## Leveraging On-Farm Research to Evaluate New Malting Barley Varieties for Production and Malting Selection in Manitoba

Li Yueshu<sup>1</sup>, Ashley Ammeter<sup>2</sup>, Morgan Cott<sup>2</sup>, Daryl Rex<sup>2</sup>, Andrew Hector<sup>2</sup>
<sup>1</sup>Canadian Malting Barley Technical Centre, Winnipeg, Manitoba, <sup>2</sup>Manitoba Crop Alliance, Carman, Manitoba

Corresponding author's email: <a href="mailto:andrew@mbcropalliance.ca">andrew@mbcropalliance.ca</a>

Manitoba Crop Alliance's Research on the Farm trial program conducts scientific research with farmer members, on their fields, using their equipment. Protocols are simple, easy to implement and are used to determine whether a practice is effective through assessment of economic, agronomic and environmental parameters. Using sites across Manitoba, farmers, Manitoba Crop Alliance and the Canadian Malting Barley Technical Centre evaluated the agricultural characteristics and malting quality of malting barley varieties. Between 2020 and 2022, 15 trials were conducted testing nine malting barley varieties (AAC Connect, AAC Goldman, AAC Prairie, AAC Synergy, CDC Bow, CDC Churchill, CDC Copeland, CDC Copper, CDC Fraser). Among the 15 site-years, eight site-years showed a statistically significant difference in yield between varieties. Furthermore, there were varietal differences in germination percentage at seven site-years, with multiple varieties failing to meet malt quality standards at these sites.