



राष्ट्रीय कृषि विज्ञान पुरस्कार 2025

**RASHTRIYA KRISHI VIGYAN PURASKAR 2025** 

16 जुलाई 2025 / 16 JULY 2025



भारतीय कृषि अनुसंधान परिषद, नई दिल्ली Indian Council of Agricultural Research, New Delhi









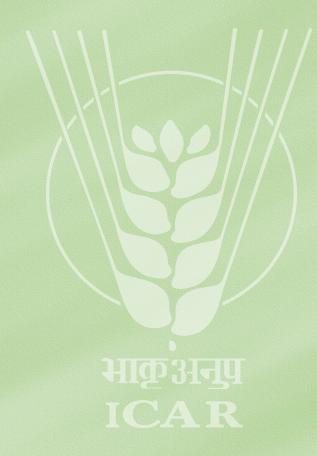
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# संदेश



भारतीय कृषि अनुसंधान परिषद देश की सर्वोच्च कृषि अनुसंधान संस्था है, जो पिछले दस दशकों से कृषि के सभी क्षेत्रों में अनुसंधान, उच्च शिक्षा और विस्तार कार्य का समन्वय कर रही है। परिषद ने देश में खाद्य और पोषण सुरक्षा सुनिश्चित करने के साथ—साथ राष्ट्रीय अर्थव्यवस्था को सुदृढ़ करने में भी अहम भूमिका निभाई है। यह संस्था राष्ट्रीय कृषि अनुसंधान, शिक्षा और विस्तार प्रणाली का केंद्र है जिसमें विभिन्न अनुसंधान संस्थानों और कृषि विश्वविद्यालयों का एक व्यापक नेटवर्क शामिल है। कृषि वैज्ञानिकों की भूमिका नए ज्ञान के विकास में अत्यंत महत्वपूर्ण रही है जिससे खाद्य सुरक्षा और कृषि की सततता सुनिश्चित हो सकी है। इन वैज्ञानिकों के उत्कृष्ट और

प्रेरणादायक योगदानों को पहचानना आवश्यक है, जिससे वे अन्य लोगों के लिए प्रेरणा का स्रोत बन सकें। इसी उद्देश्य से, गृह मंत्रालय की स्वीकृति से राष्ट्रीय कृषि विज्ञान पुरस्कार की स्थापना की गई है। ये पुरस्कार कृषि, कृषि शिक्षा, विस्तार सेवाओं और संबंधित विज्ञानों के क्षेत्र में दिए जाने वाले देश के सर्वोच्च सम्मान हैं।

राष्ट्रीय कृषि विज्ञान पुरस्कार 2025, कृषि से संबंधित निम्नलिखित पाँच श्रेणियों में प्रदान किए गए हैं:

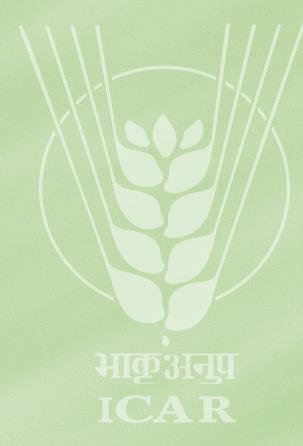
- 1. कृषि और संबंधित विज्ञान के क्षेत्र में नवाचार और प्रौद्योगिकी
- 2. कृषि और संबंधित विज्ञान के क्षेत्र में अनुसंधान
- 3. कृषि, कृषि शिक्षा, विस्तार और संबंधित विज्ञान के क्षेत्र में अंतर—विभागीय टीम अनुसंधान
- 4. कृषि, कृषि शिक्षा, विस्तार और संबंधित विज्ञान के क्षेत्र में उत्कृष्ट महिला वैज्ञानिक
- 5. कृषि और संबंधित विज्ञान के क्षेत्र में उत्कृष्ट युवा वैज्ञानिक

राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 की शुरुआत के अवसर पर, मैं माननीय कृषि एवं किसान कल्याण मंत्री तथा विभिन्न पुरस्कार निर्णायक समितियों के प्रति अपना हार्दिक आभार व्यक्त करता हूँ।

(एम.एल. जाट)

सचिव, कृषि अनुसंधान एवं शिक्षा विभाग एवं महानिदेशक, भारतीय कृषि अनुसंधान परिषद, नई दिल्ली

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#### प्रस्तावना

भारतीय कृषि अनुसंधान परिषद देश की सर्वोच्च अनुसंधान संस्था है, जो पिछले दस दशकों से कृषि के सभी क्षेत्रों में अनुसंधान, उच्च शिक्षा और विस्तार शिक्षा का समन्वय कर रही है। इस संस्था ने न केवल देश में कृषि विज्ञान को सशक्त बनाया है, बल्कि खाद्य और पोषण सुरक्षा सुनिश्चित करने तथा किसानों की आय बढ़ाने में भी महत्वपूर्ण भूमिका निभाई है। कृषि वैज्ञानिकों ने अनुसंधान और नवाचार के माध्यम से कृषि की दिशा और दशा बदलने में अत्यंत सराहनीय योगदान दिया है। ऐसे उत्कृष्ट और प्रेरणादायक कार्यों को पहचान देने तथा वैज्ञानिकों को सम्मानित करने के उद्देश्य से, गृह मंत्रालय की स्वीकृति से ''राष्ट्रीय कृषि विज्ञान पुरस्कार'' की स्थापना की गई है। यह पुरस्कार कृषि, कृषि शिक्षा, विस्तार कार्य और संबंधित विज्ञानों में उत्कृष्ट योगदान के लिए देश के सर्वोच्च सम्मान माने जाते हैं। राष्ट्रीय कृषि विज्ञान पुरस्कार 2025, कृषि से संबंधित निम्नलिखित पाँच श्रेणियों में प्रदान किए गए हैं:

- 1. कृषि और संबंधित विज्ञान के क्षेत्र में नवाचार और प्रौद्योगिकी
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- 5. कृषि और संबंधित विज्ञान के क्षेत्र में उत्कृष्ट युवा वैज्ञानिक

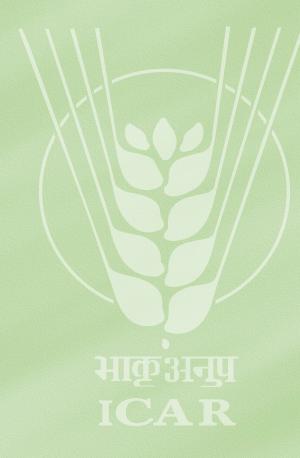
राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 के लिए इस वर्ष कुल 34 विजेता चुने गए हैं जिनमें 6 महिलाएँ शामिल हैं। मैं सभी पुरस्कार विजेताओं को हार्दिक बधाई देता हूँ।

साथ ही, राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 की शुरुआत के अवसर पर, मैं माननीय कृषि एवं किसान कल्याण मंत्री, कृषि अनुसंधान एवं शिक्षा विभाग के सचिव एवं भारतीय कृषि अनुसंधान परिषद के महानिदेशक तथा विभिन्न पुरस्कार निर्णायक समितियों के प्रति अपना हार्दिक आभार व्यक्त करता हूँ।

(अनिल कुमार)

सहायक महानिदेशक (समन्वय)

नई दिल्ली



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**Animal and Fisheries Sciences** 



**Dr Kajal Chakraborty** 



#### राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

**Dr Kajal Chakraborty** has significant research contributions in marine biotechnology, aqua feed products, and bioprospecting for applications in fisheries and post-harvest technology with research records of 280 high-impact research papers with citations of 6400+, 16 granted patents, 20 book/book chapters, 14 commercialized technologies, and have led multiple inter-institutional projects aimed at enhancing understanding of marine biotechnology and its applications in fisheries management and Mari culture. His studies on the nutritive and nutraceutical values of marine fishes and micro/macro-algae are useful for use in Mari culture. Dr. Chakraborty is a Fellow of the NASI and NAAS, and has received prestigious National awards, including ICAR-Norman Borlaug Award, DBT-Commercialization Award, ICAR-Rafi Ahmed Kidwai Award, among others. Dr. Chakraborty's commitment to mentorship is evident through his supervision of 18 Ph.D. students, with 4 receiving the ICAR Jawaharlal Nehru Award. His extensive involvement in national-level committees, academies, and professional societies underscores his broad vision on fisheries research.

**Crop and Horticultural Sciences** 



Dr Sharat Kumar Pradhan



# राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

**Dr Sharat Kumar Pradhan** has released 66 rice varieties, with an estimated demand of 19 lakh quintals of certified seeds resulting in an additional net gain of over 2000 crores annually. He has reported novel QTLs controlling grain protein content, iron content, zinc content, grain antioxidant levels, antioxidant activity, seed growth parameters, vigor, seed germination percentage, seed dormancy, total soluble sugars, starch content, amylose content, chlorophyll a and b content, drought, iron toxicity, cold and low light stress tolerance in rice. Notably, he has successfully transferred genes/QTLS for bacterial blight resistance, submergence, drought, phosphorus and yield QTLs in different combinations into the rice varieties, Jalmagna, Swarna, Ranidhan, Maudamani and Reeta through markerassisted breeding. Dr. Pradhan has been honored with several prestigious awards and Fellowship by National Academy of Agricultural Sciences and others. He has 185 peerreviewed articles, six books, and 38 book chapters. He has mentored 14 Ph.D. and 10 MSc. Scholars.

Natural Resource Management and Agricultural Engineering



**Dr Hari Kuppusamy** (Team Leader)



Dr Puthira Prathap Duraisamy



Dr P. Murali



Dr Ramesh Sundar Amalraj



Dr Singaravelu Balasubramanian



#### राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

The team comprising of Dr Hari Kuppusamy (Team Leader) and Team Members Dr Puthira Prathap Duraisamy, Dr P. Murali, Dr Ramesh Sundar Amalraj and Dr Singaravelu Balasubramanian took commendable efforts in sensitizing farmers on irrigation scheduling based on soil moisture status. The team developed Soil Moisture Indicator (SMI), a simple handy device and has established that irrigation water could be conserved by scheduling irrigations without loss in crop yield. SMI was developed in Farmer's Participatory Technology Development mode and commercialized the SMI for the benefit of stakeholders. Scaling efforts of the team led to a large number of demonstrations by ICAR-KVKs and sugar factories. SMI was licensed to 22 firms across the country. One patent filed and four designs obtained. SMI designs are the first designs registered by ICAR. The Agriculture Skill Council of India and National Skill Development Corporation included scheduling irrigations using devices such as Soil Moisture Indicator in the National Occupational Standard of a Sugarcane Cultivator Guidelines to save water resources in agriculture. SMI has recommended inclusion of SMI in Central schemes with subsidy. Many states have already included SMI in their water conservation schemes. The outcome and outputs of the project align with National Development Priorities.

**Social Sciences** 



**Dr Dheeraj Singh** 



# राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

It is certified that the Extension work submitted for award was carried out at CAZRI Krishi Vigyan Kendra, Pali by **Dr Dheeraj Singh**. The research and extension work has been an innovative extension approach by creating the linkages among the farmers of the district and simultaneously comprehending economic viability of agriculture under semi-arid conditions. The innovative extension approaches provided the farmers better access to improved technologies, new varieties, critical inputs and large demand for their quality produce. A large number of farmers associated with the project were fine tuned into a success stories having viable and profitable enterprises which served as role model for other farmers also. In fact, the project has created a large awareness among the farmers, entrepreneurs, NGOs and institutions and has proved to be a successful campaign for promotion of agriculture and related enterprises in entire district and Rajasthan.

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# Research in the field of Agriculture and Allied Sciences 2025

**Animal and Fisheries Sciences** 



Dr Samit Kumar Nandi



#### राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

**Dr Samit Kumar Nandi** has developed affordable calcium phosphate-based scaffolds, polymeric biomaterials, bioactive glasses, and marine-based bone graft substitutes, collaborating with orthopedic and plastic surgeons. He also created cost-effective wound dressings and cartilage grafts from fish skin collagen, floral carbon dots, animal cartilage, and eggshell membranes, yielding effective outcomes in patients. His innovations include biodegradable magnesium bone plates, silk-based diabetic wound healing materials, artificial vascular grafts, peptide-based sealants, and 3D-printed biomaterials, enhancing biomedical research and national healthcare. Some products are available in India, with others ready for commercialization. Recognized with seven national awards, he has led 18 government- funded projects and holds five patents. His 150 research papers and 30 book chapters have been cited 5,950 times. His work significantly benefits the poorer sections of society through affordability and accessibility.

# Research in the field of Agriculture and Allied Sciences 2025

**Crop and Horticultural Sciences** 



Dr Prasanta K. Dash



#### राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

**Dr Prasanta K. Dash** is a plant biotechnologist, is the Assistant Director General (Commercial crops) at ICAR, New Delhi. Dr. Dash and his coworkers have used combinations of molecular genetics, 'omics techniques, and elegant transgenic approach' to determine pathways/mechanisms of plant growth in response to the biotic and abiotic stress and designs new strategies to engineer crops to combat climate change. He has made pioneering contributions to understanding fundamental biological principles and concepts in an orphan crop flax, pigeon pea, and model crop rice, and has inspired others with bold technological advances to further their fields such as:

- International effort (Indo-Canadian), wherein he decoded whole genome sequence of flax. The de novo deep-coverage assembly predicted 43,384 genes. This reference sequence of flax has enhanced genomic research and molecular breeding in flax and other species in the Linaceae family.
- In a team effort, he deciphered whole genome sequence of pigeon pea that predicted 59,515 protein-coding genes. The genome sequence with 215 citations has been used to identify hyper-variable (HASSR) markers. These markers are being used for fingerprinting, diversity analysis and molecular breeding of pigeon pea.

Broadly, the finding translated into agronomically important trait of yield and disease resistance, which is thought to be the major trait underpinning increased flax and rice yields. With colleagues, he established the first molecular genetic map of flax and pigeonpea and tagged many genes for disease, insect resistance and stress tolerance using molecular and qRT-PCR markers. These advances are applied with molecular marker-aided selection in flax and pigeonpea improvement. Dr. Dash investigated species relationships in genus Oryza by studying molecular evolution and identified useful genes for transfer from wild species to cultivated rice. The far-seeding aspect of his research activities centered on development of New Plant Type (NPT) of rice and pigeon pea through genetic engineering. Twelve rice varieties, one transgenic pigeon pea (BRL II stage), and a flax transgenic has been developed by him.

Since 2001, he has been involved in teaching M.Sc/Ph.D students of IARI, New Delhi. While, three of his students received gold medal in M.Sc, 25 students have become scientist at various organizations, and >75Students have qualified CSIR/ICAR NET. He was also selected by ICAR-MEA to teach M.Sc/Ph. D students of Yezin Agriculture University, Myanmar under, Gol collaboration. He is a best teacher awardee, and is fellow of five national societies with total research citation of is 2830 (h- index 26, and i-10 index 45).

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Research in the field of Agriculture and Allied Sciences 2025

Natural Resource Management and Agricultural Engineering

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Dr Hanuman Sahay Jat



# राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

**Dr Hanuman Sahay Jat** pursued innovative and systematic research to address the complex challenges of crop residue burning, ground water depletion, natural resources (soil, air, water, energy) degradation through conservation agriculture (CA) based management practices in rice- wheat system of western IGP. He contributed in to modern techniques for redesigning new generation efficient cereal systems, site-specific nutrient prescription, subsurface drip irrigation, crop residue management and techniques for direct seeded rice adapted to enhance nutrient, water and energy use efficiencies while improving agro ecological resilience under expected climate change scenario for sustainable production. Fully validated CA- backed science evidence shown the potential to produce more (10-15%) food from less water (20-30%) & energy (40-45%) while increasing farmers income (20-25%) in an environmentally responsible manner through lowering carbon foot prints by 25-30% in rice-wheat system. These research evidences helped in formulation of In-situ CRM policy of Govt. of India, and policy Brief on "CA Roadmap for India".

# Outstanding Inter-Disciplinary Team Research in Agriculture, Agricultural Education, Extension and Allied Sciences 2025

(Shared between two teams)



Dr Raman Meenakshi Sundaram



Dr Maganti Sheshu Madhav



Dr C. N. Neeraja



Dr Madamsetty Srinivas Prasad



Dr A. P. Padmakumari



Dr Gouri Sankar Laha



Dr Satendra Kumar Mangrauthia



Dr Jyothi Badri



Dr Kalyani Makarand Barbadikar



Dr Papa Rao Vaikuntapu



#### राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

The team Dr Raman Meenakshi Sundaram, FNAAS, FNASI, FISGPB, FIUSSTF-Team Leader and Team Members-Dr Maganti Sheshu Madhav, Dr C. N. Neeraja, Dr Madamsetty Srinivas Prasad, Dr A. P. Padmakumari, Dr Gouri Sankar Laha, Dr Satendra Kumar Mangrauthia, Dr Jyothi Badri, Dr Kalyani Makarand Barbadikar and Dr Papa Rao Vaikuntapu at ICAR-IIRR, Hyderabad have made significant impact in terms of development and popularization of pest and disease resistant rice varieties and technologies. The team has focused on the key biotic stresses, i.e. bacterial blight, blast, yellow stem borer, brown plant hopper and gall midge and identified, characterized and cloned several novel biotic stress resistant/tolerant genes and QTLs and developed functional markers for these genes. The genes identified and characterized and the functional markers developed by the team for the major resistance genes are being extensively used by rice breeders at both National and International level. Rice varieties having multiple biotic stress resistance genes developed by the team occupy > 1.5 Mha and they have published > 120 high impact, highly cited research papers in International Journals of repute, beside publishing many books, book chapters, technical bulletin and popular articles. Besides, the team has nurtured > 40 M.Sc. and > 50 Ph.D. students and also trained > 250 faculty.

Outstanding Inter-Disciplinary
Team Research in Agriculture,
Agricultural Education, Extension
and Allied Sciences 2025

(Shared between two teams)



**Dr Parveen Kumar** 



Dr Manohara K.K.



Dr R. Solomon Rajkumar



Dr Gopal Ramdas Mahajan



Dr Sreekanth G. B.



Dr Paramesha V.



#### राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

The multidisciplinary team of ICAR-CCARI, Goa, Dr Parveen Kumar-Team Leader and Team Members-Dr Manohara K.K., Dr R. Solomon Rajkumar, Dr Gopal Ramdas Mahajan, Dr Sreekanth G. B. and Dr Paramesha V. led a pioneering initiative to build coastal climate resilience through Integrated Farming Systems (IFS) and agro-ecotourism (AET). Their science-driven approach led to the development of salt-tolerant rice varieties, Livestock-Fish- Horticulture IFS, non-invasive phenotyping tools, digital portals like the Coastal Agricultural Information System (CAIS), and formulations tailored for coastal soils like Goa Bio 1 and Phospho-Urja. These innovations enhanced productivity by over 200%, increased farm income by 184%, and were scaled across more than 18,000 ha. They conceptualized India's first ICAR-certified agro-ecotourism model, linking agro-ecotourism with natural farming, generating sustainable income and employment. Through a structured incubation program, 17 agri-startups were supported, driving rural entrepreneurship. Their work influenced state policy, earned national recognitions to farmers, including two Padma Shri awards, and benefited over 10,000 stakeholders through inclusive outreach programs. This integrated research and extension exemplifies science-led rural transformation and resilience-building in vulnerable coastal ecosystems.

Outstanding Woman
Scientist in Agriculture,
Agricultural
Education, Extension and
Allied Sciences 2025



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Dr P. D. Kamala Jayanthi



# राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

**Dr P. D. Kamala Jayanthi,** FRES, FNAAS research experience spans from developing IPM modules and forecasting models to understanding the insect-plant interactions for deciphering potent semi chemical cues to strengthen IPM programs for major horticultural insect pests. She Isolated and identified potent chemical cues that are attractive to female Bactrocera dorsalis. Proposed computational chemical ecology approach, as a rapid method to identify kairomones. She Proved centuries of domestication have not impaired ovipositional site- selection function in the silkmoth, Bombyx mori and formulated a blend to enhance fertile egg laying in this economically important insect. She Established chemical elicitors to bring down fruit fly infestations and intercropping for ecofriendly pest management, developed farmer-friendly trap and forewarning models to predict pest incidence for spray interventions, complete packages of eco-friendly IPM relevant to growers and exporter needs for major pests of tropical fruit crops, Novel technologies to manage hard-to-kill pests like mealybugs, fruit flies and melon flies were commercialized.

**Animal and Fisheries Sciences** 

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Dr Vinod Vishnu Kadam



#### राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

**Dr Vinod Vishnu Kadam's** work has brought a fresh, practical perspective to animal science by reimagining the value of Indian sheep wool. His research transforms an underutilized coarse wool, previously considered waste, into a range of high-value resources. Through innovative approaches, Kadam has diversified the applications of coarse wool across agriculture, textiles, and construction. His work has led to the development of products such as mulch, organic manure, sapling bags, quilts, and bio-composites. Additionally, he has pioneered sustainable processing methods that align with the United Nations' Sustainable Development Goals. Kadam's work bridges traditional animal science with modern, sustainable practices. The demonstrated improvements in soil quality, moisture retention, and rural economic empowerment indicate significant potential benefits for agriculture and community livelihoods. His contributions have inspired a generation of entrepreneurs and researchers, establishing him as a deserving recipient of the Outstanding Young Scientist Award for his visionary contributions to Indian wool.

Crop and Horticultural Sciences (Shared between two Awardees)



Dr K.S.V.P. Chandrika



# राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

**Dr K.S.V.P. Chandrika** has made significant contributions to sustainable agriculture through innovative biopolymer and microbial technologies. Her groundbreaking work includes the development of Biopolymer-based Trichoderma harzianum Th4d blend (Biocoat) for managing Fusarium wilt and Macrophomina root rot in dryland safflower crops, a technology certified by ICAR and successfully commercialized. She has also co-developed a novel water-dispersible granule (WDG) formulation of Bacillus thuringiensis using an eco-friendly process that simplifies production and enhances pest management.

Dr. Chandrika played a pivotal role in developing TilhanTec-Bioguard formulations, including Bt+EPF-L® and Bt-L®, integrating biocontrol agents to combat lepidopteran pests. Her patented innovations in multilayer seed coating and polymer compositions underscore her expertise in precision agriculture. Recognized for their environmental and economic benefits, her technologies have been licensed to industries and recommended for field applications, demonstrating her commitment to advancing agricultural resilience and productivity.

Crop and Horticultural Sciences (Shared between two Awardees)



**Dr Shyam Sundar Dey** 



#### राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

**Dr Shyam Sundar Dey** has significant contribution in development of large number of doubled haploid (DH) lines in cabbage and cauliflower through isolated microspore culture, development of 56 CMS lines in cauliflowers and interspecific hybridization for trait enhancement in Brassica oleracea. The CMS and DH lines were subsequently used in development of number of F1 hybrids in cauliflower and cabbage. Among them Pusa Snowball Hybrid-1 is the first CMS based F1 hybrid in cole crops and Pusa Snowball Hybrid-2 is the first F1 hybrids in any vegetable crop developed using DH line. He is involved with development of 15 hybrids and their commercialization. He has registered 08 germplasm with NBPGR, New Delhi. He has mapped the genomic regions associated with parthenocarpy, downy mildew resistance, leaf curl disease resistance and extended shelf-life and developed closely linked molecular markers for MABC. He has worked in 12 externally funded projects (SERB, DST; DBT, CSIR, LSRB, DRDO, CSIR) as principal investigator.

He has received number of awards like Fellowship and Associateship of National Academy of Agricultural Sciences (NAAS), Early Career Science and Technology Visiting Scholar by Indian National Science Academy (INSA), completed for post-Doctoral fellowship at UWA Perth.

Natural Resource Management and Agricultural Engineering (Shared between two Awardees)



Dr R. Pandiselvam



#### राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

**Dr R. Pandiselvam** has made remarkable contributions to agricultural engineering, food process technology, and sustainable post-harvest innovations, particularly in coconut processing and value addition. His research spans machine design, infrared-assisted drying, non-destructive quality analysis, bio-preservation, food structuring, and process optimization, leading to over 90 high-impact publications in reputed journals with significant NAAS ratings. Dr. Pandiselvam has successfully licensed and commercialized nine innovative coconut- based technologies, including dryers, fermenters, preservation protocols and processing machinery, benefiting over 40 enterprises and generating substantial economic value.

Additionally, his efforts in training and technology dissemination have reached over 8,000 stakeholders, fostering skill development and entrepreneurship in agro-processing. His pioneering work in post-harvest operations has enhanced food quality, shelf life, and sustainability. His contributions significantly impact agro-industrial growth, rural entrepreneurship, and food security, making him a deserving candidate for this prestigious award.

Natural Resource Management and Agricultural Engineering (Shared between two Awardees)



**Dr Shaon Kumar Das** 



# राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

Dr Shaon Kumar Das recommended different best land use system through long term carbon sequestration study under changing climate, cropland's soil carbon dynamics and potential with cool farm tool, energy dynamics and economic viability. He developed low-cost farmers' friendly bio char production and bio char co-composting technology from locally available biomass. His noteworthy effort on exploring bio char technology in India for soil health and crop production are praiseworthy. This outclass research has been first time reported from India using carbon negative bio char for preparation of hydrogel-bio char composite for controlled release fertilizer development. He developed controlled release fertilizer through oilcake bioconversion into enriched micronutrient and secondary nutrient. He used organic matter and phosphorus along with two identified bacterial strains to mitigate arsenic polluted soil for developing low-cost bio-remediation technology. He developed and disseminated integrated organic farming system models (IOFS) suitable for small and marginal farmers for livelihood improvement of tribal farmers. He also developed best management practices for zero budget natural farming and disseminated in Sikkim for improving soil health and enhancing crop productivity under the AI-NPOF (as PI) project. First time, he found that sustainable management of limiting soil phosphorus was enhanced with buckwheat cultivation (as cover crop) in acidic soil of Sikkim. He developed integrated organic nutrient management package of practices for major crops (13) of Sikkim. He assessed the potentiality of different liming material (dolomite, bio char, organic manures etc.) for soil acidity management in Sikkim. He also assessed the environmental fate (persistent, mobility and sorption) of hazardous pesticides in soil and water system along with their impact on soil health, carbon mineralization and enzyme activity. These research evidences on pros and cons have contributed to him (as PI) heading DST-SERB, Govt. of India funded project (2019); NMHS funded project (2020), DBT, Govt. of India funded project (2021) and DRDO-DIHAR (2024). Based on his academic excellence and outstanding contribution in soil, water and environmental sciences, he was awarded with the prestigious NAAS (National Academy of Agricultural Sciences, New Delhi) Young Scientist Award-2021, institute best scientist award (ICAR RC for NEH Region)-2018 and Associate-West Bengal Academy of Science and Technology (2024). His outstanding research publications includes more than 200 peer review research articles with the total google scholar citation 4200 and h-index of 37.

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**Social Sciences** 



Dr Prabina Kumar Meher



# राष्ट्रीय कृषि विज्ञान पुरस्कार 2025 RASHTRIYA KRISHI VIGYAN PURASKAR 2025

**Dr Prabina Kumar Meher** has pioneered computational methods for the discovery of abiotic stress- responsive biomolecules, leveraging machine learning to develop predictive models for key biological components such as heat-shock proteins, gigantean proteins, circadian genes, abiotic stress-responsive microRNAs, long non-coding RNAs, transcription factors, and subcellular localization patterns of miRNAs/mRNAs. His work bridges the gap between computational biology and stress physiology, enabling rapid identification of stress-related biomarkers. In translating research into tangible tools, he has developed user-friendly online prediction platforms, widely adopted by the global scientific community. He has received 5 copyrights for computational tools, and 3 software certifications from the Indian Council of Agricultural Research (ICAR), underscoring their practical utility. The computational resources are actively utilized by researchers worldwide, facilitating discoveries in crop resilience and stress adaptation. His work exemplifies translational bioinformatics, with far-reaching implications for sustainable agriculture and climate-resilient crop development.

# Details of Awardees for Rashtriya Krishi Vigyan Puraskar 2025

# 1. INNOVATION AND TECHNOLOGY IN THE FIELD OF AGRICULTURE AND ALLIED SCIENCES 2025

To recognize agricultural scientists and researchers who have developed impact-making innovations and technologies.

#### **Animal & Fisheries Sciences**

Dr Kajal Chakraborty
 Director, ICAR-NBFGR, Lucknow, Uttar Pradesh

#### **Crop & Horticultural Sciences**

Dr Sharat Kumar Pradhan
 ADG (FFC&NASF), ICAR Head Quarter, New Delhi

#### **NRM & Agricultural Engineering**

Dr Hari Kuppusamy (Team Leader)
 Principal Scientist, ICAR-SBI, Coimbatore

#### **Social Sciences**

Dr Dheeraj Singh
 Head, Division of Integrated Farming Systems, ICAR-CAZRI, Jodhpur, Rajasthan

# 2. RESEARCH IN THE FIELD OF AGRICULTURE AND ALLIED SCIENCES 2025

To recognize the outstanding impact-making contributions of agricultural scientists and researchers.

#### **Animal & Fisheries Sciences**

 Prof. Samit Kumar Nandi ICAR National Professor WBUAFS, Kolkata, West Bengal

#### **Crop & Horticultural Sciences**

Dr Prasanta K. Dash
 ADG (CC), ICAR Head Quarter, New Delhi

#### **NRM & Agricultural Engineering**

Dr Hanuman Sahay Jat
 Director, ICAR-IIMR, Ludhiana

# 3. OUTSTANDING INTER-DISCIPLINARY TEAM RESEARCH IN AGRICULTURE, AGRICULTURAL EDUCATION. EXTENSION AND ALLIED SCIENCES 2025

To exclusively recognize and incentivize outstanding inter-disciplinary teams of agricultural scientists jointly planning and implementing integrated programmes/projects of research and promote the understanding that practical and useful research would normally have to be interdisciplinary in approach.

#### **Shared between two Teams:**

- Dr Raman Meenakshi Sundaram (Team Leader)
   Director, ICAR-IIRR, Hyderabad
- Dr Parveen Kumar (Team Leader), Director, ICAR-CCARI, Goa

# 4. OUTSTANDING WOMAN SCIENTIST IN AGRICULTURE, AGRICULTURAL EDUCATION. EXTENSION AND ALLIED SCIENCES 2025

To recognize outstanding research/extension/innovative work done by women scientists and to encourage women scientists to strive for excellence in agricultural research and allied sciences including education and extension.

Prof. P.D. Kamala Jayanthi
 ICAR National Professor, ICAR-IIHR, Bangalore, Karnataka

# 5. OUTSTANDING YOUNG SCIENTIST IN THE FIELD OF AGRICULTURE AND ALLIED SCIENCES 2025

To recognize and encourage young scientists who made an exceptional contribution in any field of agriculture and allied sciences.

#### **Animal & Fisheries Sciences**

• **Dr Vinod Vishnu Kadam,** Sr. Scientist, ICAR-CSWRI, Avikanagar, Rajasthan

#### **Crop & Horticultural Sciences**

- Dr KSVP Chandrika (Shared), Scientist (Sr. Scale), ICAR-IIOR, Hyderabad, Telangana
- Dr Shyam Sundar Dey (Shared)
   Pr. Scientist, Horticultural Sciences, ICAR-IARI, New Delhi

#### **NRM & Agricultural Engineering**

- Dr Pandiselvam Ravi (Shared), Sr. Scientist, ICAR-IARI, New Delhi
- Dr Shaon Kumar Das (Shared)
   Sr. Scientist (Ag. Chemistry), ICAR R.C. for NEH, Sikkim, Gangtok, Sikkim

#### **Social Sciences**

• Dr Prabina Kumar Meher, Sr. Scientist, ICAR-IARI, New Delhi