

Dr Trisha Roy Scientist (Soils)

Ph.D. (Soil Science and Agril. Chemistry)

trisha17.24@gmail.com, ICAR mail id: Trisha.Roy@icar.gov.in

Mob. No. 9953259568

Service Particulars

DoB: 24th February, 1987

Qualification: Ph.D. in Soil Science and Agricultural Chemistry from ICAR-IARI, New Delhi

Scientist (Soil Science) July, 2015 to till date

Major Research and Contribution

Publications

Research Paper

S.No.	Authors	Title	Name of	Volume	Page	Year
1	R Kaushal, S Tewari, SD Thapliyal, A Kumar, T Roy , S Islam, STS Lepcha	Build-up of Labile, non-labile carbon fractions under fourteen- year-old bamboo plantations in the Himalayan foothills	Journal Heliyon	7(8)	p.e07850.	2021
2	D Mandal, M Chandrakala, NM Alam, T Roy , U Mandal	Assessment of soil quality and productivity in different phases of soil erosion with the focus on land degradation neutrality in tropical humid region of India	Catena	204	105440	2021

3	V Singhal, T Roy, C Singh, J Ghosh	Effect of incubation time, litter diversity and species richness on decomposition dynamics of tree species from western Himalayas	Catena	203	105281	2021
4	T Roy, U Mandal, D Mandal, D Yadav	Role of arbuscular mycorrhizal fungi in soil and water conservation: a potentially unexplored domain.	Current Science	120	00113891	2021
5	D Singh, N Patel, S Patra, N Singh, T Roy, S Caucci, H Hettiarachchi	Efficacy of drip irrigation in controlling heavy- metal accumulation in soil and crop	Journal of Environmental Engineering and Science		1-13	2020
6	A Sarkar, DR Biswas, SC Datta, T Roy, SS Biswas, A Ghosh, M Saha	Synthesis of poly (vinyl alcohol) and liquid paraffin- based controlled release nitrogen- phosphorus formulations for improving phosphorus use efficiency in wheat	Journal of Soil Science and Plant Nutrition	20 (4),	1770- 1784	2020
7	T Roy, DR Biswas, A Ghosh, AK Patra, RD Singh, A Sarkar, SS Biswas	Dynamics of culturable microbial fraction in an Inceptisol under short-term amendment with municipal sludge from different sources	Applied Soil Ecology	136	116-121	2019
8	T Roy, S Kumar, L Chand, DM Kadam, B Bihari, SS Shrimali, R Bishnoi,	Impact of Pusa hydrogel application on yield and productivity of rainfed wheat in North West Himalayan region.	Current Science	116 (7)	00113891	2019

9	SS Biswas, A Ghosh, SK Singhal, DR Biswas, T Roy, A Sarkar, D Das	Phosphorus enriched organic amendments can increase nitrogen use efficiency in wheat	Communications in Soil Science and Plant Analysis	50 (9),	1178- 1191	2019
10	T Roy, DR Biswas, SC Datta, A Sarkar, SS Biswas	Citric acid loaded nano clay polymer composite for solubilization of Indian rock phosphates: a step towards sustainable and phosphorus secure future	Archives of Agronomy and Soil Science	64 (11)	1564- 1581	2018
11	A Sarkar, DR Biswas, SC Datta, T Roy, PC Moharana, SS Biswas	Polymer coated novel controlled release rock phosphate formulations for improving phosphorus use efficiency by wheat in an Inceptisol	Soil and Tillage Research	180	48-62	2018

Others

(i) Technical/Popular articles:

Trisha Roy and N.K. Sharma (2016) Residue Management: Its Impact on Environment. National Environmental Science Academy News Letter. Volume 6.

(iii) Technical Bulletins/Books:

Singh, D.V., Ghosh, B.N., Mandal, D., Ranjan, Rajeev., Avasthe, R.K., Roy, Trisha. and Singh, Gambhir. (2017) Technical Resource Book on Soil Management for Controlling Land Degradation, Soil Science and Agronomy Division, ICAR-IISWC, Dehradun.

- Trisha Roy, N. K. Sharma, Deepak Singh, Abhijit Sarkar and Madhumanti Das (2018) Alternate Uses
 Of Paddy Straw: Effective Ways To Curb Menace Of Residue Burning. National Environmental Science
 Academy (NESA- News Letter) October 2018, 13-14.
- Trisha Roy, I Rashmi, Rama Pal, Uday Mandal and Deepak Singh (2018) Jaiveek Kheti ke Labh. Mrida ebam Jal Sanrakshika: Rajbhasha Patrika. Vol 2: 92-93.

Rashmi, I., Kala S, *Trisha Roy*, Rama Pal and B.L.Meena (2018) *Bhu Sudhar mein Vardan- Kechua Khad: Rajbhasha Patrika*. Vol 2: 83-86.

• **Roy, Trisha**, Biswas, A.K., Jha, P. and George, J. (2019) Hidden Nutrient Cost: The Neglected Nutrient Budget for Carbon Sequestration in Edited Book *Sustainable Land Management: Issues, Problems and Prospects*, Chapter 11, pp 187-195 (ISBN 978-93-88020-46-6)

Soil and Water Conservation Bulletin (2018) edited by Mishra, P.K., Singh, L., Kumar, A., Mandal, D., Kaushal, R., Kumar, G. and *Roy, Trisha*. Vol 3, pp 106

Roy Trisha, Bihari Bankey & Mishra P K (2017) **Training Manual** on Ravine Reclamation sponsored by Uttar Pradesh Bhoomi Sudhar Nigam

Awards and Recognition

- Received Best Doctoral Thesis Award of the Indian Society of Soil Science for Ph.D. Thesis work.
- Received Best Paper Presentation Award at International Conference on Agriculture and Allied Sciences: The Productivity, Food Security and Ecology at BCKV, West Bengal from 13-14 August, 2018
- Received Best Poster Award at FFCSWR-2018 at AAU, Gujarat from 1-3 February, 2018.

Other Important Responsibility

- Faculty Leader of the bi-annual Regular Training Program for the Course on "Soil Management for Controlling Land Degradation"
- OIC, Laboratory

Consultancies

NIL