

Profile of Dr. J. Somasundaram

Name : Dr. J. SOMASUNDARAM

Designation : Principal Scientist (Soil Physics) &
Officer-in-charge, AKMU

Date of Birth : 30.07.1974

Education : Ph.D. in Soil Science and Agricultural Chemistry

Major research areas : Vertisols management, conservation agriculture practices, sustainable soil management, soil and water conservation practices and land suitability evaluation

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Educational details :

Degree	Year of Passing	University	Percentage of Marks
B.Sc.(Agri.)	May 1995	Annamalai University, Chidambaram (Tamil Nadu), India	75.20
M.Sc.(Agri.) Soil Science & Agril Chemistry	July 1998	Tamil Nadu Agricultural University, Coimbatore (Tamil Nadu), India	93.70
Ph.D Soil Science & Agril Chemistry	Nov, 2001	Tamil Nadu Agricultural University, Coimbatore (Tamil Nadu), India	95.30 Gold Medalist
Post-Doctoral Fellow (PDF) (Endeavour Research Fellowship funded by Australian Government)	May-Oct 2015	Dept. of Science, Information Technology and Innovation (DSITI), Ecosciences Precinct, Dutton Park, Brisbane, Australia	Successfully Completed under the supervision of Prof. Ram C. Dalal

Professional Experience: I have more than 17 years of experience in research and training in the field of natural resource management/conservation agriculture supported by publication in peer reviewed journals, review papers, edited books and book chapters. I have good experience in guiding students as well as handling 12 projects (8 institute projects + 2 externally funded projects+ 2 consultancy projects) in the semi-arid regions of western and central India. Published more than 50 research papers of national and international repute.

Awards:

Best Thesis award: Awarded by TNAU, Coimbatore (Tamil Nadu) during 2001.

Best Research Award: Awarded by TNAU, Coimbatore (Tamil Nadu) during 2001.

Endeavour Research Fellowship sponsored by Australian Government during 2015

Selected publications:

1. **Somasundaram, J., Rattan Lal, N.K.Sinha, Ram Dalal,, Chitralekha, A. R.S.Chaudhary and A.K.Patra (2018). Cracks and Pot-holes in Vertisols: Characteristics, Occurrence and Management. *Advances in Agronomy* Vol. 149; DOI: 10.1016/bs.agron.2018.01.001.**
2. **Somasundaram J, Chaudhary, R S, Awanish Kumar, Biswas A.K., Sinha N.K., Mohanty M, Hati K. M., Jha P, Sankar, M, Patra, A.K and Chaudhari, S.K. (2018). *European Journal of Soil Science: DOI: 10.1111/ejss.12692.***
3. **Somasundaram, J., S.H. Reeves, W.J. Wang, M.A. Heenan, R.C. Dalal. (2017). Impact of 47 years of no-tillage and stubble retention on soil aggregation and carbon distribution in a Vertisol. *Land Degradation & Development* 28 (5), 1589-1602, DOI: 10.1002/ldr.2689.**
4. **Somasundaram, J., Sinha, N.K., Patra, A.K. and R. Lal. (2017). Managing Surface Cracks of Vertisols. *Encyclopedia of Soil Science*, Third Edition DOI: 10.1081/E-ESS3-120052915.**
5. **Somasundaram, J., Singh, R.K., Prasad, S.N., Sethy, B.K., Kumar, A., Ramesh, K. and Lakaria B.L. (2011) Management of black Vertisols characterized by pot-holes in the Chambal region, India, *Soil Use and Management*, Vol 27, 124–127 (doi:10.1111/j.1475-2743.2010.00321.x).**
6. **Somasundaram, J., R.S. Chaudhary, Brij Lal Lakaria, R. Saha, N. K. Sinha, R.K. Singh, Pramod Jha, R. K. Singh and A. Subba Rao (2014). Pothole formation and occurrence in black Vertisols of central and western India. *Agricultural Research*, DOI: 10.1007/s40003-014-0098-6). (Springer publication).**
7. **Somasundaram, J., Meena, H.R. Singh, R. K., Prasad, S.N and Parandiyal A K. (2011). Diagnosis of Micronutrient imbalance in Lime crop in semi-arid region of Rajasthan. *Communication in Soil Science and Plant Analysis*, Vol 42: 858–869 (doi: 10.1080/00103624.2011.552658).**
8. **Somasundaram, J., Singh, R. K., Sethy, B.K., Parandiyal, A. K., Lakaria, B.L and Chaudhary R.S., Singh, R.K and Sinha, N.K. (2012) Soil aggregates influenced by different land uses under distinct landscapes of Chambal region, *Indian Journal of Soil Conservation*, Vol 40(3): 212-217.**
9. **Somasundaram, J., Singh, R K., Parandiyal, A.K and Prasad, S.N (2009). Micronutrient Status of Soils Under Different Land Use Systems in Chambal Ravines, *Journal Indian Society of Soil Science*, Vol 57(3):307-312.**
10. **Somasundaram, J, B. L. Lakaria, R. Saha, N.K. Sinha, P. Jha, R. S. Chaudhary, R.K. Singh, D. Mandal , K.M.Hati, K. Ramesh, M. Vassanda Coumar, A.K. Biswas, P. Dey, K. Sammi Reddy and A. Subba Rao. (2014). Management of Stressed Soils of Dryland Agriculture in Semi-Arid Tropics-A Review. *Indian Journal of Soil Conservation*, Vol 42 (2):184-187**
11. **Somasundaram, J., Krishnasamy, R., Savithri, P., Satish Kumar, B., Behera, S.K., Arun Kumar, V., Chitdeswari, T and Vassanda Coumar, M. (2011). Effect of sewage**

- sludge application on accumulation of Cd, Cr, Ni and Pb in forage maize (*Zea mays* L.) ***Agrochimica***, Vol. LV - No. 6: (November-December 2011), 332-354.
12. **Somasundaram, J.**, Krishnasamy R., and Savithri, P. (2005) Biotransfer of heavy metal in Jersey Cows. ***Indian Journal of Animal Sciences***, Vol 75 (11):1257-1260.
 13. **Somasundaram, J.**, Krishnasamy, R., Savithri, P., Vassanda Coumar, M., Arunk Kumar, V., B. Satish Kumar., Indirani, R., Maragatham, S., and Sivasubramanium, K. (2014). Sewage sludge–coirpith pellets on dry matter yield and trace metal concentration of forage maize ***Journal of Plant Nutrition***. DOI- 10.1080/01904167.2016.1161774.

Books Authored/Edited

- Somasundaram, J.**, Chaudhary, R.S. Subba Rao, A., Sinha, N.K. and Vasanda, Coumar (2014). Conservation Agriculture for carbon sequestration and sustaining soil health. New India Publications Agency, New Delhi. P. 1-528. (ISBN: 978-93-83305-32-2).
- Somasundaram, J.**, Chaudhary, R.S., Hati, K. M., Vassanda Coumar, M., Sinha, N.K., Jha, P., Ramesh, K., Neenu, S., Blaise, D., Saha, R., Ajay, Biswas, A.K., Maheswari, M., Rao, D.L.N., Subba Rao, A and Venkateswarlu, B. (2014). Conservation Agriculture for Enhancing Soil Health and Crop Productivity. Published by Indian Institute of Soil Science, Bhopal in collaboration with National Initiative on Climate Resilient Agriculture (NICRA), CRIDA, Hyderabad, 64 p.
- Chaudhary, R.S. Hati, K.M., Saha, R., **Somasundaram, J.**, and Mohanty, M. (2015). **Advances in Measurement of Soil Physical Properties**, Published by Jaya publishing Home (ISBN: 978-93-84337254). Pp. 1-179 (2014-15).
- Prasad, S.N., Singh, R.K., Ashok Kumar, Parandiyal, A.K., Shakir Ali, **Somasundaram, J.**, Sethy, B. K. and V. N. Sharda. (2008) Natural Resource Management for Sustainable Development in Western India, Allied Publishers Private Ltd, New Delhi 1-263.
- Singh, R.K., Parandiyal, A.K. Ashok Kumar, Shakir Ali, **Somasundaram, J.** (2006) Conference abstract on 'Natural Resource management for sustainable Development in Western India' (NRMSD-2006) held at Pune 11-13 Oct 2006 Jointly organized by IASWC, CSWCRTI, Dehradun, CSWCRTI, RC, Kota and Dept of Soil Cons. and watershed Development, Govt. of Mahashtra, Pune 1-105.
- Prasad, S.N., Singh, R.K., Parandiyal, A.K., Ashok Kumar, Shakir Ali, **Somasundaram, J.** and Sethy, B. K. (2008). 50 Years research report on soil and water conservation of CSWCRTI, Research Centre, Kota 1-135.