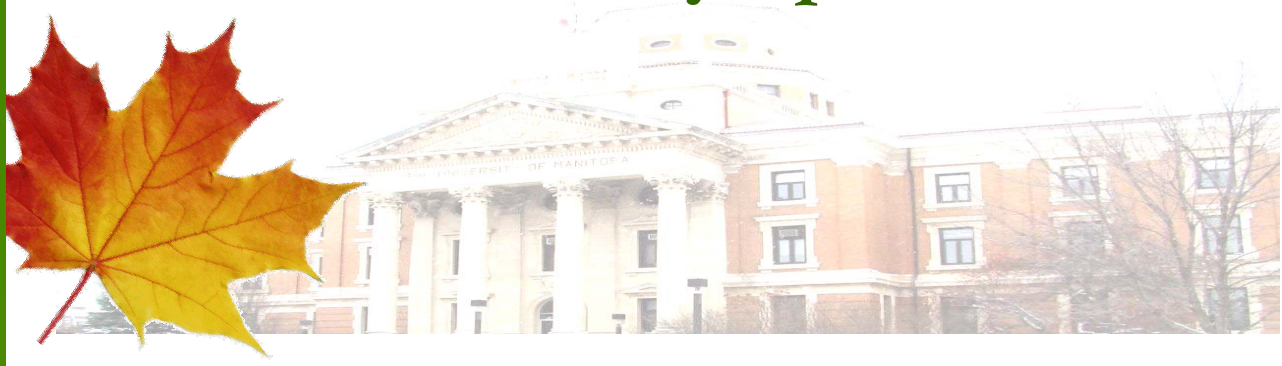
Growing knowledge for the future

25th Annual Plant Science Graduate Students' Symposium



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Silver Jubilee Year

University of Manitoba, Winnipeg, Canada
March 13-14 (Fri - Sat), 2009

25th Annual Plant Science Graduate Students' Symposium

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March 13-14 (Fri - Sat), 2009

Important dates:

Registration deadline: Friday, **December 5, 2008**
Abstract deadline: Friday, **January 30, 2009**
Hotel booking: TBA

Tentative Symposium Agenda

Date	Time	Particulars	Venue
Friday, March 13	1:30pm - 2:30pm	Registration	Plant science atrium
	2:30pm - 3:00pm	Lab tours in plant science Building	Meet at registration desk
	3:00pm - 6:00pm	Pre-symposium tours	Meet at registration desk
	6:00pm - 7:30pm	Opening reception and welcome dinner	TBA
	8:00pm - 9:30pm	Indoor night event	TBA
Saturday, March 14	7:00am - 8:00am	Breakfast	Plant science atrium
	8:00am - 8:15am	Symposium opening remarks	TBA
	8:15am - 10:30am	Session I - Agronomy and Plant Pathology	TBA
		Concurrent session I - Classical Plant Breeding	TBA
	10:30am - 10:45am	Morning coffee	Plant science atrium
	10:45am - 12:00pm	Session II - Classical Plant Breeding	TBA
	12:00pm - 1:00pm	Symposium luncheon	Plant science atrium
	1:00pm - 2:45pm	Session III - Molecular Biology and Physiology	TBA
	2:45pm - 3:00pm	Afternoon coffee	Plant science atrium
	3:00pm - 5:30pm	Session IV - Molecular Biology and Physiology II	TBA
	6:00pm - 9:00pm	Banquet and awards reception	TBA

Instructions for preparing the abstracts

All the presentations are oral by default and they are limited to 20 minutes, with 15 minutes for presentation and 5 minutes for questions. However, it is subjected to change depending on the number of abstracts we receive. Exact details will be communicated later.

Please adhere to the following format when preparing your abstract

- Font: Times New Roman - size 12 throughout; alignment-left
- Title must be bold and first letter capitalized
- Italicize all the Latin names
- Include the first name, middle initial and last name of all author (s) and their affiliation (s)
- Indicate the e-mail address of the corresponding author

The abstract should contain no more than 300 words and must include specific information about the results and conclusions of the study. Please do not include statements such as 'results will be discussed'. If the results are not available already, the project proposal/preliminary findings could be presented. Please be informed that the abstracts will not be proof read except for the alignments and will be printed in the symposium proceedings as submitted by the author. Please make sure that the abstract is corrected and perhaps verified by your colleagues/academic advisor.

Submission: The abstracts must be submitted via e-mail – **umbagava@cc.umanitoba.ca**
Deadline: **January 30, 2009**

Please use the following abstract as a model when preparing your abstract

Genetic control of cold hardiness and vernalization requirement in winter wheat

[1]Anita L. Brule-Babel[1] and [2]Brian D. Fowler[*]
Department of Plant Science, University of Manitoba, Winnipeg, Canada, R3T 2N2
Crop Development Centre, University of Saskatchewan, Saskatoon, Canada, S7N 0W0
[*] Corresponding author, E-mail: brian.fowler@usask.ca

A high level of cold hardiness is essential to ensure consistent overwintering of wheat (*Triticum aestlvum* L.) in the Northern Great Plains region of North America. Consequently, a clear understanding of the genetic control of cold hardiness would facilitate plant breeding efforts directed at cultivar improvement for this area. Although several genetic studies have been conducted, there is not a general consensus on the mode of gene action controlling the expression of cold hardiness in wheat. This study used one spring and four winter cultivars representing a wide range of cold hardiness potential to investigate the mode of inheritance and interaction of cold hardiness, determined in a controlled environment that allowed for maximum expression of cold hardiness potential, and vernalization requirement in wheat. Differences in growth habit between parental cultivars were controlled by the V*rn*$_1$ gene. Cold hardiness, estimated as the temperature at which 50% of the plant population was killed (LT_{50}), was controlled by genes with either dominant or additive effects. At least one dominant gene was associated with cold hardiness differences between spring and winter wheat, while genes with mainly additive effects determined differences in cold hardiness among cultivars with the winter growth habit. Broad sense heritability estimates for LT_{50} in the controlled environment considered ranged from 0 to 88% with most estimates exceeding 50%. In the F_2-derived F_3 generation, hardy transgressive segregates were most common in crosses between relatively nonhardy cultivars, but no segregates were significantly hardier than the hardiest parental cultivar. Lack of a vernalization requirement did not hinder the development of cold hardiness; however, distribution of F_2-derived F_3 lines provided evidence of possible genetic linkage or pleiotropism between the gene segregating for growth habit and a gene or genes controlling cold hardiness.

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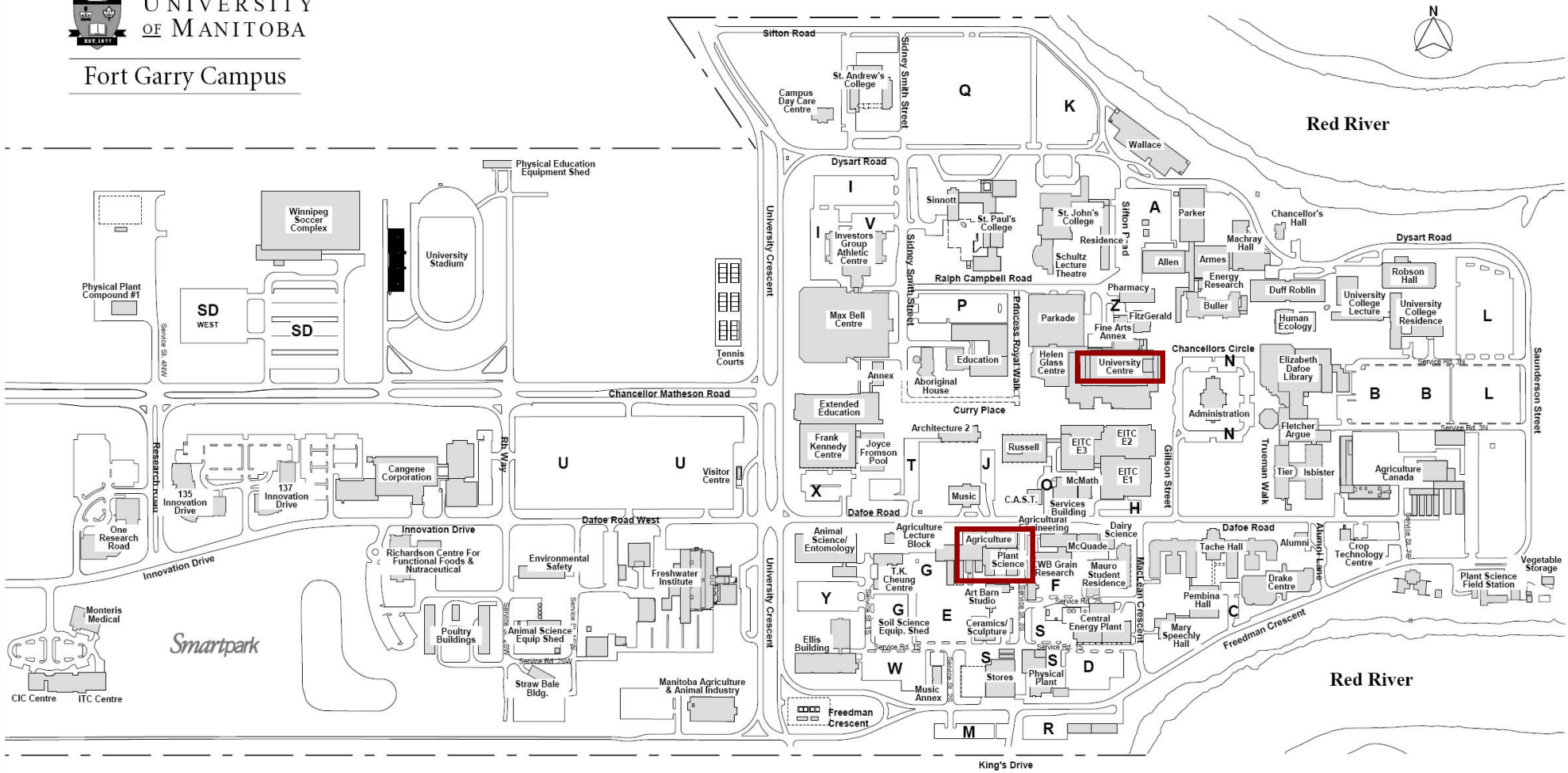

February, 2008

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Physical Plant 89 Freedman Crescent Winnipeg, MB