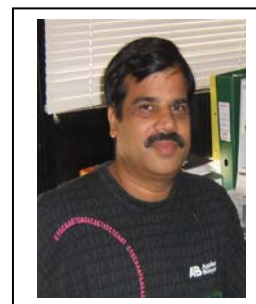


## SCIENTISTS PROFILE



1. Name & Designation : Dr. Arup Kumar Mukherjee  
Senior Scientist
2. Date of Birth : 13<sup>th</sup> November, 1965
3. Date of Joining ICAR : 20<sup>th</sup> July, 2009
4. Date of joining the present post : 20<sup>th</sup> July, 2009
5. Qualifications : Ph.D
6. Post Doctoral Research Experience/Training:
  - PDF in the National Research Centre on Plant Biotechnology, Indian Agriculture Research Institute, New Delhi in the year 1997-1999. Title of the Project: *DNA Fingerprinting, Gene Tagging and Mapping of Economically Important Traits of Indian Mustard by Using Molecular Markers.*
  - DBT Over Seas Associate ship in the Department of Biology, Israel Institute of Technology, Technion, Haifa 32000, Israel, during the period from 8<sup>th</sup> March 2006 to 7<sup>th</sup> March 2007. Title of the Project: *Common pathways to leaf senescence and defense response: proteomic approach.*
7. Area of Specialization/research interest: Plant Pathology, Plant Biotechnology.
8. Significant Contribution including products and patents (Five Bullets):
  - First to map white rust resistance gene in India.
  - First to identify compatible interaction between *Arabidopsis thaliana* and *Alternaria brassicicola* using transcriptomic signature.
  - First to study proteomics of incompatible interaction between *Arabidopsis thaliana* and *Alternaria brassicicola*.
  - First to report Cotton Leaf Roll Dwarf Virus from India.
  - First to report *Sclerotium delphinii* as cotton pathogen.
9. Awards/Honours:
  - Received SAB Merit Award for 2012 from the Society of Applied Biotechnology for outstanding achievement in Agricultural Biotechnology.
  - Selected as a Fellow of the Society of Applied Biotechnology.
  - Qualified the National Eligibility Test (NET) conducted by Agricultural Scientists Recruitment Board (ASRB), Indian Council of Agricultural Research (ICAR), New Delhi, in the Year 1996.
  - Got Post Doctoral Fellowship of Department of Biotechnology, Government of India, New Delhi, in the session 1997–1999 and placed at National Research Centre on Plant Biotechnology, IARI, and New Delhi.
  - Has been awarded with the Long term DBT Overseas Associate ship Award for the year 2004-2005 and working on “Common pathways to leaf senescence and defense response in plants: proteomic approach.” Under the supervision of Prof. S. Gepstein and Prof B.A. Horwitz, Department of Biology, The Technion-Israel Institute of Technology, Haifa, Israel.
  - Delivered Prestigious Prof. Anil S. Khalatkar Memorial Lecture at Nagpur University on “Proteomics in Host – Parasite Relationship in Plants” 24<sup>th</sup> January, 2012.
  - Acted as External Examiner in Department of Botany and Biotechnology of Utkal University, Sambalpur University, Orissa University of Agriculture and Technology and Gauhati University and Nagpur University.
  - Recognized as Research guide in the Discipline of Botany by Utkal University, Bhubaneswar, Orissa.

- Acted as Guest Faculty in The Utkal University (Botany Deptt and Biotechnology Deptt.), Ravenshaw College (Biotech), Khalikote College (Biotech.) of Orissa.
- Delivered invited talks to different Seminars and Symposiums.
- Acted as paper setter and external examiner in Biotechnology of different Universities.
- Members of editorial board of numbers of journals of National and International repute including Annals of Plant Protection Sciences, Asian Journal of Biotechnology, International Journal of Botany, International Journal of Plant Pathology, Plant Pathology Journal, Journal of Plant Science, International Journal of Modern Botany, [International Journal of Botany](#) (ISI indexed), World Research Journal of Plant Pathology, Research Trend (Biological Forum), International Journal of Biotechnology and Allied Fields, Wudpecker Journal of Agricultural Research.
- Acted as reviewer for Genes & Genomics, African J Biotech, Plant Molecular Biology Reports, Molecular Biology Reports, Journal of Plant Breeding and Crop Science, Caryologia, Genetica, Tropical Life Science Research, Indian Journal of Biotechnology, Indian Journal of Geo Marine Sciences, Science Asia, Aquatic Botany, Cell Biology International, Research in Pharmaceutical Biotechnology, International Journal of Genetics and Molecular Biology, American Journal of Plant Sciences, Science Journal of Biotechnology, African Journal of Microbiology, International Research Journal of Agricultural Science, African Journal of Agricultural Research, Indian Phytopathology

10. Publications (10 best):

- i. Pal A, Swain SS, Das AB, **Mukherjee AK** and Chand PK (2013). Stable germ line transformation of a leafy vegetable crop amaranth (*Amaranthus tricolor* L.) mediated by *Agrobacterium tumefaciens*. **In Vitro Cellular and Developmental Biology Plant** 49: 114–128.
- ii. **Mukherjee AK**, Mohapatra NK and Nayak P (2010). Estimation of area under the disease progress curves in a rice blast pathosystem from two data points. **European Journal of Plant Pathology** 127: 33-39.
- iii. **Mukherjee AK**, Carp. M.J, Zuchman R, Ziv T, Horwitz BA and Gepstein S (2010). Proteomics of the response of *Arabidopsis thaliana* to infection with *Alternaria brassicicola*. **Journal of Proteomics** 73: 709-720.
- iv. **Mukherjee AK**, Lev S, Gepstein S and Horwitz BA (2009). A compatible interaction of *Alternaria brassicicola* with *Arabidopsis thaliana* ecotype DiG: evidence for a specific transcriptional signature BMC. **Plant Biology** 9: 31.
- v. Mattagajasingh I, Acharya LK, **Mukherjee AK**, Panda PC and Das P (2006). Genetic relationships among nine cultivated taxa of *Calliandra* Benth. (*Leguminosae: Mimosoideae*) using random amplified polymorphic DNA (RAPD) markers. **Scientia Horticulturae** (Netherlands) 110: 98-103.
- vi. **Mukherjee AK**, Mohapatra NK, Suriya Rao AV and Nayak P (2005). Effect of nitrogen fertilization on the expression of slow- blasting- resistance in rice. **Journal of Agricultural Science** (UK) 143: 385-393.
- vii. **Mukherjee AK**, Acharya LK, Mattagajasingh I, Panda PC, Mohapatra T and Das P (2003). Molecular characterization of three *Heritiera* species using AFLP markers. **Biologia Plantarum** (Netherlands) 47(3): 445-448.
- viii. Das AB, **Mukherjee A K** and Das P (2001). Molecular phylogeny of *Heritiera Aiton* (Sterculiaceae), a tree mangrove: variations in RAPD markers and nuclear DNA content. **Botanical Journal of the Linnean Society** (U.K.) 136: 221-229.
- ix. **Mukherjee AK**, Mohapatra T, Varshney A, Sharma R, and Sharma RP (2001) Molecular mapping of a locus controlling resistance to *Albugo candida* in Indian mustard. **Plant Breeding** (Germany) 20(6): 483-487.
- x. Mauria S, Singh NN, **Mukherjee A K**, and Bhat KV (2000). Isozyme characterisation of Indian maize inbreds. **Euphytica** (Netherlands), 112:253-259.