

## LIST OF PUBLICATIONS

### A. Publications

1. Singh SP, **Roy JK**, Sawant SV (2010) Application of biotechnology in generating male sterility systems in plants (Book chapter) (In press).
2. Kumar J, Kumar A, **Roy JK**, Tuli R, Khan JA (2010) Identification and molecular characterization of begomovirus and associated satellite DNA molecules infecting *Cyamopsis tetragonoloba*. Virus Genes (DOI: 10.1007/s11262-010-0482-7). **I.F. -1.5.**
3. **Roy** et al. (2010) Association mapping of spot blotch resistance in wild barley. Molecular Breeding 26: 243-256. **I.F. 2.0.**
4. Alsop BP, **Roy JK**, Steffenson BJ (2010) Multiple disease resistance QTL analysis of two wild x cultivated barley populations. Phytopathology (accepted after revision). **I.F. 2.4**
5. Kumar A, **Roy JK**, Kulwal P, Balyan HS and Gupta PK (2009) QTL analysis for growth related traits in intervarietal mapping populations of common wheat. Genetics and Plant Breeding (in press).
6. Steffenson BJ, **Roy JK**, Muehlbauer GJ, Smith KP, Yahvaoui A, Valkoun J, Grando S (2008) Multiple disease resistance in the Wild Barley Diversity Collection. In: Proc. 10th Intern. Barley Genet. Symp. April 5-10, 2008, Alexandria, Egypt. **I.F. 0.0.**
7. Steffenson BJ, Olivera P, **Roy JK**, Jin Y, Smith K, Gary JM (2007) A walk on the wild side: mining wild wheat and barley collections for rust resistance genes. Crop and Pasture Science (Formerly Aust J Agri Res) 58: 532-544. **I.F. 1.13.**
8. **Roy JK**, Bandopadhyay R, Balyan HS, Gupta PK (2006) Association analysis of agronomically important traits using SSR, SAMPL and AFLP markers in bread wheat. Current Science 90: 683-689. **I.F. 0.80.**
9. Gupta AK, Kang BY, **Roy JK** and Rajora OP (2005) Large scale development of selectively amplified microsatellite polymorphic loci (SAMPL) markers in spruce (*Picea*). Molecular Ecology Resources (Formerly Molecular Ecology Notes) 5:481-483. **I.F. 1.13.**
10. **Roy JK**, Lakshmikumara M, Balyan HS, Gupta PK (2004) AFLP-based genetic diversity and its comparison with diversity based on SSR, SAMPL, and phenotypic traits in bread wheat. Biochemical Genetics 42: 43-59. **I.F. 0.75.**
11. Gupta PK, Balyan HS, Prasad M, **Roy JK**, Bandopadhyay R, Kumar N, Sharma S, Kulwal PL, Rustgi R, Singh R, Goyal A, Kumar A and Prashanth SN (2003) Development and use of molecular markers for QTL mapping and genomics research in bread wheat. Ann Wheat Newsl 49: 42-46. **I.F. 0.0.**
12. Kulwal PL, **Roy JK**, Balyan HS, Gupta PK (2003) QTL mapping for growth and leaf characters in bread wheat. Plant Science 164: 267-277. **I.F. 1.97.**
13. Gupta PK, Sharma PK, Balyan HS, **Roy JK**, S Sharma and Nevo E (2002). Polymorphism at rDNA loci in wild and cultivated barley and its relation with climatic variables. Theor. Appl. Genet. 104: 473-481 **I.F. 3.49.**

14. **Roy JK**, Balyan HS, Prasad M and Gupta PK (2002). Use of SAMPL for a study of DNA polymorphism, genetic diversity and possible gene tagging in bread wheat. *Theor. Appl. Genet.* 104: 465-472 **I.F. 3.49.**
15. Harjit-Singh, Prasad M, Varshney RK, **Roy JK**, Balyan HS, Dhaliwal HS and Gupta PK (2001). STMS markers for grain protein content and their validation using near-isogenic lines in bread wheat. *Plant Breeding* 120: 273-278. **I.F. 1.28.**
16. Varshney RK, Prasad M, **Roy JK**, Roder MS, Balyan HS and Gupta PK (2001). Integrated physical maps of 2DL, 6BS and 7DL carrying loci for grain protein content and preharvest sprouting tolerance in bread wheat. *Cereal Research Communication* 29: 33-40. **I.F. 1.19.**
17. Prasad M, Varshney RK, **Roy JK**, Balyan HS and Gupta PK (2000). The use of microsatellites for detecting DNA polymorphism, genotype identification and genetic diversity in wheat. *Theor. Appl. Genet.* 100: 584 -592 **I.F. 3.49.**
18. Varshney RK, Prasad M, **Roy JK**, Kumar N, Harjit-Singh, Dhaliwal HS, Balyan HS and Gupta PK (2000). Identification of eight chromosomes and a microsatellite marker on 1AS associated with QTL for grain weight in bread wheat. *Theor. Appl. Genet.* 100: 1290-1294. **I.F. 3.49.**
19. Varshney RK, Kumar A, Balyan HS, **Roy JK**, Prasad M and Gupta PK (2000). Characterization of Microsatellites and development of chromosome specific STMS markers in bread wheat. *Plant Mol. Bio. Rep.* 18: 5-16. **I.F. 0.74.**
20. **Roy JK**, Prasad M, Varshney RK, Balyan HS, Blake TK, Dhaliwal HS, Singh H, Edwards KJ and Gupta PK (1999). Identification of a microsatellite on chromosome 6B and a STS on 7D of bread wheat showing association with preharvest sprouting tolerance. *Theor. Appl. Genet.* 99: 336-340. **I.F. 3.49.**
21. Prasad M, Varshney RK, Kumar A, Balyan HS, Sharma PC, Edwards KJ, Singh H, Dhaliwal HS, **Roy JK** and Gupta PK (1999). A microsatellite marker associated with a QTL for grain protein content on chromosome arm 2DL of bread wheat. *Theor. Appl. Genet.* 99: 341-345. **I.F. 3.49.**
22. Balyan HS, Sharma PC, Ramesh B, Kumar A, Varshney RK, **Roy JK**, Dhaliwal HS, Singh H and Gupta PK (1998). Towards development of molecular markers for tagging genes for quality traits in bread wheat. In: *Proc. 9th Intern. Wheat Genet. Symp.* vol. 3. (ed. A. E. Slinkard), University Extension Press, University of Saskatchewan, Canada, pp. 84-88. **I.F. 0.0.**
23. Varshney RK, Sharma PC, Gupta PK, Balyan HS, Ramesh B, **Roy JK**, Kumar A and Sen A (1998). Low level of polymorphism detected by SSR probes in bread wheat. *Plant Breeding* 117: 182-184. **I.F. 1.28.**
24. Sen A, Balyan HS, Sharma PC, Ramesh B, Kumar A, **Roy JK**, Varshney RK and Gupta PK (1997). DNA amplification fingerprinting (DAF) as a new source of molecular markers in bread wheat. *Wheat Information Service* 85: 35-42. **I.F. 0.0.**

## **B. Review Papers**

25. Gupta PK, **Roy JK** and Prasad M (2001). Single Nucleotide Polymorphisms (SNPs) in Plants: A new paradigm in molecular marker technology and DNA polymorphism detection. *Curr. Sci.* 80: 524-535. **I.F. 0.80.**
26. Gupta PK, Varshney RK and **Roy JK** (2001). Plant Genomics for crop improvement. In: *Perspectives in Cytology and Genetics* (eds. GK Manna & SC Roy), 10: 23-40. **I.F. 0.0.**
27. Gupta PK, **Roy JK** and Prasad M (1999). DNA chips, microarrays and genomics. *Curr. Sci.* 77: 875-884. **I.F. 0.80.**

## **C. Newsletters/Reports**

28. Gupta PK and **Roy JK** (2002). Molecular markers in crop improvement: Present Status and Future Needs in India. *Plant Cell, Tissue and Organ Culture* 70: 229-234.
29. Gupta PK, Balyan HS, Kumar S, Prasad M, **Roy JK**, Kumar N, Sharma S, Kulwal PL, Rustgi S and Singh R (2002) Development and use of molecular markers for genetic mapping and marker-assisted selection (MAS) in wheat. *Annual Wheat Newsletter* 48: 76-80.
30. Gupta PK, Balyan HS, Prasad M, **Roy JK**, Kumar N, Sharma S and Kulwal PL (2001). Marker assisted selection for some quality traits in bread wheat. *Annual Wheat Newsletter* 47: 68-72.
31. Gupta PK, Balyan HS, Sharma PC, Ramesh B, Varshney RK, **Roy JK** and Prasad M (1999). Development of molecular markers for wheat breeding at Meerut, a centre of wheat biotechnology network in India. *Annu. Wheat Newsl.* 45: 78-82.