

Dr. P. K. Rai

Director

ICAR-National Institute of Biotic Stress Management
(Deemed University), Raipur



Born on May 05, 1968 in Kumbh village of Azamgarh district in Uttar Pradesh, Dr. P. K. Rai did his graduation from Gorakhpur University and post-graduation and Ph.D. from Banaras Hindu University. Dr. Rai joined as Director, ICAR- National Institute of Biotic Stress Management (Deemed to be University) on April 05, 2025. Prior to this, Dr. Rai served as Director, Indian Institute of Rapeseed-Mustard Research, Bharatpur from January 01, 2017 to March 01, 2025. He started his professional career in 1996 as Assistant Professor (Plant Pathology) at S.K.N. College of Agriculture (SKN University of Agriculture, Jobner). In 2005, he joined Sardar Vallabhbhai Patel University of Agriculture & Technology, Meerut as Associate Professor (Pathology & Microbiology) in the College of Biotechnology. In 2009, Dr. Rai was selected as Principal Scientist (Plant Pathology) and was placed at ICAR-Directorate of Rapeseed-Mustard Research, Bharatpur.

He worked on pigeon pea blight and wilt, wilt of cumin, *Alternaria* blight of *Cassia angustifolia* and *Catharanthus roseus*, chickpea *Rhizobia*, white rust, *Sclerotinia* rot and *Alternaria* blight of mustard. Developed RIL populations for *Alternaria* blight and drought/heat tolerance. Identified superior recombinant inbred lines for seed yield and related traits and assessed genetic variation among drought tolerant recombinant inbred lines in Indian mustard. Validated molecular markers for marker-assisted pyramiding of white rust resistance loci in Indian Mustard. Mycelial compatibility groups and variability in *Sclerotinia sclerotiorum* Indian mustard was studied. Eco-friendly module was developed for management of major diseases of India mustard. Associated in developing 06 Indian mustard varieties and 22 trait specific germplasms. He has more than 150 research papers in his credit published in journals of International and National repute.

As Director ICAR-Indian Institute of Rapeseed Mustard Research and Project Coordinator, All India Coordinated Research Project on Rapeseed-Mustard, several initiatives were taken by him to restructure Rapeseed-Mustard coordinated project including discontinuation of non-performing centres, opening of new and strengthening of some centres, initiation of new research programs on crop improvement, crop production and crop protection. Post-harvest management of mustard value chain was demonstrated in the states of Jharkhand, Assam, Manipur, Arunachal Pradesh and Rajasthan by establishing mini mustard oil expeller. Linkage established with many SAUs and ICAR institutes for the betterment of Rapeseed-mustard production technologies, particularly North eastern states and Bundelkhand region. Eight mustard seed-hubs were established in Rajasthan, Uttar Pradesh, Haryana, Madhya Pradesh, West Bengal and Assam to ensure availability of certified seed of improved varieties at local level. MoU signed to provide consultancy in world bank funded project Assam Agribusiness and Rural Transformation Project (APART) worth Rs. 2459.83lakh.

Awards and Honors

Dr. Rai has received several awards from professional scientific societies including Dr. P.R. Kumar Outstanding Brassica Research Award by Society for Rapeseed–Mustard Research, Fellow Award of Indian Society of Mycology and Plant Pathology, Prof. J.S. Dastur Memorial Award of Academy for Environment and Life Sciences, Fellowship Award of Society for Plant Research, Fellowship award Society of Rapeseed Mustard Research, Life time achievement award of Ashtha Society, Best Scientist Award of ICAR-IIRMR, Bioved-Honorary Fellowship award of Bioved society, Fellowship Award of Society of Recent Development in Agriculture.