

## Job Opening

### Post Doctoral Fellow, Crop Genomics & Resistance Breeding - Requisition No 31913

<b>Location :</b>	<b>Full Time :</b>	<b>Posting End Date :</b>
Plant Science	Yes	Apr/20/2024
<b>Expected Start Date :</b>	<b>Permanent :</b>	
May/01/2024	No	

#### Job Description :

Department of Plant Science  
Faculty of Agricultural and Food Sciences  
University of Manitoba  
Winnipeg, Manitoba, Canada  
Position # 21668

The Department of Plant Science invites applications for Postdoctoral Fellow in Crop Genomics and Resistance Breeding, commencing May 1, 2024, or on a date mutually agreed upon for a term of 3 commensurate with qualifications and experience.

This research aims to tackle the devastating effects of Fusarium Head Blight (FHB) on durum wheat by employing innovative genomic techniques to identify new resistance alleles. The project encompasses assembly, targeted sequencing of resistance QTLs, and the development of high-throughput markers for breeding programs.

#### Responsibilities :

Duties for the position include - Conduct high molecular weight DNA isolation and library preparation for Oxford Nanopore Technologies (ONT) sequencing; Generate and analyze ONT sequencing data polymorphisms associated with FHB resistance; Develop and evaluate competitive Allele-Specific PCR (KASP) or PCR markers for marker-assisted selection; Collaborate with a multidisciplinary team of breeders to integrate findings into durum wheat breeding programs; Contribute to the preparation of research publications and presentations for scientific conferences.

#### Qualifications :

The ideal candidate must have a PhD in Plant Science, Genetics, Genomics, Bioinformatics, or a related field. The candidate must have experience with next-generation sequencing technologies, paired-end sequencing platforms such as PacBio or ONT, have a strong background in bioinformatics and data analysis, excellent communication skills, both written and verbal, the ability to work independently and as part of a multidisciplinary team. Familiarity with molecular breeding techniques and marker development is highly desirable.

#### Additional Information :

The Department of Plant Science offers educational and research programming across areas such as sustainable cropping systems, agronomy, plant physiology, breeding and genetics. Since 1937, we are internationally recognized for plant science research and are proud to be the home of the first canola variety ever developed.

Candidates are asked to submit a cover letter, CV, and degree certificate.

Please forward applications by email to Dr. Harmeet Chawla at [harmmeet.chawla@umanitoba.ca](mailto:harmmeet.chawla@umanitoba.ca). Closing date is April 20, 2024.

Formal review of applications will begin April 21, 2024 and will continue until filled.

If you require accommodation supports during the recruitment process, please contact [UM.Accommodation@umanitoba.ca](mailto:UM.Accommodation@umanitoba.ca) or 204-474-7195. Please note this contact information is for accommodation purposes only.

Application materials, including letters of reference, will be handled in accordance with the protection of privacy provision of The Freedom of Information and Protection of Privacy Act (Manitoba). Resumes and vitae may be provided to participating members of the search process.

The University of Manitoba is committed to the principles of equity, diversity & inclusion and to promoting opportunities in hiring, promotion and tenure (where applicable) for systemically marginalized groups excluded from full participation at the University and the larger community including Indigenous Peoples, women, racialized persons, persons with disabilities and those who identify as 2SLGBTQIA+ (bisexual, trans, questioning, intersex, asexual and other diverse sexual identities). All qualified candidates are encouraged to apply; however, Canadian citizens and permanent residents will be given priority.

#### About UM:

The University of Manitoba is a driving force of innovation, discovery and advancement. Our momentum is propelled by our campus community - UM faculty, staff and students whose determination and passion drive us to make the world for the better. Our teaching, learning and work environment is uniquely strengthened and enriched by Indigenous perspectives. With two main campuses in Winnipeg, satellite campuses throughout the province, and a global presence, UM's impact is global.

Discover outstanding employee benefits, experience world-class facilities and join a dynamic community that values reconciliation, sustainability, diversity, and inclusion. We are one of Manitoba's Top 100 Canada's Best Diversity Employers. At the University of Manitoba, what inspires you can change everything.

The City of Winnipeg ([www.tourismwinnipeg.com](http://www.tourismwinnipeg.com)), located where the Red and Assiniboine Rivers meet, is recognized for its vibrant, multicultural community and diverse culture. The city, with a growing population of over 766,000, is home to internationally renowned festivals, galleries and museums, the historic Exchange District and The Forks, and ever-expanding research, education, and business sectors. From across the farmland fields, to the pulse of the cities and towns, The Province of Manitoba's ([www.travelmanitoba.com](http://www.travelmanitoba.com)) people and places - its 100,000 lakes, 92 provincial parks, winding river valleys and diverse landscapes inspire.

[Apply](#)