Feed grain co-op's new variety WFT 603 crosses registration hurdle

WFGDC marks a milestone in its goal of offering a lower-risk feed grain

alternative to corn

Posted 2 hours ago by Daniel Winters



Research plots at the co-op's research farm near Minto.

There's a new wheat in town, and it wasn't developed by any of the usual suspects.

WFT 603, a general purpose wheat variety from the Western Feed Grain Development Co-op Ltd. (WFGD Co-op), recently crossed the regulatory hurdles for registration and will be distributed to members by next spring.

"Our seed will be competitive with other seed companies," said chair David Rourke, who runs a variety of enterprises near <u>Minto</u>.

"Members will be able to keep and clean their own seed, but there is a small charge for on-farm saved seed to help with development of new varieties."

The co-op, formed in 2006 to create high-yielding, fusarium-resistant wheat varieties for animal feed and ethanol production, has seen its share of twists and turns over the years.

Initially established as a way to avoid the Canadian Wheat Board's marketing monopoly and the requirement that all wheat varieties adhere to the now-abolished Kernel Visual Distinguishability (KVD) rule, it has 65 actively farming members in Western Canada who pay a \$10 fee to join.

Early days

In the co-op's early days, there was no way to register a general purpose wheat that did not fit the functional classes, and the lack of a feed wheat variety that could compete with corn meant that the livestock industry was dependent on frozen, spoiled or otherwise subpar grain that was only suitable for feed.

Originally, the plan was to distribute the seed only among members. But the co-op has since decided to pursue registration in order to gain more credibility, make it easier to participate in third-party crop trials and for crop insurance purposes.

"The whole world has changed since we started. Back then, we wouldn't have been able to put it in the registration system, but now we can," he said.

Rourke believes that a breeding program focused on a short-term objective of developing wheat varieties that yield at least 40 per cent more than hard red spring wheat has strong potential for farmers seeking lower-risk, lower-production cost-effective alternatives for feed.

Target yields

Long term, the co-op targets yields of up to 10 MT/hectare by 2020, which Rourke feels is easily within reach through a combination of breeding and agronomic optimization trials that will test advanced lines under various fertilizer and seeding rates as well as seeding dates and fungicide applications.

"We're not that far off on a single-site basis," said Rourke. "Back in 1985, I had 125 bushel/acre wheat on plots. Now we just have to keep refining that to get it on a long-term basis."

Cool weather seems to be the key to getting high yields of wheat, and a 2° reduction in the average growing season temperature appears to be the sweet spot.

"But since we can't control the weather, we have to try to do it through breeding and by finding plants adapted to higher temperatures that give those higher yields that would normally be associated with cooler temperatures," said Rourke.

From the Grainews website: First fusarium-resistant spring wheat now in pipeline

Despite the success of new hybrid corn varieties, Rourke believes that there is still room for wheat grown exclusively for feed uses due to wheat's lower input costs, and the ever-present risk of a 2004-style crop disaster, when a killing frost in August wiped out the corn.

"I think that as farmers, we need options, whether it's wheat, corn, soybeans or canola. As farmers, we're being asked to take on more of the risk ourselves, so I don't think it would be smart to put all our eggs in whatever was the best thing last year," said Rourke.

Promising crosses

The co-op's members include both active agricultural producers and corporate members. Membership fees collected as well as funds awarded by the provincial and federal funding agencies have helped to support the breeding program.

After starting in 2006 with a handful of promising crosses, it has since expanded to more than 300 aimed at breeding wheat lines specifically for the general purpose wheat class suited to end-users such as ethanol plants, livestock feeders and possibly wheat millers.

The WFT 603 variety is an awned, medium-height, general purpose spring wheat with a big red kernel.

Plot trials have shown it has high yield potential at 102 per cent of AC Andrew, 105 per cent of 5702PR, and 104 per cent of Pasteur in Zone 1 General Purpose Co-op Trials based on results from 2011 and 2012.