

## Variety Registration Application for the Variety: TR06673

### Proposed Denomination: Busby

#### Origin and Breeding History

**Pedigree:** H93089(F1)/Seebe  
**Original Cross Made:** 1994  
**Alberta Agriculture Line #:** H94034003  
**Western 2 Row Barley Co-op Test #:** TR06673  
**Breeding Method:** Modified Bulk Pedigree

H93089 is a Field Crop Development Centre (FCDC) breeding line derived from the cross I92121/AC Metcalfe, with I92121 being an introduction to the FCDC program from North Dakota State University barley program, with the pedigree being ND7085/ND4994-15//ND7556. AC Metcalfe is a malt barley line developed by Dr. Bill Legge at Agriculture and Agri-Food Canada, Brandon.

Seebe is a variety released by the Field Crop Development Centre in 1992. It was derived from the cross Masurka//Muller/Heydla, introduced to the Field Crop Development Centre from the CIMMYT program as an F<sub>2</sub> line in 1979.

The original cross H94034 was made in 1994 at the Field Crop Development Centre, Lacombe, Alberta. The F<sub>1</sub> was increased in El Centro, California in 1994-95. The F<sub>2</sub> – F<sub>6</sub> generations were grown in bulk populations from 1995 – 1999. From the F<sub>6</sub> bulk, 200 heads were selected to be grown as F<sub>7</sub> headrows in 2000. From these headrows the line H94034003 was selected to be grown in yield trials from 2001-2007.

While this line was in yield trials, purification nurseries were grown at each level of yield testing for removal of variants and to compile detailed descriptions. In 2004, 200 heads were grown out from a bulk increase plot as individual rows. Heads picked provided the source for a Pre-Breeder Headrow nursery in 2005, and breeder rows and plots in 2006. The 2006 plots were lost to hail and were grown again in 2007. These plots were bulked to form the first breeder seed of this variety, made up of 197 F<sub>14</sub> breeding lines.

Selection criteria used for this variety included grain yield, test weight, 1000 kwt, lodging resistance, disease resistance and maturity.

In 2006 this line was entered into the Western Two Row Barley Cooperative Test as TR06673.

Support for registration was granted by the Prairie Recommending Committee for Oats and Barley in 2008.