

Perennial grains soon to be in our fields and on our plates - a first in Canada!



Agro-ecosystem Benefits Compared To Annual Cereals

Decreased

Increased

Seeding costs:
Seed once every
5-6 yrs

Soil erosion

Soil health
attributes

Nutrient
recapture ability

Tillage & soil
disturbance

Nutrient
leaching risk

Carbon
sequestration

Long-term
carbon storage

Greenhouse gas emissions with
reduced farm equipment use

Root activity in the soil to promote
healthy microbial ecosystems

Research Questions To Be Answered

IWG as a dual-purpose crop to provide a cash food grain crop and high quality forage for grazing beef cattle in late fall/early winter in Canada

- Agronomic, soil productivity and cattle performance of the dual purpose integrated system
- Habitat suitability for songbirds and nesting waterfowl
- Whole-system environmental footprint of integrated grain production and cattle grazing
- Economic potential to provide grain crop and cattle feed in the same growing season



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