abbagani** (2014) Synthesis, characterization and biological evaluation of fused thiazolo[3,2-*a*]pyrimidine derivatives **RSC Adv** ,4, 22866-22874 (IF:4.03)
27. Rajitha Gali, Janardhan Banothu, Mahendar Porika, Ravibabu Velpula, Sairengpuii Hnamte, Rajitha Bavantula , **Sadanandam Abbagani**, Siddhardha
Busi <http://www.sciencedirect.com/science/article/pii/S0960894X14007549> - af015 (2014) Indolylmethylene benzo[*h*]thiazolo[2,3-*b*]quinazolinones: Synthesis, characterization and evaluation of anticancer and antimicrobial activities. *Bioorg Med Chem Lett.* 24(17), 4239-42 (IF:2.94)
28. Radhika Tippiani, Laxmi Jaya Shankar Prakhya, Mahendar Porika, Kalam Sirisha, **Sadanandam Abbagani**, Christopher Thammidala (2014) Pterostilbene as a potential novel telomerase inhibitor: molecular docking studies and its *in vitro* evaluation. *Curr Pharm Biotechnol.* 14(12): 1027-1035 (IF:2.459)
29. Ramesh Mushke, Rajesh Yarra, Venugopal Rao Kokkiralala, **Sadanandam abbagani** (2014) Cell, Tissue Culture, and Gene Transfer Techniques for Tasar (Wild) Sericulture Plants-Introspect and Prospect 33(2): 173-183.
30. Radhika Tippiani, Rajesh Yarra, Mallesham Bulle, Mahendar porika, **Sadanandam Abbagani**, Christopher Thammidala (2013). *In vitro* plantlet regeneration and *Agrobacterium tumefaciens*-mediated genetic transformation of Indian Kino tree (*Pterocarpus marsupium* Roxb.). *Acta Physiol Plant* 35:3437-3446. (IF:2.73)
31. Radhika Tippiani, Anil Kumar Vemunoori, Rajesh Yarra, Rama Swamy Nanna, **Sadanandam Abbagani**, Christopher Thammidala (2013). Adventitious Shoot Regeneration from Immature Zygotic Embryos of Indian Kino Tree (*Pterocarpus marsupium* Roxb.) and Genetic Integrity Analysis of In vitro Derived Plants Using ISSR Markers. *Hort Environ Biotechnol* 15(5):531-537. (IF:2.13)
32. Rajesh Yarra Si-Jie He **Sadanandam Abbagani** Biao Ma Mallesham Bulle Wan-Ke Zhang (2012) Overexpression of a wheat Na⁺/H⁺ antiporter gene

- (TaNHX2)enhances tolerance to salt stress in transgenic tomato plants(*Solanum lycopersicum* L.) *Plant Cell Tiss Organ Cult.* (IF:2.72)
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