USDA U.S. DEPARTMENT OF AGRICULTURE

TRITICALE

COVER CROP FACT SHEET FOR IOWA

Triticale Seed

Triticale *(Triticum x Secale)* is a deep-rooted winter hardy annual grass that resembles wheat and cereal rye. The plant looks like wheat, but the awns resemble cereal rye. *(Photo by Jason Johnson)*

Identifying Features

- Blunt and sometimes hairy auricles
- Leaf sheaths and blades are typically hairy
- Medium length ligule

Cultural Traits

- Winter annual grass
- Minimum germination soil temperature: 38º F
- Cold tolerance temperature: -20º F (W) 20º F (S)
- Seeding date: Mid August to Late October* (W)
- Seeding date: Late March to Late April* (S)

Planting Information*

- **Drill** at ¾ - 1½ inches (45 lbs./acre PLS**)
- **Broadcast** (50 lbs./acre PLS)
- **Aerial** (55 lbs./acre PLS)

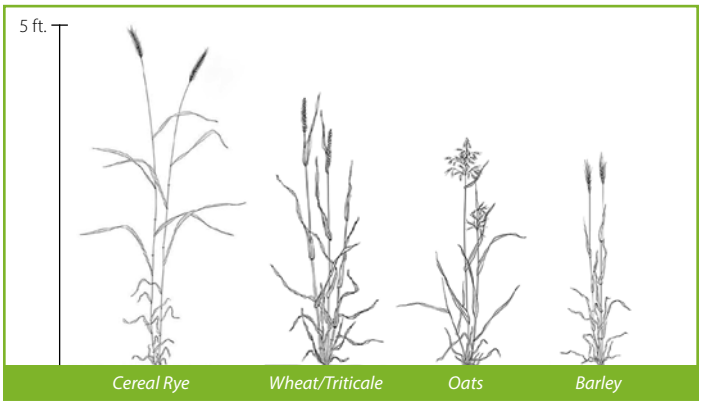
**Refer to Midwest Cover Crop Council (midwestcovercrops.org), local NRCS office recommendations, and/or pertinent financial assistance program requirements for location specific seeding dates and rates.*
***Pure Live Seed*
****W=Winter Triticale S=Spring Triticale*

Additional planting information:

- ~13,000 seeds/lb. (1 bushel = 50 pounds)
- Increase seeding rate when planting on slopes or using triticale for forage/grazing.
- When interseeding triticale, time seeding to match appropriate growth and maturity.
- Broadcasting without incorporation is usually less dependable than drilling or broadcasting with incorporation.

Seedling

Mature



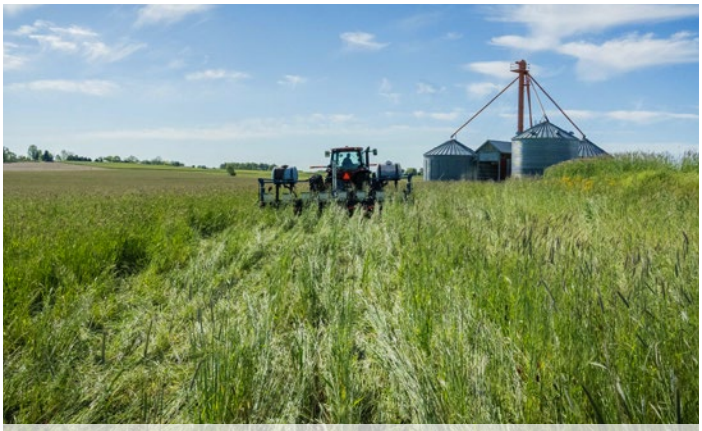
Cover crop grass growth comparison

C:N (Carbon:Nitrogen) Ratios

» Triticale	20:1

TRITICALE COVER CROP FACT SHEET

Triticale in a vegetative stage.



Triticale is part of this 12-species cover crop mix. *(Brandon O'Connor)*

Performance

Dry matter = 2,000 - 5,000 lbs./acre per year
(Biomass quantity is dependent on planting and termination dates and precipitation.)

Performance Ratings

» Cash crop interseed *(early vegetative)*	Good
» Cash crop overseed *(late seed fill)*	Excellent
» Grazing quality	Excellent
» Mechanical forage harvest	Excellent
» Nitrogen fixer	NA
» Nitrogen scavenger	Excellent
» Weed suppression	Very good
» Compaction fighter	Good
» Erosion control	Excellent
» Lasting residue	Excellent
» Quick grower	Very good
» Drought tolerance	Good
» Low fertility tolerance	Very good
» Shade tolerance	Good

Additional Considerations

» **Increased pest pressure:** Triticale could increase the risk of black cutworm and armyworm; risk of green bridge increasing pythium seedling disease; and is a host for penetrans root lesion nematode.

» **Termination:** Time cover crop termination based on goals and experience level. To reduce potential negative impacts on cash crops, consider terminating earlier in the season when conditions are dry or when green bridge or nitrogen tie-up are a concern. For crop insurance compliance, follow NRCS cover crop termination guidelines.

» Early season nitrogen applications can help reduce the effects of nitrogen tie-up by the cover crops.

This fact sheet is a collaborative effort of USDA's Natural Resources Conservation Service (NRCS) and Iowa State University Extension and Outreach to provide cover crop options and information for Iowa landowners.