



Sugarbeet-growing regions across the U.S. have distinct requirements for cultivation and management that dictate unique seed traits and treatment strategies.

All varieties developed for Michigan and Ontario growers are designed to maximize productivity without sacrificing pest and disease protection. All varieties have tolerance to Aphanomyces, Rhizoctonia and Fusarium and are bred to also include strong rhizomania tolerance.



Our Diamond Plated® Seed treatment series provides additional protection against seedling diseases and certain problematic insects in sugarbeet production. Our seed treatments are designed to protect the true genetic potential of the varieties.

Ask your ACH Seeds Crystal brand sales representative for more details.

For more than 20 years, ACH Seeds has collaborated with researchers and plant breeders to develop sugarbeet seed traits that offer superior disease and pest tolerance without sacrificing yield performance.

Our varieties combine multiple sources of rhizomania tolerance to maximize yield potential. This multi-source rhizomania trait is available in all Crystal varieties in the Michigan Sugar market.

The Power of CR+ Trait: Disease Protection with Proven Performance

The CR+ trait from KWS delivers Cercospora protection. Plus yield performance. Plus flexibility. Plu

After three years of use by farmers across North America, Crystal brand hybrids containing the CR+ trait have delivered on the promise of protection and performance. Identified and developed by KWS researchers and plant breeders, growers have benefited from disease tolerance and protection without sacrificing performance.

For growers, this means green sugarbeet leaves until harvest and healthier plants with potentially reduced post-emergent fungicide sprays when compared to conventional Cercospora varieties. Varieties containing the CR+ trait also perform well in both the presence and absence of Cercospora pressure, which means no yield drag in non-disease conditions.

Developing seed varieties for your success.

We take seed variety development very seriously. Putting customers first is also a priority for us.

Our sales, marketing and breeding teams collaborate to develop seed varieties growers require for a productive season. Your success informs everything we do.

Ensuring you keep growing.

Our official varieties spend at least 10 years in development before being made available to growers. Sales, marketing and product management representatives convene three times a year to collaborate on hybrid development for each region of the country. Production plans are assembled and revisited over a 2-year period to ensure grower priorities are being met and hybrids in development are performing as expected. That's how we deliver seeds to meet your needs. From field performance to sugar potential, your productivity is our priority.

This brochure includes seed varieties developed for your area of the country. Visit ACHSeeds.com for more information.





Year 7
HYBRID PRODUCTION

Years 8-10 **OVT TESTING**

Year 10



The development of a parent to achieve offspring with desired genetics to increase productivity.



SELFINGS PART
The first The pro
step in seed of test
multiplication. fc
ger
de



PARTITIONS
The production of test hybrids for earlygeneration decisions.

PARTITIONS

EXPERIMENTAL HYBRIDS:

The production of varieties as potential candidates for official variety trials (OVT).



PRE-BASIC:
A genetically
pure increase
of selected
parent seed. Is
also known as
breeder seed.



BASIC SEED:
This is seed planted as a seed increase to grow parents for commercial varieties.



Seed is grown and processed to meet customer demand.

OVT testing is conducted to ensure performance meets approval requirements.

You plant the variety in your field.

Sugarbeet hybrid seed development

10 Years

G932NT

- · High-performing nematode variety that is well balanced with good sugar and tons
- · Very good root rot package with strong Rhizoctonia tolerance
- · Background traits: Aphanomyces; Fusarium; root aphid and multisource Rhizomania

	LOW	MODERATE	HIGH	
SUGAR %				
TONNAGE				
RHIZOMANIA	1			
APHANOMYCES				
FUSARIUM				
CERCOSPORA				
RHIZOCTONIA				
ROOT APHID				
NEMATODE				



CRYSTAL G151

· Pending approval

- · Excellent Cercospora tolerance featuring the CR+ trait
- · Very high yield and good sugar content
- · Well-rounded disease package
- · Background traits: Aphanomyces, Fusarium, root aphid and multisource Rhizomania

	LOW	MODERATE	HIGH
SUGAR %			
TONNAGE			
RHIZOMANIA			
APHANOMYCES			
FUSARIUM			
CERCOSPORA			
RHIZOCTONIA)
ROOT APHID			

CRYSTAL **G049**

· Pending approval

- · Excellent Cercospora tolerance featuring the CR+ trait
- · High yield performance driven by excellent tonnage
- · Very good root rot package with strong Rhizoctonia tolerance
- · Background traits: Aphanomyces, Fusarium, root aphid and multisource Rhizomania

	LOW	MODERATE	HIGH	
SUGAR %				
TONNAGE				
RHIZOMANIA				
APHANOMYCES				
FUSARIUM				
CERCOSPORA				
RHIZOCTONIA				
ROOT APHID				



CRYSTAL G206NT

- · Pending approval
- · Nematode variety with excellent Cercospora tolerance featuring the CR+ trait
- · Good yielding variety combined with strong root rot package
- · Strong Rhizoctonia
- · Background traits: Aphanomyces, Fusarium, root aphid and multisource Rhizomania

	LOW	MODERATE	HIGH	
SUGAR %				
TONNAGE				
RHIZOMANIA				
APHANOMYCES				
FUSARIUM				
CERCOSPORA				
RHIZOCTONIA				
ROOT APHID				
NEMATODE				

CRYSTAL **G214NT**

MSC Varieties

· Pending approval

- · Nematode variety with excellent Cercospora tolerance featuring the CR+ trait
- · High sugar variety combined with strong root rot package
- Strong Rhizoctonia
- · Background traits: Aphanomyces, Fusarium, root aphid and multisource Rhizomania

	LOW	MODERATE	HIGH	
SUGAR %				
TONNAGE				
RHIZOMANIA				
APHANOMYCES				
FUSARIUM				
CERCOSPORA				
RHIZOCTONIA				
ROOT APHID				
NEMATODE				



CRYSTAL G229

· Pending approval

- · Excellent Cercospora tolerance featuring the CR+ trait
- · Exceptional sugar quality
- · Strong root rot package
- · Excellent Cercospora Background traits: Aphanomyces, Fusarium, root aphid and multisource Rhizomania

	LOW	MODERATE	HIGH	
SUGAR %				
TONNAGE				
RHIZOMANIA				
APHANOMYCES				
FUSARIUM				
CERCOSPORA				
RHIZOCTONIA				
ROOT APHID				

CRYSTAL **G227**

· Pending approval

- · Excellent Cercospora tolerance featuring the CR+ trait
- · Great balance between yield and sugar
- · Strong root rot package
 - · Background traits: Aphanomyces, Fusarium, root aphid and multisource Rhizomania

	LOW	MODERATE	HIGH	
SUGAR %				
TONNAGE				
RHIZOMANIA				
APHANOMYCES				
FUSARIUM				
CERCOSPORA				
RHIZOCTONIA				
ROOT APHID				



CRYSTAL G233

· Pending approval

· Cercospora tolerance featuring the CR+ trait

· High yield performance driven by excellent tonnage

 \cdot Well balanced root rot package with excellent Fusarium

· Background traits: Aphanomyces, Fusarium, root aphid and multisource Rhizomania

	LOW	MODERATE	HIGH
SUGAR %			
TONNAGE			
RHIZOMANIA			
APHANOMYCES			
FUSARIUM			
CERCOSPORA			
RHIZOCTONIA			
ROOT APHID			

Your ACH Seeds Sales Team

Contact your ACH Seeds Crystal brand sales representative to discuss your seed needs today. | ACHSEEDS.COM



ANDY BERNIA I GREAT LAKES REGION MANAGER

abenia@achseeds.com | 989-751-2744

As I look forward to the 2024 growing season, the word that comes to mind is **OPTIMISTIC!** The sugar market is very strong, your sugar cooperative appears to be heading in a good direction and grower enthusiasm for sugarbeets has improved.

I am also very optimistic about Crystal brand sugarbeet seed varieties as we continue to transition toward the game-changing CR+ trait. Growers needing nematode tolerance have been patiently waiting for the option to use this new technology and now it has arrived. Additionally, we are seeing great advancements in both yield and quality with our new non-NT CR+ varieties. Our variety lineup provides great genetic diversity including a new class of "super sweet" types that provide unprecedented sugar content. In total, we expect to have five new varieties for 2024, and I can honestly say that I have never been more optimistic about our portfolio in 33 years of marketing sugarbeet seed.

Seed supplies are good, and our team of ISAs are ready to help you sort through the many variety options. We look forward to partnering with you again this year to help manage your risk and maximize profitability on your farm. Best wishes for a successful 2024!





PETER MAXWELL

ISA - West Region | Beaverton, MI crystalbeetseed@gmail.com | 989-615-1641

Peter was raised in a beet field. He grew up on a crop farm that grew sugarbeets, dark red kidney beans, corn and pumpkins. A graduate of Albion College, he earned a B.A. degree in economics and management. He received the honor of Michigan Sugar Company's 2014 Outstanding Young Farmer. Peter joined ACH Seeds in 2010.



MIKE LEEN

ISA - East Region | Carsonville, MI mikeleen@gmail.com | 810-404-5336

Mike lives near Sandusky, where he was raised on a small family farm. He attended Michigan State University and obtained a B.S. degree in food systems and economic management with a focus on crops and soils. He has spent his entire career working in agriculture and is also a certified crop consultant. Mike joined the ACH Seeds team in 2013.



JEFF KARST

ISA - Central Region | Frankenmuth, MI jefkarst@hotmail.com | 989-213-3697

Jeff attended Michigan State University where he received a B.S. degree in crop and soil science. Jeff owns and operates his own small farm where he grows corn, soybeans, wheat and sugarbeets. He is also a certified seed treatment applicator and has a corn and soybean seed business. Jeff joined the ACH Seeds team in 2010.



RYAN KONECNY

ISA - Ontario | Wallaceburg, ON rbkfarms@hotmail.com | 519-809-2146

Ryan resides near Wallaceburg, where he farms with his father and brother. Ryan graduated from the University of Guelph with a diploma in agriculture. Soon afterwards in 2003, he started growing sugarbeets and has really enjoyed being an active member of the Ontario sugarbeet community. Ryan joined the ACH Seeds team in 2010.



Our 2023 Winner. Congratulations, Cass City Public Schools!

Cass City Public Schools is one of six organizations across the country selected to receive \$10,000 from the 2023 Homegrown Giving program. With the donation, Cass City Public Schools plans to sustain a school-based Class A CDL training program to help address the high demand for CDL drivers in the agriculture industry.

Through the training program, students receive both a math credit and a Class A CDL certification. The school rents a truck and trailer each month while covering other costs such as fuel and insurance. Students pay for the online portion of the course and the fee for an online test. The donation will help fund the school's CDL program and create a scholarship to pay the fees for students who complete the course. There are many success stories of Cass City Public Schools students who have completed the course that are now utilizing their CDL license in their current careers with a few of those students returning to agriculture. Twelve students are currently enrolled in the CDL course for this school year.



Homegrown Giving program is about."

We won the of our hometown.

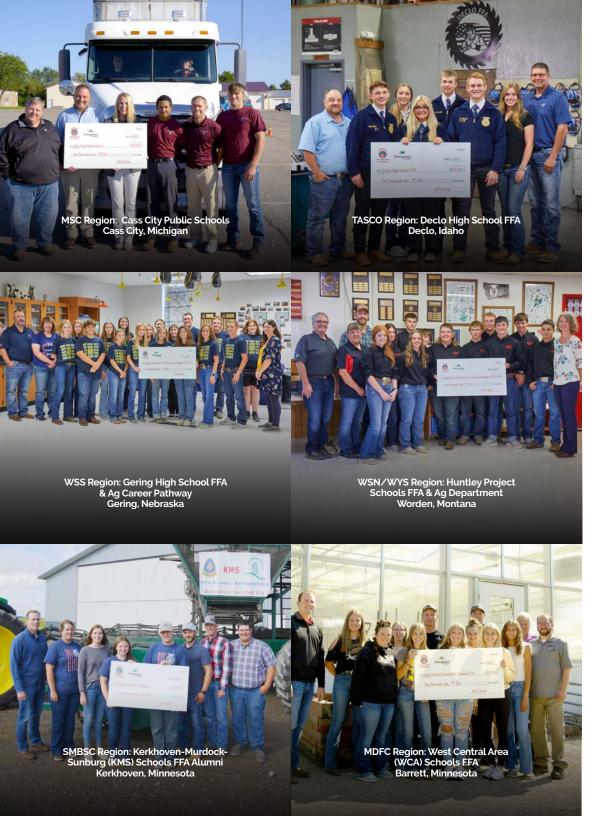
Cass City, Michigan

The CDL program is a great way for students to gain experience to prepare them for jobs in agriculture. The Homegrown Giving donation will allow us keep the program running and connect more students with farmers who are struggling to find truck drivers so we can help their operations thrive."

- Adam Dorland, CDL Course Instructor at Cass City Public Schools

We are proud to partner with Cass City Public Schools and support their efforts in the community. When talking with local sugarbeet growers, one of their biggest challenges is getting truck drivers to haul their sugarbeets. Cass City's CDL course is a perfect fit to help meet the needs of our grower customers, which is what our

- Andy Bernia, ACH Seeds Great Lakes Region Manager





Congratulations to our 2023 Homegrown Giving Recipients!

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